

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

INNOLUX CORPORATION

Petitioner,

v.

PHENIX LONGHORN LLC,

Patent Owner.

Case No. IPR2025-00044

U.S. Patent No. 7,557,788

PATENT OWNER'S PRELIMINARY RESPONSE

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EXHIBIT LIST

Exhibit No.	Description
2001	Declaration of Joesph C. McAlexander Regarding U.S. Patent No. 7,557,788
2002	Decision Denying Institution, <i>Wistron Corp. v. Phenix Longhorn, LLC</i> , IPR2018-01255, Paper 14 (P.T.A.B. Jan. 24, 2019)
2003	DocketNavigator Statistics – Motion Success, accessed on March 5, 2025
2004	LegalMetric Nationwide Report, Stay Pending Inter Partes Review in Patent Cases, August 2012 - October 2024
2005	Docket Control Order, <i>Phenix Longhorn LLC v. Innolux Corp.</i> , Case No. 2:23-cv-00478 (E.D. Tex. Nov. 13, 2024)
2006	Defendants’ P.R. 3-3 and 3-4 Invalidity Contentions, dated November 15, 2024

I. INTRODUCTION

Pursuant to 35 U.S.C. § 323 and 37 C.F.R. § 42.207, Patent Owner Phenix Longhorn, LLC (“Phenix” or “Patent Owner”) submits this Preliminary Response to Innolux Corporation’s (“Innolux” or “Petitioner”) Petition for *Inter Partes* Review of U.S. Patent No. 7,557,788 (“the ’788 Patent”) and respectfully requests that the Board deny institution of Innolux’s petition for the reasons presented herein.

First, the Petition should be denied because none of the alleged prior art references contained in Petitioner’s Grounds disclose the “reprogrammable and nonvolatile” memory, as recited by each of the claims of the ’788 Patent.

Second, using its discretion under § 325(d), the Board should deny the Petition because the same prior art and arguments have been thoroughly considered and rejected by the U.S. Patent and Trademark Office (“the Office”) during review by the patent examiner (“the Examiner”) in prosecution. *See* EX1002. The Examiner considered the same references asserted in the current Petition and found them without merit. The Board should come to the same conclusion here.

II. BACKGROUND

A. The ’788 Patent

The ’788 Patent describes and claims a method for calibrating liquid crystal displays (LCDs) to a desired gamma curve to compensate for panel-to-panel

variations introduced during the manufacturing process. *Id.* at 2:17-28, Claim 1.

To do so, the '788 Patent describes and claims methods wherein reprogrammable and non-volatile storage cells are programmed with varying levels of gamma reference voltages, testing the display with a sensor, and optimizing the reprogrammable gamma reference voltages via a predetermined algorithm and storing the final desired gamma reference voltages. *Id.* at Claim 1.

B. Challenged Claims

The '788 Patent has 6 claims, 5 of which (all except claim 4) are challenged in the Petition.

C. Person of Ordinary Skill in the Art

Petitioner contends that a person of ordinary skill in the art ("POSITA") at the time of the invention of the '788 Patent "would have had at least a bachelor of science degree in physics, electrical engineering, or the equivalent thereof and three (3) years of experience in circuit design or display technologies . . . [and] would have had knowledge of integrated circuits, gamma correction, and storage of gamma correction voltage values within memory, and would have understood how to search available literature for relevant publications." Petition at 12. Because this definition does not affect Phenix's arguments in favor of patentability nor the Examiner's prior decision pertaining to the '788 Patent, solely for the purposes of this Preliminary Response, and without agreeing or disagreeing as to its

correctness, Phenix and its expert Joe McAlexander apply the same definition.

EX2001, ¶¶17-21.

D. Priority Date

The '788 Patent claims priority to Provisional Application No. 60/477,680 filed on June 11, 2003. EX1001, Cover. Both Petitioner and Patent Owner agree that the priority date of the '788 Patent is June 11, 2003 and, therefore, Pre-AIA 35 U.S.C. §§ 102 and 103 apply. Petition at 10-11.

E. The Examiner's Review

The application resulting in the '788 Patent (Patent Application No. 11/743,014) was filed on May 1, 2007. On July 22, 2008, the Examiner entered a Non-Final Office Action rejecting all claims under 35 U.S.C. § 103. EX1002, 92-98. Notably, *the two prior art references relied on by the Examiner in rejecting the claims are the subject of this Petition.* Specifically, Claims 1 and 3-5 were rejected under 35 U.S.C. § 103 as being unpatentable over Liaw (*id.* at 94-96), while Claims 2 and 6 were rejected under 35 U.S.C. § 103 as being unpatentable over Liaw in view of Matsui (*id.* at 97).

On October 22, 2008, Applicant filed a response to the Non-Final Rejection. *Id.* at 69-80. Claims 1 and 4 were amended to correct non-substantive errors; Claims 2, 3, and 6 were left unchanged; and Claim 5 was amended to delete “wherein said means for executing said predetermined algorithm is not required

subsequent to the calibrating step.” *Id.* at 70-73. With respect to Claim 1, Applicant demonstrated that Liaw failed to disclose the preamble— “[a] method of calibrating a liquid crystal display to a desired gamma curve to compensate for panel to panel manufacturing.” *Id.* at 75. Further, Applicant demonstrated that Liaw “does not disclose providing gamma reference control capability ‘which is electrically reprogrammable and non-volatile.’” *Id.* As stated by Applicant, “automatically programmed does not follow from electrically reprogrammable” as “[r]e-programmable indicates that the gamma reference control parameters can be changed to suit a changed requirement.” *Id.*

After correcting non-substantive errors with the drawings, a Notice of Allowance was entered on March 5, 2009 (*id.* at 48-50), and the ’788 Patent issued on July 7, 2009 (*id.* at 39).

F. Alleged Prior Art

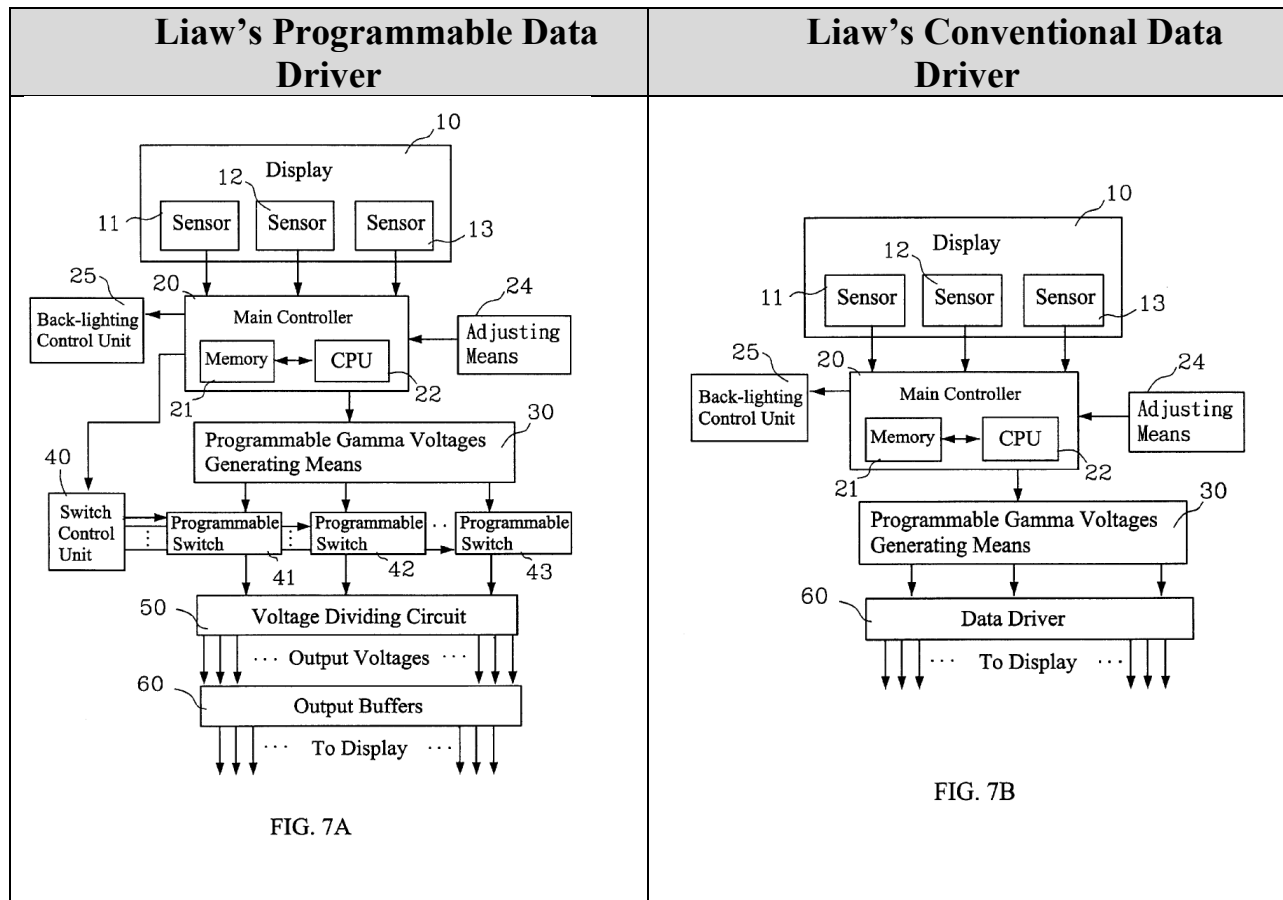
Petitioner’s cited prior art consists of only four alleged references, arranged in various combinations: U.S. Patent No. 6,593,934 (“Liaw”); U.S. Patent No. 6,271,825 (“Greene”); U.S. Patent No. 6,100,879 (“Da Costa”); and U.S. Patent No. 5,754,150 (“Matsui”). Three of the four references provided by Petitioner have already been evaluated by the USPTO with respect to this patent family: Liaw and Matsui were cited in rejections by the examiner during the prosecution of the

'788 Patent; and the Board previously denied a challenge against the '788 Patent's parent (U.S. 7,233,305) citing *Da Costa*. EX1002, pp.74-79; EX2002, p.6.

1. The Liaw Reference (EX1005)

Liaw was already overcome during prosecution of the '788 Patent. EX1002, pp.74-79. Liaw describes “an automatic Gamma correction system in which a novel display driving circuitry is designed with a digital/analog converter (DAC), wherein the Gamma reference voltages as well as the corresponding gray-scale values are adjustable.” EX1005, Abstract. A POSITA would have understood Liaw as describing a dynamic or “automatic” system for gamma correction that uses programmable switches to adjust both grey-scale and gamma voltages to adjust “display parameters” as needed during operation. EX2001, ¶30. Liaw would not be consulted or relevant for the purposes of calibrating gamma voltages in the manufacturing process, as described in the '788 Patent. *Id.*

For example, Liaw describes “an automatic Gamma parameter correction system” with specific focus on its “*novel data driver* [] designed with a digital/analog converter (DAC).” EX1005, 2:27-32; FIG. 7A (emphasis added). Liaw additionally describes the use of a “conventional data driver” as part of its “Gamma correction system.” *Id.* at FIG. 7B.



EX1005, FIGS. 7A, 7B.

Liaw's "programmable Gamma Voltage generating means 30" is composed of a digital-to-analog converter (DAC) connected to a plurality of buffers, so as to output the Gamma reference voltages by adjusting the received destination function of the Gamma voltage output by the main controller 20." *Id.* at 7:1-5. As demonstrated in FIG. 11:

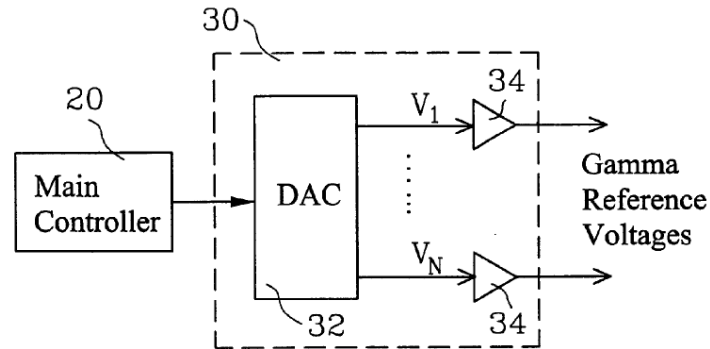


FIG. 11

EX1005, FIG. 11.

Outputs from “programmable Gamma Voltage generating means 30” are sent to “programmable switches 41, 42 and 43” which are also connected to a “switch control unit 40.” *Id.* at 7:6-13.

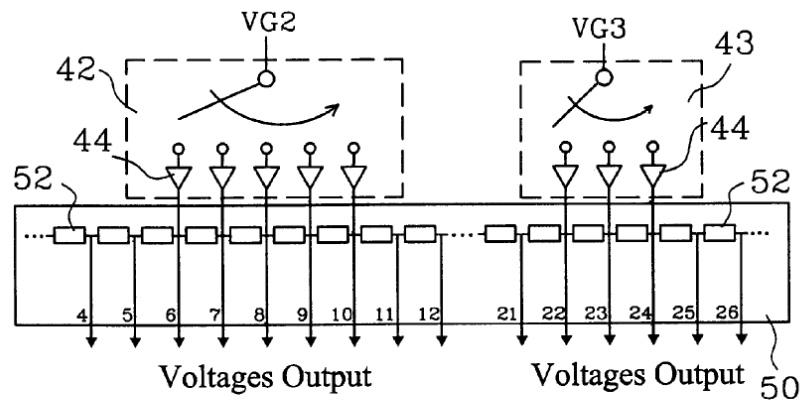


FIG. 13

EX1005, FIG. 13.

Liaw’s “programmable switches” further include a “voltage dividing circuit 50 having a series divided voltage points” which “applies the Gamma reference voltages to the corresponding divided voltage points according to the

corresponding gray-scale signals delivered from the central process unit (CPU) 22.” *Id.* at 7:18-24. Liaw’s CPU 22 may adjust the Gamma reference voltages and the corresponding gray-scale signals via the voltage dividing circuit 50’s digital-to-analog converter (DAC). *Id.* at 7:18-28.

Liaw also describes a “main controller 20, connected to the sensors 11, 12 and 13” where “[t]he sensors 11, 12 and 13 can be light sensors, temperature sensors, pixel voltage sensors, or a pixel charging/discharging current sensors used for measuring at least one parameter.” *Id.* at 8:49-61. The “main controller 20” of Liaw “serve[s] as a main control circuit for the system, and further including a central process unit 22 and a memory 21 for parameter calculation and data storage.” *Id.* Liaw further describes a “Gamma parameter correction method,” as set forth in FIG. 14:

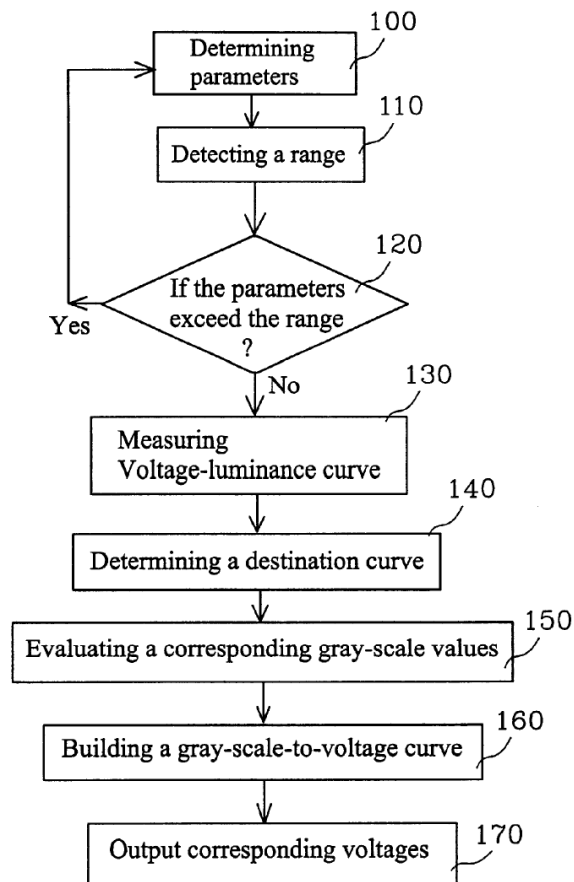


FIG. 14

EX1005, FIG. 14.

Liaw's "Gamma parameter correction method" serves to determine a "gray-scale-to-voltage transfer curve" "according to the voltage-to-luminance curve of the display" such that the "gray-scale values can be optimized by using computer software and then loaded into the display circuit." *Id.* at 10:10:4-22. Thereafter, Liaw describes "interconnecting the Gamma reference voltages and the corresponding gray-scale values by using the programmable switches 41, 42, 43 and the switch control unit 40, so as to build up a gray-scale-to-voltage curve." *Id.*

10:23-27. Finally, Liaw describes “outputting a corresponding voltage to the series of output buffers 60 by using the voltage dividing circuit 50 according to the input gray-scale value of the image.” *Id.* at 10:33-35.

2. The Greene Reference (EX1006)

Greene describes “methods and apparatus for the correction of spatial non-uniformities in brightness that arise from materials, manufacturing, operational and lighting parameter variations in electronic color, flat-panel displays,” including an “[a]pparatus for an automatic self-calibrating function.” EX1006, Abstract. Specifically, Greene describes “different methods for keeping the resultant luminance substantially constant using active control means.” *Id.* at 8:45-49. Greene discloses “[f]our different methods for controlling luminance” based on the measurement and modification of “Weber’s Fraction” which is “[t]he ability of the human eye to discriminate between two luminances.” *Id.* at 7:52-53. Greene’s four methods include: (i) “uniform color coordinates and uniform primary luminances,” (ii) “uniform color coordinates and non-uniform primary luminances,” (iii) “uniform primary luminances and non-uniform color coordinates,” and (iv) “non-uniform color coordinates and non-uniform primary luminances.” *Id.*

For Greene’s second method, Greene describes a system wherein luminance can be measured for each pixel and the associated luminance values stored in

memory. Subsequently these luminance values can be normalized via Greene's cited equation (5):

$$R' = RL_R / L_R'$$

$$G' = GL_G / L_G'$$

$$B' = BL_B / L_B'$$

EX1006, (Equation 5) 9:50-57.

Greene additionally describes a “self-calibrating display” embodiment of its second method, wherein a “The brightness measurements and parameter computations can be made automatically under the control of a built-in controller periodically, or as initiated by the user, each having color coordinates.” *Id.* at 11:26-29. As part of this referred to “self-calibrating display” Greene refers to a “photodetector 72” that is “movably mounted” to an x-y arm assembly to provide the “measured data” for normalization using Equation (5). *Id.* at 11:30-36.

3. The Da Costa Reference (EX1007)

In denying the Wistron Petition for the '305 Patent—the parent patent of the '788 Patent—the Board extensively reviewed the Da Costa reference¹ and

¹ The Board held that Da Costa failed to disclose, among other things: 1) a “multiplexer,” 2) how any alleged multiplexer would be involved in “addressing and programming storage cells,” 3) storage cells that “are organized into two or more banks of cells,” and 4) “any structure that permits switching between any alleged banks.” EX2002, pp.25-32.

described it as generally discussing “[a] smart controller chip for controlling an active matrix display” wherein “[t]he combination of D/A [digital/analog] analog circuitry and standard digital logic makes the controller uniquely suited for addressing all the panel control needs both for the normal digital functions but also for control of the analog aspects of the panel, like display gamma.” EX2002, pp.25-32 (citing EX1007, Abstract, 2:37-41).

Da Costa’s preferred “display control system 200” is provided in Figure 2:

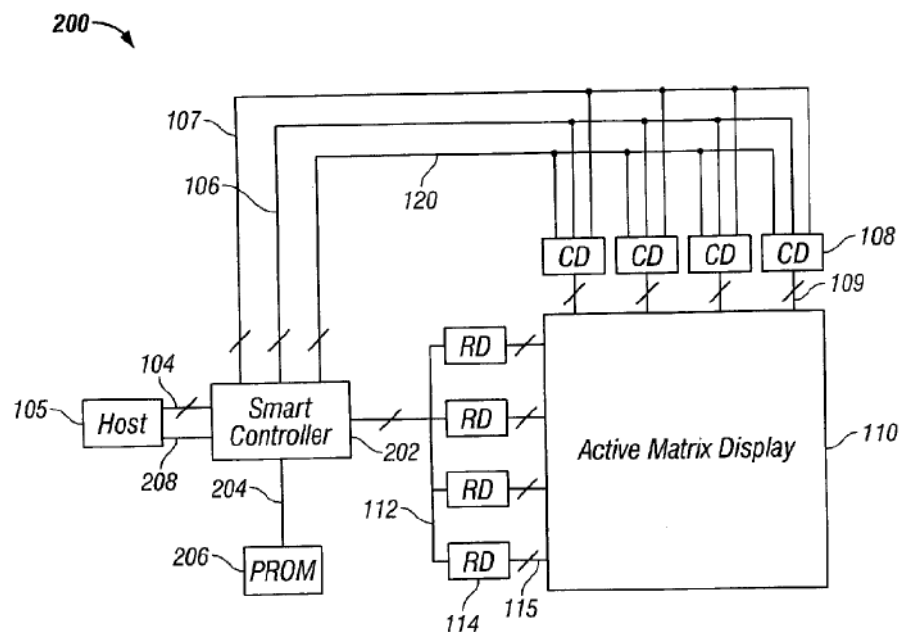


FIG. 2

EX1007, FIG. 2.

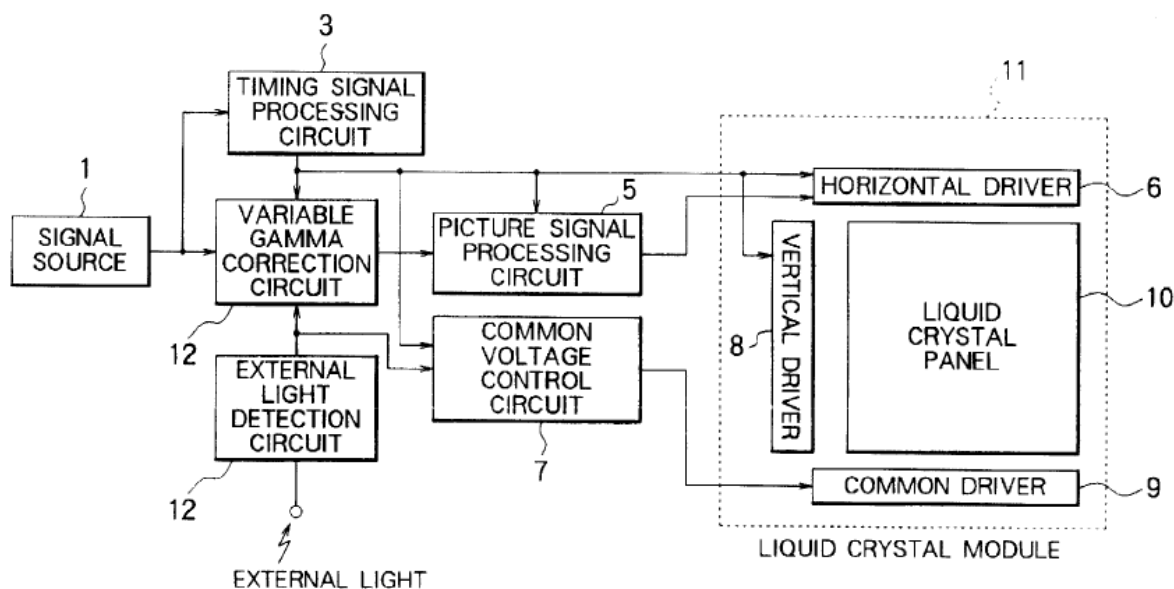
The display control system 200 “drives relatively high-power programmable analog reference levels via lines 120 to column drivers 108 without using the external reference circuitry 116 which is required in the conventional system 100.” *Id.* at 4:50-54. Da Costa describes that its smart controller 202 is “programmed initially via the first serial bus 204 by the external PROM 206” using “[a] typical industry standard serial bus and protocol.” *Id.* at 4:57-63. Da Costa also describes the use of a “second serial bus 208” which “is used to communicate information between the first smart controller 202 and the host system 105” and thereby “dynamically modify the analog reference levels and the column and row control signals output by the first smart controller 202” “to adjust operating characteristics of the display to suit particular applications and compensate for environmental changes.” *Id.* at 5:1-12.

4. The Matsui Reference (EX1008)

Matsui was already overcome during prosecution of the '788 Patent. EX1002, p.79. Matsui describes a “luminance adjusting apparatus” to “narrow the output dynamic range of a picture signal processing section and decreasing the cost of a horizontal driver.” EX1008, Abstract. Specifically, Matsui describes a “luminance adjusting apparatus” which “comprises a variable gamma correction circuit 12 for synchronizing an inflection point of a gamma correction curve with a common voltage generated by the common voltage control circuit 7.” *Id.* at 10:7-

10. Matsui also describes the use of “an external light detection circuit 13 as shown in FIG. 4 and constituted so as to change *inflection points* [sic] of the variable gamma correction circuit 12 and common voltages.” *Id.* at 10:54-60 (emphasis added).

FIG. 4



EX1008, FIG. 4.

5. Lack of Motivation to Combine

A POSITA would not have consulted Petitioner’s four alleged prior art references, as they are each directed to dynamically altering calibration and do not teach the reprogrammable and non-volatile storage utilized for the purposes of calibrating gamma voltages during the manufacturing process, as described in the ’788 Patent. EX1001, 2:23-28 (“The device incorporates a programming interface

to allow the programming of the buffer outputs to the desired values during manufacturing and test of the panel. Multiple sets of gamma values can be programmed and stored to provide optimized gamma correction curves for different user or application requirements.”); EX2001, ¶¶44-46.

For example, Liaw is directed to “an automatic Gamma parameter correction system” wherein the automatic correction system “provides a greater degree of freedom for the realization of the correction of Gamma parameters.” EX1005, 2:27-28; 12:9-15. Greene is directed to an “[a]pparatus for an automatic self-calibrating function.” EX1006, Abstract. Specifically, Greene describes a “self-calibrating display” wherein “[t]he brightness measurements and parameter computations can be made automatically under the control of a built-in controller periodically, or as initiated by the user, each having color coordinates.” *Id.* at 11:26-29. Da Costa describes a “smart controller chip for controlling an active matrix display” wherein the chip may “dynamically modify the analog reference levels and the column and row control signals output by the first smart controller 202” “to adjust operating characteristics of the display to suit particular applications and compensate for environmental changes.” EX1007, 5:1-12. Finally, Matsui describes that “[i]n the case of the luminance adjusting apparatus of the present invention, external light is detected by adjustment means, inflection points of a gamma correction curve and common electrode voltage are

synchronously changed in accordance with the detection result and thereby luminance adjustment is performed” and “[t]herefore, it is possible to automatically perform luminance adjustment correspondingly to changes of the peripheral condition used.” EX1008, 7:31-39. Put simply, a POSITA would not have been motivated to consult the teachings of *automatic* or *dynamically* adjusting circuitry because such references were unlikely to—and in the cited instances, do not—contain the reprogrammable and non-volatile storage required to implement the methods of the ’788 Patent. EX2001, ¶51.

Notwithstanding the inapplicability of all four cited reference to the inventions of the ’788 Patent, specific reasons why a POSITA would not have combined the references are described in Section VI below.

III. CLAIM CONSTRUCTION

A. The Petition Does Not Comply with 37 C.F.R. § 42.104(b)(3), Warranting Denial of Institution.

The Petition is deficient pursuant to 37 C.F.R. § 42.104(b)(3) and, as such, institution should be denied. Specifically, “[w]here claim language *may* be construed according to 35 U.S.C. § 112(f), a petitioner *must* provide a construction that includes both the claimed function and the specific portions of the specification that describe the structure, material, or acts corresponding to each claimed function.” Patent Trial and Appeal Board Consolidated Trial Practice

Guide: November 2019, Section II.B.6 (available at <https://www.uspto.gov/sites/default/files/documents/tpgnov.pdf?MURL=TrialPracticeGuideConsolidated>) (emphasis added) (hereinafter “CTPG”). A petitioner who chooses not to address construction under § 112(f) “risks failing to satisfy the requirement of 37 C.F.R. § 42.104(b)(3).” *Id.* at 45; *10x Genomics, Inc. v. President and Fellows of Harvard College*, IPR2023-01299, Paper 15 at 8 (denying institution under 37 C.F.R. § 42.104(b)(3)).

The Petition alleges that Claims 1-3 and 5-6 are unpatentable under various Grounds. *See* Petition at 14-15. The only term that the Petition alleges to “require construction” is in Claim 3—“operating means for executing one or more optimization criteria algorithms based on optical emission corresponding to said selected columns”. *See id.* at 12-14. However, Claims 1 and 5 recite a “means for executing a predetermined algorithm according to a predetermined criteria and data sensed by said at least one sensor.” Courts presume that a claim limitation is subject § 112 ¶ 6 (*i.e.*, is a means-plus function term) “when the claim language includes the term ‘means.’” *Dyfan LLC v. Target Corp.*, 28 F.4th 1360, 1365 (Fed. Cir. 2022) (“[W]e presume at the first step of the analysis that a claim limitation is subject to § 112 ¶ 6 when the claim language includes the term ‘means.’”). As such, Claims 1 and 5 include limitations that may be construed as means-plus-

function claims.² Petitioner was therefore required to, but did not, provide a construction relating to or otherwise rebutting the presumption that the term is a means-plus-function term. Petitioner's failure to include both the claimed function and the specific portions of the specification that describe the structure, material, or acts corresponding to each claimed function, is fatal to the Petition. CTPG at Section II.B.6 (citing 37 C.F.R. § 42.104(b)(3)). As such, the Petition is deficient under 37 C.F.R. § 42.104(b)(3) and institution should be denied for this reason alone, Because the PTAB cannot provide for partial institution of the Petition. *SAS Inst., Inc. v. Iancu*, 584 U.S. 357, 370 (2018) ("There is no room in this scheme for a wholly unmentioned 'partial institution' power that lets the Director select only some challenged claims for decision.").

B. The Petition's Indefiniteness Arguments Should Be Ignored.

The scope of an *inter partes* review proceeding is limited to "ground[s] that could be raised under section 102 or 103." 35 U.S.C. § 311; *see also Intel Corp. v. Alacritech, Inc.*, 817 F. App'x 1014, 1019 (Fed. Cir. 2020) ("As the Board itself recognizes, it does not have legal authority to decide indefiniteness in the context of an *inter partes* review."). Thus, the Petition's arguments directed to

² Patent Owner takes no position on whether the claim term is a means-plus-function term at this time. Instead, Petitioner's failure to either rebut the presumption that the term is a means-plus-function term, or to provide a construction including the required function or structure of the term, renders its Petition materially deficient.

indefiniteness should be ignored. Petition at 12-14. However, Patent Owner disagrees with Petitioner's indefiniteness allegations and reserves the right to respond to them in the proper forum.

C. Proposed Claim Constructions

Other than the terms specifically addressed below, Phenix contends that each term of the challenged claims should be given its plain and ordinary meaning. Phenix reserves the right to offer additional constructions should a review be instituted on any of the proposed grounds.

1. “operating means for executing one or more optimization criteria algorithms based on optical emission corresponding to said selected columns”

The '788 Patent claims an “operating means for executing one or more optimization criteria algorithms based on optical emission corresponding to said selected columns.” EX1001, Claim 3[4]. Petitioner proposes the term should be construed to refer to a “programming interface which executes an optimization algorithm.” Petition at 14. Patent Owner does not take a position on the construction of this term at this time. Patent Owner uses Petitioner's proposed construction—solely for the Board's review of this Petition. Patent Owner does so because even under Petitioner's proposed construction, the references cited in Petitioner's Grounds do not disclose any “programming interface which executes

an optimization algorithm.” Patent Owner reserves the right to offer a construction for this term should a review be instituted on any of the proposed grounds.

IV. THE BOARD SHOULD EXERCISE ITS DISCRETION AND DECLINE TO INSTITUTE REVIEW OF THE ’788 PATENT.

The Board should exercise its discretion under 35 U.S.C. § 325(d) and deny institution because the same or substantially the same prior art and arguments were previously considered by the Office during prosecution. *Becton, Dickinson & Co. v. B. Braun Melsungen AG*, IPR2017-01586, Paper 8 at 28 (PTAB Dec. 15, 2017) (Designated Precedential Aug. 2, 2019 as to § III.C.5 ¶ 1). In *Advanced Bionics, LLC v. MED-EL Elektromedizinische Geraete GmbH*, the Board set forth a two-part framework under § 325(d). *Advanced Bionics, LLC v. MED-EL Elektromedizinische Geraete GmbH*, IPR2019-01469, Paper 6 at 8 (PTAB Feb. 13, 2020). First, the Board determines whether the same or substantially the same art or arguments were previously presented to the Office. *Id.* at 8. If so, then the Board determines whether the petitioner demonstrated that the Office erred in evaluating the art or arguments. *Id.* at 8-11. If the Petitioner has failed to show that the Office erred, then the Director generally will exercise discretion not to institute. *Id.* at 8-9.

In evaluating whether to exercise its discretion when the same or substantially the same prior art or arguments previously were presented to the

Office under § 325(d), the Board considers several non-exclusive factors. *Becton, Dickinson*, Paper 8 at 17–18 (listing factors (a)-(f)). In *Advanced Bionics*, the Board explained how the *Becton, Dickinson* factors are considered under the framework, specifically, “[i]f, after review of factors (a), (b), and (d), it is determined that the same or substantially the same art or arguments previously were presented to the Office, then factors (c), (e), and (f) relate to whether the petitioner has demonstrated a material error by the Office.” *Advanced Bionics*, Paper 6 at 10-11. Moreover, while the *Becton, Dickinson* factors pertain to art evaluated during examination, the Board may consider similar factors where the same or substantially the same art and arguments were previously presented during any proceeding before the Office, including a prior IPR proceeding. *Id.*; CTPG at 63.

Also, when the “same or substantially the same prior art or arguments” were presented during original prosecution, the Board has repeatedly denied institution. 35 U.S.C. § 325(d); *Dorco Co. v. Gillette Co.*, IPR2017-00500, Paper 7 at 17-18 (PTAB June 21, 2017); *Apple Inc. v. Uniloc USA, Inc.*, IPR2017-00224, Paper 7 at 6-7 (PTAB May 25, 2017).

Here, the Board should deny institution on all grounds because Petitioner’s challenges rely on the same or substantially the same prior art presented during prosecution of the ’788 Patent and Petitioner has not demonstrated a material error

by the Office. *Advanced Bionics*, IPR2019-01469, Paper 6 at 10-11. Liaw and Matsui were both *expressly relied upon by the Examiner* in formulating a § 103 rejection during prosecution, which Patent Owner overcame. Ex. 1002, 92-98, 69-80. Greene and Da Costa are redundantly relied on by the Petitioner *for the very same teachings* as Liaw and Matsui already considered by the Office and, accordingly, does not save Petitioner. Moreover, in a related proceeding involving the parent of the '788 Patent, the Board already reviewed Da Costa and detailed its deficiencies with respect to the many of same claim elements challenged in this Petition. EX2002, 25-32. Petitioner provides no explanation of material error by the Office in allowing the '788 Patent over Liaw and Matsui, or the redundant Greene and Da Costa. Accordingly, the Board should exercise its discretion and deny the Petition.

**A. The Same or Substantially the Same Art or Arguments
Were Previously Presented to the Office**

1. Becton, Dickinson Factor (a)

Liaw and Matsui meet the first part of the *Advanced Bionics* test (*i.e.* whether the same art was presented to the Office) in view of *Becton, Dickinson* factor (a). Liaw and Matsui were both *expressly relied upon by the Examiner* in formulating a § 103 rejection during prosecution, which Patent Owner overcame. Ex. 1002, pp.92-98, 69-80. Moreover, while Da Costa and Greene were not

considered by the Examiner during prosecution, they constitute substantially the same art and are cumulative for the reasons discussed below. Da Costa was, however, reviewed and found insufficient to render the '788 Patent's parent—the '305 Patent—obvious in a prior *inter partes* review. *See* EX2003. Accordingly, Factor (1) weighs in favor of the Board exercising its discretion.

2. Becton, Dickinson Factor (b)

Petitioner has not provided any explanation of why Greene or Da Costa are better references than Liaw or Matsui. *See* Petition at 15-16. Instead, Petitioner includes only a conclusory statement that the “arguments presented here have not been previously presented to the USPTO.” *Id.* at 15. Petitioner’s statement, however, is incorrect, as Petitioner itself acknowledges, “Liaw (EX1005) and Matsui (EX1008) were of record during prosecution.” *Id.* at 16. Given the substantial nature of cumulative references (Liaw and Matsui) presented in the Petition (3 of the 4 Grounds), Petitioner’s failure to describe why Greene and Da Costa are better or cure the deficiencies of Liaw and Matsui warrants denial of its Petition. *Nespresso USA, Inc. v. K-Fee Sys. Gmbh.*, IPR2021-01222, Paper 9 at 17 (PTAB Feb. 13, 2020) (“A trial in this case necessarily would require the Board to assess whether [the claims] are unpatentable in view of the same or substantially the same references previously presented to the Office.”). Moreover, of the two references that Petitioner alleges to as “newly found prior art,” one of them (Da

Costa) has been reviewed by the Board in a prior Petition for a patent to which the '788 Patent claims priority, and, in that case, institution was denied. *See* EX2002, pp. 25-32.

a) Da Costa

Petitioner relies on Da Costa for Grounds 2 and 4. Petitioner relies on Da Costa primarily for its teaching of “a smart controller chip with integrated analog and digital circuitry for flexible gamma control in active matrix displays.” Petition at 53. Specifically, in combining Da Costa as a secondary reference with other primary references, Petitioner relies on Da Costa’s alleged “programmable registers and D/A converters for storing and generating gamma reference voltages,” wherein the combination would purportedly “benefit from Da Costa’s ability to store multiple gamma curves and dynamically switch between them, allowing for compensation of both manufacturing variations and environmental changes.” *Id.* at 54. Petitioner, however, also relies on Liaw for allegedly describing “a programmable gamma voltage generating means (30) that generates adjustable gamma reference voltages output to programmable switches (41-43)” with memory that can store “at least one grays-scale to-luminance destination curve.” Petition at 30-32. Thus, Petitioner’s proffer of the alleged teaching of Da Costa’s “smart controller chip” is cumulative of Liaw’s “programmable gamma reference voltage generating means.”

Petitioner further relies on Da Costa's purported "host system interface" to "enable software-controlled optimization of gamma reference levels." Petition at 54. But such alleged teaching is also cumulative of Liaw's alleged "CPU (22) that executes optimization algorithms to determine gamma reference voltages based on sensed voltage-to-luminance data from the sensors and predetermined criteria like desired luminance and contrast." Petition at 31.

Based on the foregoing, Petitioner has not provided any explanation of how or why Da Costa is a better reference than Liaw for the alleged teachings provided by Da Costa, and its arguments are, therefore, cumulative of art and arguments previously evaluated by the Examiner.

b) Greene

Petitioner relies on Greene for Grounds 1-3. Petitioner relies on Greene primarily for its teaching of "methods for correcting spatial non-uniformities in brightness arising from manufacturing variations in electronic displays, including [LCDs]." Petition at 20. Specifically, in combining Greene as a secondary reference with other primary references, Petitioner relies on Greene's alleged disclosure of a "photodetector" with an alleged benefit "of more flexible and precise display calibration." *Id.* at 26. Petitioner, however, has also relied on Liaw as teaching the same feature. For example, Petitioner alleges that Liaw teaches "sensors (11-13) that can be disposed inside or outside the display to obtain

voltage-to-luminance curves” wherein the sensors “are separate components from the display itself, connected to the main controller to provide sensed data for gamma correction.” *Id.* at 29.

Petitioner further relies on Greene’s purported “teaching of repeating the calibration process under different ambient conditions” for “allowing the display to maintain optimal performance across various usage scenarios.” Petition at 26. Petitioner’s supposed advantages of Greene are also cumulative as Petitioner purports that Matsui confers the same advantage, alleging that Matsui teaches “repeating calibration under different ambient conditions” and “automatically adjusting luminance based on detected external light intensity” which would “allow for dynamic optimization of display performance across various usage scenarios.” *Id.* at 62.

Petitioner has not provided any explanation of how or why Greene is a better reference than Liaw or Matsui for the alleged teachings provided by Greene, and its arguments are, therefore, cumulative of art and arguments previously evaluated by the Examiner.

In sum, Petitioner has simply not offered any distinction between the relative strengths and weaknesses of its application of the prior art to one or more claim elements compared to Liaw and Matsui already before the Office. *See EMC Corp. v. PersonalWeb Techs., LLC*, IPR2013-00087, Paper 25 at 3-4 (PTAB June 5, 2013)

(finding a redundancy analysis must focus on “whether the petitioner articulated a meaningful distinction in terms of relative strengths and weaknesses with respect to application of the prior art disclosures to one or more claim limitations”); *Liberty Mut. Ins. Co. v. Progressive Cas. Ins. Co.*, CBM2012-00003, Paper 7 at 2-3 (PTAB Oct. 25, 2012) (discussing redundancy).

3. Becton, Dickinson Factor (d)

Factor (d) analyzes the extent of overlap between the arguments made during examination and the manner in which Petitioner relies on the prior art or Patent Owner distinguishes the prior art. In the Office Action, Claims 1 and 3-5 were rejected under 35 U.S.C. § 103 as being unpatentable over Liaw, and Claims 2 and 6 were rejected under 35 U.S.C. § 103 as being unpatentable over Liaw in view of Matsui. EX1002, pp.94-97.

Ground 1 of the Petition alleges that Claims 1-3 and 5-6 are unpatentable over Liaw in view of Greene. Petition at 25. Like the Office Action, Ground 1 relies on Liaw as a primary reference. EX1002, pp.94-97. Also like the Office Action, Ground 1 alleges that Liaw discloses or renders obvious each and every limitation of Claims 1, 3, and 5. *See* Petition at 25-53 (wherein for each limitation of Claims 1, 3, and 5, the Petition alleges that Liaw discloses or renders it obvious). Thus, the only invalidity positions in the Petition for this Ground that do not overlap with the Office Action are those of Claims 2 and 6, which the Petition

covers in around two pages total. *See* Petition at 33-34, 53. As the Examiner found that the independent claims were non-obvious over Liaw in prosecution, the arguments are likewise cumulative for dependent claims 2 and 6. 35 U.S.C. § 112 ¶ 4; *see also Ormco Corp. v. Align Tech., Inc.*, 498 F.3d 1307, 1319-20 (Fed. Cir. 2007).

Ground 2 of the Petition alleges that Claims 1-3 and 5-6 are unpatentable over Greene in view of Da Costa. Petition at 53. EX1002, 94-97. Petitioner bases its Ground 2 on its assertion that “a POSITA could have modified Greene’s luminance scaler/adder circuitry to include Da Costa’s programmable registers and D/A converters for storing and generating gamma reference voltages.” Petition at 53. The same argument was presented to the Examiner during prosecution. The Examiner asserted that “one of ordinary skill in the art would recognize that LCD has a non-uniform gamma characteristics that would require gamma correction and that a non-volatile memory would serve to avoid the need to setting gamma reference voltages every time the display is powered up.” EX1002, 95-96. In response, the Applicant contended, among other things, that in Liaw’s system “there would be no need for a non-volatile memory because each time the system is started, gamma correction will be automatic, based on current parameters.” *Id.* at 76. Both of Petitioner’s references in Ground 2 describe automatically calibrating systems, and thus for the same reasons presented to the Examiner,

Ground 2 likewise fails. *See infra*, at VI.C. Thus, although the art of Ground 2 was not reviewed by the Examiner, the arguments presented in the Petitioner are still cumulative of the same arguments presented during prosecution.

Ground 3 of the Petition alleges that Claims 1-2 and 5-6 are unpatentable over Liaw in view of Greene, and further in view of Matsui. Petition at 61. Like the Office Action, Ground 3 relies on Liaw as a primary reference and deploys Matsui as a secondary reference. EX1002, 94-97. However, the Ground only applies Matsui and completely ignores Liaw and Greene. Petition at 63-71. Nonetheless, the arguments substantially overlap with those made by the Examiner during prosecution, who was also applying Matsui in rejecting the claims. Petitioner's Ground 3 cites to Matsui's alleged teaching of "automatically adjusting luminance based on detected external light intensity and display tilt" to "allow for dynamic optimization of display performance across various usage scenarios" to obtain "improved display performance under varying conditions." Petition at 62. Petitioner's assertion of Ground 3 essentially mirrors the utilization of Matsui by the Examiner in prosecution, who stated: "it would have been obvious to one of ordinary skill in the art to incorporate Matsui's external light detection into Liaw's display, as this further provides capability to adjust gamma correction according to different ambient display condition, thus resulting in an optimal display independent of ambient lighting condition." EX1002, 97. As the Applicant

overcame the Examiner's rejection in prosecution (*See* EX1002, p.79), Petitioner's arguments in Ground 3 are cumulative of those already presented.³

Ground 4 of the Petition alleges that Claims 1-2 and 5-6 are unpatentable over Liaw in view of Da Costa. Petition at 15. Like the Office Action, Ground 4 relies on Liaw as a primary reference. EX1002, 94-97. For this Ground the Petition, in around two-pages total, lays out its argument of unpatentability at a superficial level without addressing the claims on a limitation-by-limitation basis. Petition at 71-73. Even if these pages constitute sufficient argument—and they do not—the two additional pages covering this Ground do not move the needle that the Petition substantially overlaps with the Examiner's unpatentability positions during prosecution.

Since Petitioner is making the same or similar arguments based on Liaw and Matsui as were made by the Examiner during prosecution, *Becton, Dickinson* factor (d) weighs in favor of discretionary denial.

B. Petitioner Has Not Demonstrated Material Error by the Office

Petitioner fails to demonstrate a material error by the Office as required by the second step of *Advanced Bionics*, which consists of an evaluation of *Becton*,

³ To the extent that Greene is also included in the combination, its assertion is cumulative for the same reasons discussed with respect to Ground 1's combination of Liaw and Greene above.

Dickinson factors (c), (e), and (f). Therefore, the Board should exercise its discretion to deny institution of *inter partes* review.

1. Becton, Dickinson Factor (c)

Factor (c) weighs in favor of the Board exercising its discretion because the Examiner *expressly considered* and relied on Liaw and Matsui in formulating a rejection. Ex. 1002, pp.92-98, 69-80. While Greene and Da Costa were not evaluated during examination, they are cumulative of the prior art that was evaluated and applied (i.e., Liaw and Matsui) for the reasons discussed above. *See supra*, at Section IV.A.

Accordingly, factor (c) weighs in favor of the Board exercising its discretion.

2. Becton, Dickinson Factor (e)

Petitioner has not pointed out how the Examiner erred in the evaluation of Liaw and Matsui. Therefore, factor (e) weighs in favor of the Board's exercise of discretion. Petitioner fails to provide any explanation of why the '788 Patent should not have been allowed by the Examiner in view of Liaw and Matsui. Petitioner simply provides the same or similar arguments advanced by the Examiner and hopes for a different conclusion.

Petitioner provides no explanation of what material error was made by the Examiner with respect to the teachings of either Liaw and Matsui that warrants the Board to revisit patentability of the '788 Patent claims based on Liaw and Matsui

or the redundant references Greene or Da Costa. Because Petitioner fails to “point[] out sufficiently how the Examiner erred in its evaluation of the asserted prior art,” factor (e) favors the Board’s exercise of its discretion. *See Becton, Dickinson*, IPR2017-01586, Paper 8 at 18; 24-25.

3. Becton, Dickinson Factor (f)

Liaw and Matsui were presented to the Office. Greene and Da Costa are relied on by the Petitioner for the same teachings as Liaw and Matsui; thus factor (f) weighs heavily in favor of the Board’s exercise of its discretion. Importantly, Petitioner did not submit any experimental data or scientific explanation in support of its Petition. Therefore, there is no additional evidence or science to consider. And although Petitioner provided a declaration in support of its Petition, that declaration is largely repetitive of the asserted references, references described in the ’788 Patent, references cited by the Examiner during prosecution, and otherwise includes conclusory statements regarding motivation and predictability found in the Petition. *See Universal Imaging Indus. v. Fisher et al.*, IPR2019-01383, Paper 7 at 8-9, 31 (PTAB Feb. 27, 2020). Accordingly, the Board should exercise its discretion under § 325(d) to deny institution. *See Advanced Bionics*, IPR2019-01469, Paper 6 at 8 (citing *Becton, Dickinson*, Paper 8 at 24).

V. THE BOARD SHOULD DENY INSTITUTION UNDER 35 U.S.C. § 314(a).

The Board should exercise its discretion and deny institution under 35 U.S.C. § 314(a) because all six *Fintiv* factors favor discretionary denial. There is no requirement that the Board institute *inter partes* review. *See, e.g., Harmonic Inc. v. Avid Tech. Inc.*, 815 F.3d 1356, 1367 (Fed. Cir. 2016). “[T]he PTO is permitted, but never compelled, to institute an IPR proceeding.” *Id.* Rather, the decision to institute is delegated to the Board and is purely discretionary.

35 U.S.C. §314(a) gives the Board discretion to deny institution because of efficiency considerations stemming from parallel proceedings on the same patent. *See NHK Spring Co. v. Intri-Plex Techs., Inc.*, IPR2018-00752, Paper 8 at 20 (PTAB Sept. 12, 2018) (precedential).⁴ The PTAB has established six factors for determining whether discretionary denial due to efficiency considerations relating to parallel proceedings is appropriate (the “*Fintiv* factors”):

1. whether the court granted a stay or evidence exists that one may be granted if a proceeding is instituted;
2. proximity of the court’s trial date to the Board’s projected statutory deadline for a final written decision;
3. investment in the parallel proceeding by the court and the parties;

⁴ The parallel proceeding is *Phenix Longhorn, LLC v. Innolux Corp.*, No. 2:23-cv-00478-RWS-RSP (E.D. Tex.).

4. overlap between issues raised in the petition and in the parallel proceeding;
5. whether the petitioner(s) and the defendant in the parallel proceeding are the same party; and
6. other circumstances that impact the Board's exercise of discretion, including the merits.

Apple Inc. v. Fintiv, Inc., IPR2020-00019, Paper 11 at 5-6 (PTAB Mar. 20, 2020 (precedential) (“*Fintiv I*”); *Apple Inc. v. Fintiv, Inc.*, IPR2020-00019, Paper 15 at 7-8 (PTAB May 13, 2020) (informative, designated July 13, 2020) (“*Fintiv II*”).

Here, all six *Fintiv* factors weigh heavily in favor of discretionary denial and there are no “compelling merits” or a *Sotera*-type stipulation. Accordingly, the Board should exercise its discretion and deny institution.

A. Factor 1

Factor 1 weighs in favor of denial. Petitioner has not sought a stay pending an institution decision in the district court, and Phenix will not seek or consent to one. Moreover, even if Petitioner was to seek a stay, that motion would almost certainly be denied. The Eastern District of Texas has an established practice not to stay litigation pending resolution of IPR prior to institution. *See, e.g., Viavi Sols. Inc. v. Zhejiang Crystal-Optech Co.*, No. 2:21-CV-00378-JRG, 2022 WL

16856099, at *5 (E.D. Tex. Nov. 10, 2022) (“It is the Court’s established practice to consider that motions to stay pending IPR proceedings which have not been instituted are inherently premature and should be denied as such.”); *Resonant Sys., Inc. v. Sony Grp. Corp.*, No. 2:22-cv-00424-JRG, Dkt. 84 at 4-6 (E.D. Tex. July 9, 2024 (denying stay when defendant delayed filing IPR petitions until 10 months after service of complaint and where IPRs would be decided after district court trial); *DigitalDoors, Inc. v. Int’l Bus. Machines Corp.*, No. 2:22-cv-457-JRG, Dkt. 41 at 4-5 (July 23, 2023) (denying stay when parties had exchanged contentions and discovery had begun).

Even post-institution, the district court judge is unlikely to stay the case absent agreement from the parties. EX2003 (showing nearly 68% and 54% of motions to stay pending IPR denied in 2023 and 2024, respectively); EX2004, p. 13 (showing a total win rate of 26.9% and a win rate of 16% in 2024 on contested motions to stay pending IPRs in the Eastern District of Texas); *see also id.* at 61 (showing Judge Gilstrap granting a total of 17.7% contested motions to stay pending IPRs). The institution decision will issue so late in the district court proceeding—well into expert discovery, dispositive motions, and pre-trial preparation—that it is exceedingly unlikely that the Eastern District of Texas court would grant a contested stay. Thus, because a stay is unlikely, this factor weighs in favor of denial.

B. Factor 2

Factor 2 weighs heavily in favor of denial. The Notice of Filing Date Accorded to Petition was mailed on December 12, 2024. Paper 5, 1. A Final Written Decision (“FWD”), therefore, will be due no later than **June 12, 2026**. *See* 35 U.S.C. §314(b); 35 U.S.C. §316(a)(11). Jury selection in the District Court litigation is scheduled to begin on **February 17, 2026**. EX2005. Thus, trial in the District Court will occur **four months** before a FWD would be issued. The Board has found similar parallel dates to weigh heavily in favor of discretionary denial. *See Fintiv I* at 9 (“If the court’s trial date is earlier than the projected statutory deadline, the Board generally has weighed this factor in favor of exercising authority to deny institution under *NHK* [*Spring*, IPR2018-00752].”); *Ericsson Inc. v. Collison Commc’ns, Inc.*, IPR2022-01233, Paper 12 at 12-13 (PTAB Jan. 19, 2023) (holding factor two “weighs in favor of denying institution, given that we would not expect to issue a final written until at least four months” after trial); *10x Genomics*, IPR2023-01299, Paper 15 at 17 (denying institution of IPR when district court trial date was up to five months before FWD deadline); *Samsung Elecs. Co. v. Mojo Mobility Inc.*, IPR2023-01098, Paper 11 at 7-8 (PTAB Feb. 9, 2024) (denying institution of IPR when district court trial date was five months before FWD deadline).

Further, granting institution here would frustrate one of the primary objectives of the AIA, which is “to provide an effective and efficient alternative” to district court litigation. *NHK Spring*, IPR2018-00752, Paper 8 at 19-20 (quoting *General Plastic Indus. Co., v. Canon Kabushiki Kaisha*, IPR2016-01357, Paper 19 at 15-19 (PTAB Sept. 6, 2017) (precedential)). If the Petition was instituted, any potential FWD would issue well after trial concludes. Thus, instituting IPR here cannot be viewed as an “alternative” to litigation. Rather, it would simply create more litigation. Because the district court’s trial date is four months before the anticipated FWD date here, factor two weighs heavily in favor of denying institution.

C. Factor 3

Factor 3 also favors denial. Petitioner cannot discount the investment the district court and the parties have already made in this dispute (and will make before the expected institution decision date.). The parties have completed their Eastern District of Texas P.R. 3-1 and 3-2 disclosures (Infringement Contentions), P.R. 3-3 and 3-4 disclosures (Invalidity Contentions). EX2005, pp.38-39. The institution decision is expected no later than June 12, 2025. *See* 35 U.S.C. §314(b). By that date, the parties will have exchanged proposed claim terms and preliminary claim constructions, prepared a joint claim constructions statement, and completed claim construction discovery. *Id.* The following week, the parties must have

substantially completed document production. The parties have already exchanged at least 17,208 documents containing 273,767 pages in fact discovery, and are expected to receive documents from third-parties in response to multiple subpoenas. Thus, significant substantive work will have already been completed in the district court litigations by the expected time of the institution decision. *See Fintiv II* at 14 (“based on the level of investment and effort already expended on claim construction and invalidity contentions in the District Court, this factor weighs somewhat in favor of discretionary denial in this case”). Accordingly, factor three favors the Board exercising discretion to deny institution.

D. Factor 4

Factor 4 also weighs in favor of denying institution. “[I]f the petition includes the same or substantially the same claims, grounds, arguments, and evidence as presented in the parallel proceeding, this fact has favored denial.” *Fintiv I* at 12. There is substantial overlap between the invalidity positions advanced in the Petition and before the district court. Liaw and Matsui—both relied on as prior art in this Petition—are identified and charted in Petitioner’s invalidity contentions. EX2006, pp.17, 33-39, (Excerpts from Defendant’s P.R. 3-3 Invalidity Contentions and Subject Matter Eligibility Contentions at pp.38-39 (charting Liaw), pp.38-39 (charting Greene), pp.17, 33-36 (charting Da Costa), and pp. 17, 38-39 (charting Matsui). This factor thus favors denying institution as well.

E. Factor 5

Factor 5 weighs in favor of discretionary denial. The parties here and in the district court litigation are identical. *Fintiv* II at 15 (“Because the petitioner and the defendant in the parallel proceeding are the same party, this factor weighs in favor of discretionary denial.”). Factor five, therefore, favors discretionary denial of institution.

F. Factor 6

Factor 6 weighs in favor of discretionary denial. As discussed above in Section IV, substantially the same art and arguments in the Petition were previously presented to the Patent Office, but the claims were still deemed allowable. Moreover, as discussed below in Section VI, the merits of Petitioner’s arguments are weak and Petitioner has failed to show a reasonable likelihood of success for any ground, much less a high likelihood of prevailing as required to show “compelling merits.” *See Fintiv* I at 15 (“if the merits of the grounds raised in the petition are a closer call, then that fact has favored denying institution when other factors favoring denial are present”); *CommScope Techs. LLC v. Dali Wireless, Inc.*, IPR2022-01242, Paper 23 at 5 (TTAB Feb. 27, 2023) (“Merely pointing to...its analysis under the lower institution standard is insufficient to demonstrate that the Petition presents a compelling unpatentability challenge.”).

The Board has found this factor to favor exercising discretion to deny institution where a patent owner identifies flaws in the petitioner's mapping of reference(s) to the claim elements. *Verizon Bus. Network Servs. LLC v. Huawei Techs. Co.*, IPR2020-01278, Paper 12 at 15 (PTAB Jan. 26, 2021; *Fintiv* I at 15 (“[I]f the merits of the grounds raised in the petition are a closer call, then that fact has favored denying institution when other factors favoring denial are present.”)). As discussed *supra*, Petitioner has failed to show that their proposed combinations meet several claim elements. All of Petitioner's cited references fail to include disclosure of the “reprogrammable and nonvolatile” memory required by the claims. Additionally, each of the asserted references fails to address the means-plus-function limitation of independent claims 1 and 5. *See supra*, at Section III.A.

Further, every IPR Petition necessarily alleges, as Petitioner does here, that the asserted prior art teaches limitations that were missing from the prior art examined during prosecution. Such generic allegations do not rise to the level of compelling merits. *See, e.g., OpenSky Indus., LLC v. VLSI Tech. LLC*, IPR2021-01064, Paper 102 at 49 (TTAB Oct. 4, 2022) (“a compelling-merits challenge is a higher standard than the reasonable likelihood required for the institution of an IPR under 35 U.S.C. § 314(a)”). Thus, factor six favors discretionary denial.

Accordingly, all six *Fintiv* factors weigh in favor of discretionary denial. The Board should use its discretion to deny institution.

VI. PETITIONER’S ARGUMENTS FAIL TO ESTABLISH THE UNPATENTABILITY OF THE CHALLENGED CLAIMS.

Review should not be instituted because none of the four grounds raised in the Petition provide a basis for the Board to find that there is a reasonable likelihood of prevailing on any claim challenged in the Petition. Petitioner provides the following grounds for review.

Ground	Claims	References
1	1–3, and 5-6	Liaw (EX1005) in view of Greene (EX1006)
2	1–3, and 5-6	Greene (EX1006) in view of Da Costa (EX1007)
3	1–2, and 5-6	Liaw (EX1005) in view of Greene (EX1006) in further view of Matsui (EX1008)
4	1–2, and 5-6	Liaw (EX1005) in view of Da Costa (EX1007)

Below, Phenix demonstrates why each of these grounds fails to render the challenged claims unpatentable, and expressly reserves the right to provide additional reasons and support should a review be instituted on any proposed ground.

A. All Grounds of the Petition Omit Construction of a Means-Plus-Function Limitation and, Therefore, Fail as a Matter of Law.

As described in detail above, Petitioner fails to provide a construction for the term “means for executing a predetermined algorithm according to a predetermined criteria and data sensed by said at least one sensor,” contained in

independent claims 1 and 5 of the '788 Patent. Thus, all Grounds of the Petition fail as a matter of law. *See supra*, at Section III.A (citing 37 C.F.R. § 42.104(b)(3)).

B. Ground 1 – The Challenged Claims are Not Unpatentable Under 35 U.S.C. § 103(a) As Obvious Over Liaw (EX1005) in view of Greene (EX1006).

Ground 1 of the Petition relies upon the combination of Liaw and Greene. As previously discussed, Liaw was already before the Examiner and was the basis of a rejection that was subsequently overcome during prosecution. EX1002, 92-98. Thus, for the same reasons that Liaw failed to teach the limitations of the Challenged Claims during prosecution, it likewise cannot provide a basis for institution in this Petition. As described below, Petitioner fails to identify how Greene would cure the established deficiencies of Liaw, and therefore this Ground should be denied.

1. A POSITA Would Not Have Looked to Liaw and Greene and Would Likewise Not Combine Them.

Liaw and Greene both teach away from the inventions of the '788 Patent and are further incompatible with one another. EX2001, ¶63. As described in detail above, both references are directed to automatic and synchronous gamma correction. *See supra*, at Section II.F.5. Thus, a POSITA would not have looked to Liaw or Greene to implement the reprogrammable and non-volatile functionality

of the '788 Patent. EX2001, ¶63. The Petition omits any discussion of how or why a POSITA would have been motivated to incorporate any alleged reprogrammable or non-volatile functionality from Greene into Liaw. *See* Petition at 25-27. As the Applicant demonstrated that Liaw contains no reprogrammable or non-volatile functionality, as required by the claims. *See* EX1002, pp.74-79. Petitioner's failure to demonstrate a motivation to combine any such functionality in Greene with the system in Liaw renders Ground 1 deficient. Moreover, a POSITA would not have combined Liaw and Greene because their dynamic and automated calibration functions would be redundant and provide no added benefit to their descriptions. EX2001, ¶¶64-65. Petitioner's assertions otherwise seek to impermissibly read on features of dynamic gamma correction to the '788 Patent's reprogrammable and non-volatile system. *Id.*

2. Liaw and Greene do not disclose the “reprogrammable and non-volatile” integrated circuit requirements as recited by Independent Claim Limitations 1[1], 3[3], and 5[1].

Notwithstanding their inapplicability to the objectives of the '788 Patent, Petitioner fails to demonstrate that Liaw and Greene, if combined, would disclose each of the challenged claims. EX2001, ¶66. Liaw does not disclose a method for calibration wherein the gamma reference control capability is “reprogrammable and non-volatile” as required by each of the independent claims. EX1001, Claims

1[1], 3[3], and 5[1]. Liaw's omission of this claim limitation was raised—and not disputed by the Examiner—in prosecution of the '788 Patent. EX1002, pp.74-79; EX2001, ¶67. Petitioner concedes that “Liaw does not explicitly state that storage is non-volatile.” Petition at 28.

Greene does not cure this deficiency as its lone mention of “non-volatile random-access memory (NV-RAM)” is not for the programming and storage of gamma voltage information, as the independent claims of the '788 Patent require, but instead for the measured luminance information output by the pixels. EX1006, 10:14-18; EX2001, ¶68. Greene recites the use of “non-volatile random-access memory (NV-RAM)” to store “[l]uminance” that is “measured, after the display is fabricated, for each pixel.” EX1006, 10:14-18. The fundamental difference between Greene's “NV-RAM” and the “reprogrammable and non-volatile” memory of the '788 Patent is consistent with the objectives of each reference. EX2001, ¶68. Greene seeks to use the stored information to calculate “luminance ratios” which are then processed through a “scaler/adder 56 to normalize the color coordinates according to Equations (5).” *Id.* at 10:59-62.

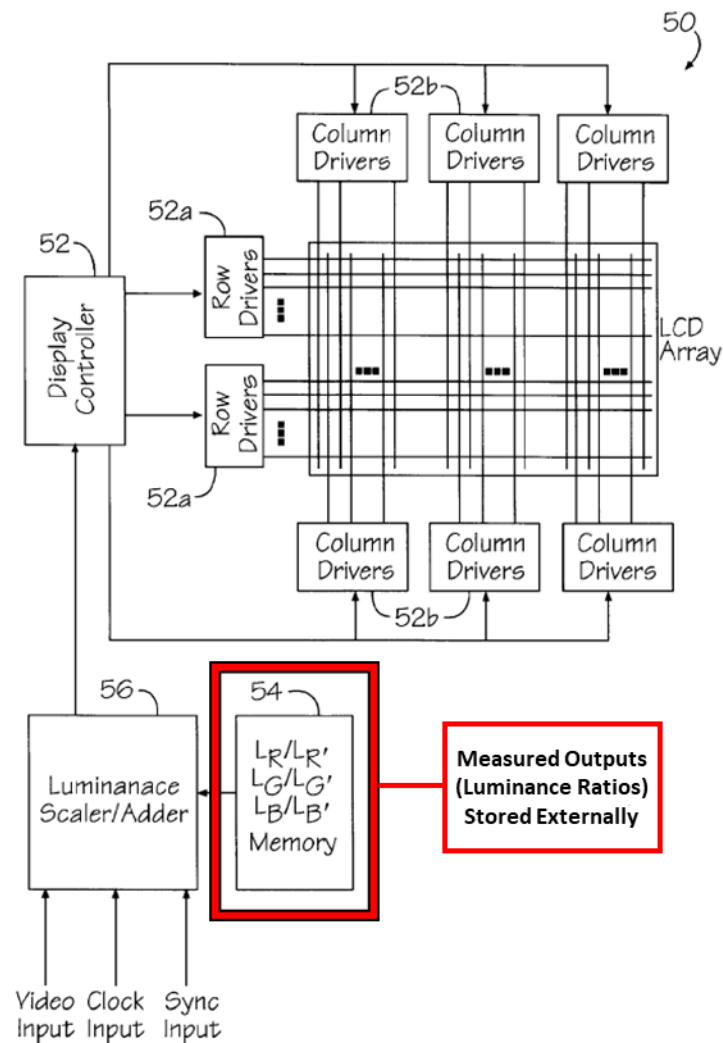


Figure 4

EX1007, FIG. 4 (annotated).

Greene’s “luminance ratios are stored in a central random access memory 54” and thereby store these ratios—and not any gamma reference voltages—apart from the controller circuitry. EX1006, 10:53-54; EX2001, ¶69. Greene, therefore, describes that the measured *outputs* of the display may be stored in its “NV-

RAM,” but fails to recite any “reprogrammable and non-volatile” memory for the *inputs* of any “gamma reference control capability” as the claims require. *Id.*

Notwithstanding Liaw and Greene’s omission of this claim requirement, Petitioner has further failed to address why or how Liaw would utilize any such “reprogrammable and non-volatile” memory, as it would be contrary to the objectives that Liaw seeks to fix. *See* Petition at 28-29. Specifically, Liaw is directed to dynamic, real-time gamma correction. EX1005, 2:27-28; 12:9-15. Greene also describes a dynamic gamma correction method, where the gamma correction “can be made automatically under the control of a built-in controller periodically, or as initiated by the user” after the device is powered on. EX1006, 11:25-29. By contrast, the ’788 Patent’s reprogrammable and non-volatile memory is useful in situations where the gamma voltages need to be stored even when the power is removed from the device entirely, thereby not requiring any additional calculations every time a panel is powered up. EX2001, ¶70; EX1001, 2:23-28 (“The device incorporates a programming interface to allow the programming of the buffer outputs to the desired values during manufacturing and test of the panel. Multiple sets of gamma values can be programmed and stored to provide optimized gamma correction curves for different user or application requirements.”).

Thus, a POSITA would not have sought to modify the dynamic teachings of Liaw with the reusable and reprogrammable storage properties required by the claims, as the two references take fundamentally different approaches to gamma correction. *See supra*, at Section VI.B.1; EX2001, ¶71. Instead of addressing this internal inconsistency between Liaw and the '788 Patent, Petitioner simply assumes that because Greene recites the use of miscellaneous non-volatile memory for storing output data, it could be applied to Liaw, but as explained above, a POSITA would find no motivation to do so, and Petitioner has not shown otherwise. EX2001, ¶71.

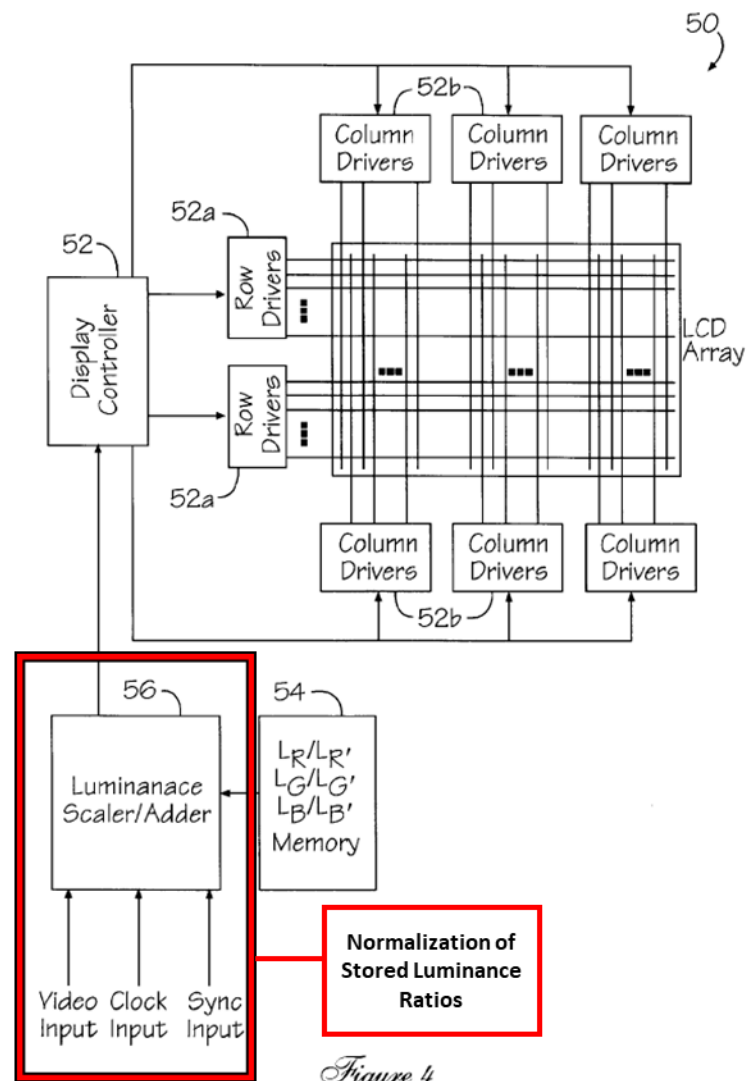
3. Liaw and Greene do not disclose a “means for executing said predetermined algorithm” as recited by Independent Claim Limitations 1[4] and 5[5].

Liaw and Greene both fail to disclose, or otherwise make obvious, the use of a “means for executing a predetermined algorithm according to a predetermined criteria and data sensed by said at least one sensor” as required by claim limitations 1[4] and 5[5]. EX1001, Claims 1 and 5; EX2001, ¶72. As noted in Section III.A above, Petitioner failed to construe this term, which is included in claim limitations 1[4] and 5[5] and, therefore, the Board should deny institution to Claims 1-2 and 4-6 on this basis alone. *See* CTPG at Section II.B.6 (citing 37 C.F.R. § 42.104(b)(3)). Nevertheless, Petitioner’s arguments that Liaw and Greene disclose this undefined claim limitation are further without merit.

Liaw does not disclose claim limitations 1[4] and 5[5]. Petitioner alleges that Liaw's "main controller (20) includes a CPU (22) that executes optimization algorithms to determine gamma reference voltages based on sensed voltage-to-luminance data from the sensors and predetermined criteria like desired luminance and contrast." Petition at 31. Petitioner fails to demonstrate that the alleged CPU (22) implements any "predetermined algorithm" as the claim term requires. A POSITA would have understood that Liaw's cursory reference to "[o]ptimizing (by using programs)" as insufficient to be considered disclosure of the use of a "predetermined algorithm according to a predetermined criteria," as recited by the claim limitations. EX2001, ¶74.

Greene also does not disclose claim limitations 1[4] and 5[5]. EX2001, ¶75. Petitioner attempts to point to Greene's alleged "scaling and interpolation process" as meeting the claim limitation's "predetermined algorithm according to a predetermined criteria and data sensed by at least one sensor." Petition at 31. Greene's "scaling and interpolation process," however, implements only "normalization" of the color coordinates by the "Luminance Scaler/Adder 56" prior to sending the color coordinates to the "Display Controller 52." EX1006, 10:48-11:4; EX2001, ¶76. For example, Greene states "[t]he stored luminance ratios are then used by the video or luminance scaler/adder 56 to normalize the color coordinates according to Equations (5) for a normally light display." *Id.* at

10:59-62. Petitioner has not demonstrated that the alleged Luminance Scaler/Adder 56 implements any “predetermined algorithm” as the claim term requires. EX2001, ¶76. This is further demonstrated in Greene’s Figure 4:



EX1007, FIG. 4 (annotated).

Petitioner fails to explain why a POSITA would understand that the plain scaling of values is “executing a predetermined algorithm according to a

predetermined criteria” as recited by claim limitations 1[4] and 5[5]. EX2001, ¶77; *see also Intelligent Bio-Sys., Inc. v. Illumina Cambridge Ltd.*, 821 F.3d 1359, 1369 (Fed. Cir. 2016) (“It is of the utmost importance that petitioners in the IPR proceedings adhere to the requirement that the initial petition identify ‘with particularity’ the ‘evidence that supports the grounds for the challenge to each claim.’”).

C. Ground 2 – The Challenged Claims are Not Unpatentable Under 35 U.S.C. § 103(a) As Obvious Over Greene (EX1006) in view of Da Costa (EX1007).

Ground 2 of the Petition relies upon the combination of Greene and Da Costa. Petitioner’s arguments regarding Greene and Da Costa, however, fail for the same reasons as Ground 1, as they seek to read on features of dynamic gamma correction to the ’788 Patent’s reprogrammable and non-volatile system. *See supra*, at Section VI.B.

1. A POSITA Would Not Have Looked to Greene and Da Costa and Would Likewise Not Combine Them.

A POSITA would not have consulted Da Costa for the same reasons a POSITA would not have consulted Liaw, because both references are directed to real-time, dynamic gamma correction, instead of the reprogrammable stored gamma correction methods of the ’788 Patent. *See supra*, at Sections II.F.5 and VI.B.1; EX2001, ¶79. For example, Da Costa describes that “[s]oftware in the

host system is also able to program the internal registers of the smart controller chip via an interface between the host system and the smart controller chip. By programming these registers with digital values which correspond to analog reference levels, the system software is able to dynamically modify operating characteristics of the display, such as the display gamma curve. Thus, dynamic adjustments may be made to suit particular applications being run on the host or to compensate for changes in the environment of the display panel.” EX1007, 5:1-12.

Further, Da Costa describes that:

Controlling the gamma display through the analog reference levels for the column drivers is a superior way to control the display gamma and has a big advantage over control by the color look-up table (CLUT) method. Using color look-up tables to achieve non-linear gammas results in a large number of DAC values that have the same transmission value. This is a big price to pay in flat panel displays where the DAC value is typically limited to 64 levels. Instead, by adjusting the analog reference levels, all DAC values correspond to unique transmission values. Furthermore, using the method of adjusting the analog reference levels allows the analog reference levels to be set by software in the host system 105 so that the user may adjust the display gamma depending on the application in use.

Id. at 11:15-33 (emphasis added). Thus, Da Costa is directed to account for *changes in the environment* using dynamic gamma correction, and not the correction of display-to-display variations introduced in the manufacturing process using reprogrammable non-volatile storage, as claimed in the '788 Patent. EX2001, ¶82.

2. Greene and Da Costa do not disclose the “reprogrammable and non-volatile” integrated circuit requirements as recited by Independent Claim Limitations 1[1], 3[3], and 5[1].

Greene and Da Costa do not disclose the reprogrammable and non-volatile” integrated circuit requirements as recited by Independent Claim Limitations 1[1], 3[3], and 5[1]. EX2001, ¶83. As described in detail above, Greene recites the use of “non-volatile random-access memory (NV-RAM)” to store “[l]uminance” that is “measured, after the display is fabricated, for each pixel.” EX1006, 10:14-18. Storage of such display output information is not the same as the storage of “reprogrammable and non-volatile” gamma voltage information, as required by the ’788 Patent’s independent claim limitations. EX2001, ¶83. Da Costa, which has already been reviewed by the Board regarding this exact feature, suffers from the same deficiency. Da Costa describes the use of “registers” to store gamma correction information. EX1007, 6:56-61. Da Costa, however, only describes the *external* PROM used to program these registers—and not the registers themselves—as having non-volatile memory. *Id.* Petitioner’s arguments that the “registers can be programmed via an external PROM or internal flash memory, both of which are non-volatile,” contradicts Da Costa itself. Petition at 55; EX2001, ¶86. Da Costa describes that its smart controller 202 is “programmed initially via the first serial bus 204 by the external PROM 206” using “[a] typical

industry standard serial bus and protocol.” *Id.* at 4:57-63. As provided in Figure 2:

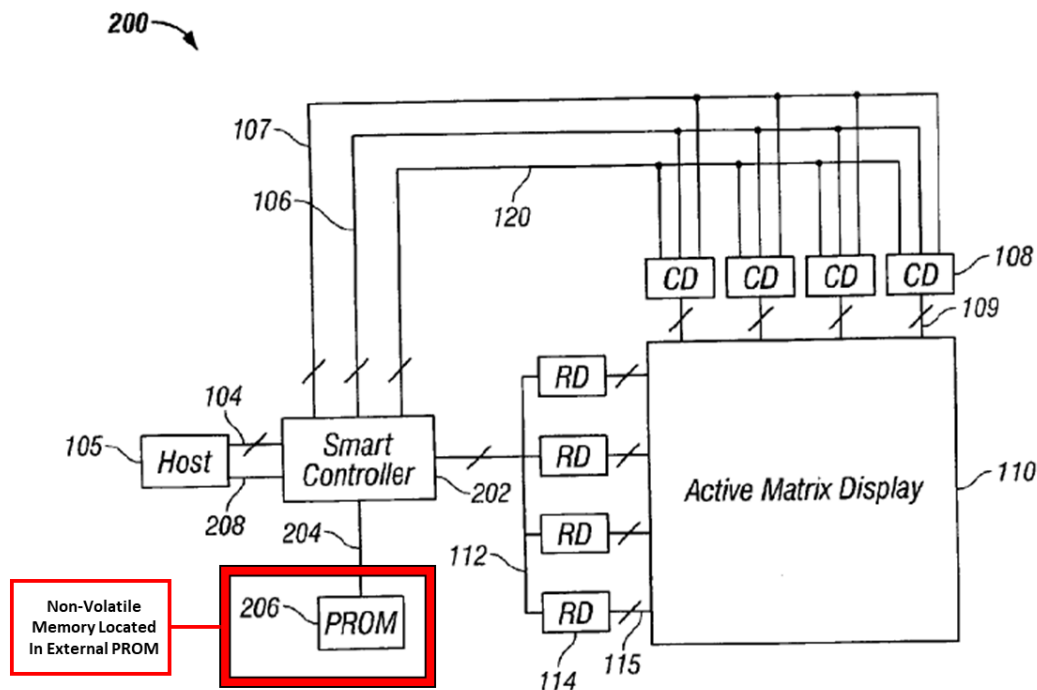


FIG. 2

EX1007, FIG. 2 (annotated).

Da Costa describes the external PROM as an external “programmable read-only memory chip” that programs the “smart controller” via the first input serial bus. *Id.* at 4:33-37, 57-67. Da Costa further describes that “[a]lternatively, the register input circuitry may receive digital values from the flash memory.” *Id.* at 4:36-39; 6:56-62. In either instance, either the flash memory or PROM used to

program the registers is external and, therefore, the “smart controller” itself does not disclose a system that meets the claim limitations of the ’788 Patent. EX2001, ¶87. Da Costa’s failure to disclose “reprogrammable non-volatile” memory as part of its system stems from the fact that Da Costa is directed to be “able to dynamically modify operating characteristics of the display, such as the display gamma curve” and thereby allow for “dynamic adjustments [to] be made to suit particular applications being run on the host or to compensate for changes in the environment of the display panel.” EX1007, 5:1-12. A POSITA would have recognized that Da Costa, which is focused on dynamically altering its gamma values, would not need a reprogrammable and nonvolatile capacity within the system itself. EX2001, ¶88.

Further, claim limitation 3[3] of the ’788 Patent recites the “storing said applied gamma voltages in reprogrammable, nonvolatile cells in said gamma reference voltage generator integrated circuits.” EX1001, Claim 3; EX2001, ¶89. Da Costa fails to disclose any “reprogrammable, nonvolatile cells *in said gamma reference voltage generator integrated circuits*,” instead, Petitioner points to alleged non-volatile memory that is external to the “smart controller” entirely. Petition at 58 (emphasis added); EX2001, ¶89.

3. Greene and Da Costa do not disclose a “means for executing said predetermined algorithm” as recited by Independent Claim Limitations 1[4] and 5[5].

As noted in Section III.A above, Petitioner failed to construe this term, which is included in claim limitations 1[4] and 5[5] and, therefore, the Board should deny institution to Claims 1-2 and 4-6 on this basis alone. *See* CTPG at Section II.B.6 (citing 37 C.F.R. § 42.104(b)(3)).

Greene and Da Costa both fail to disclose, or otherwise make obvious, the use of a “means for executing a predetermined algorithm according to a predetermined criteria and data sensed by said at least one sensor” as required by claim limitations 1[4] and 5[5]. EX1001, Claims 1 and 5; EX2001, ¶90. For the same reasons discussed in detail in Section VI.B.3 above, Greene does not disclose claim limitations 1[4] and 5[5]. Left with only Da Costa, Petitioner omits any discussion of whether Da Costa discloses claim limitation 1[4], rendering its challenge to that claim limitation materially deficient. *See* Petition at 56.

Da Costa does not disclose claim limitation 5[5]. EX1001, Claim 5; EX2001, ¶93. Petitioner concedes that “Da Costa does not expressly mention using sensor data.” Petition at 60. In fact, Da Costa does not mention the use of any sensors at all. *See* EX1007. Petitioner instead relies on Da Costa’s description that its display outputs may “compensate for environmental changes” and must then require an “optimization process to achieve desired display performance.”

Petition at 60 (citing EX1007, 5:8-12). In other words, Petitioner argues that the ability to “compensate for environmental changes” inherently includes “optimization process to achieve desired display performance” that further incorporates the use of sensor data. Petitioner’s inherency argument is improper. *Persion Pharms. LLC v. Alvogen Malta Operations Ltd.*, 945 F.3d 1184, 1191 (Fed. Cir. 2019) (“Inherency, however, is a ‘high standard,’ that is ‘care-fully circumscribed in the context of obviousness.’”) (citing *PAR Pharm., Inc. v. TWI Pharms., Inc.*, 773 F.3d 1186, 1195 (Fed. Cir. 2014)). Petitioner has not met its “high burden” here. A POSITA would not have considered it inherent that a display’s ability to “compensate for environmental changes” utilizes sensor data. EX2001, ¶94. A POSITA would have understood that many types of feedback could be used to “dynamically modify [the] outputs” as Da Costa describes. *Id.* For example, temperature, voltage, and physical constraints of the circuits themselves could provide a basis for “dynamically modifying [the] outputs” as Petitioner claims and therefore it is not inherent that Da Costa would utilize sensor data. *Id.* Thus, a POSITA would not have read Da Costa to require the use of a sensor, contrary to Petitioner’s contention. *Id.* Petitioner’s failure to demonstrate more than the “mere possibility” that Da Costa uses sensor data renders this Ground deficient. *Persion Pharms*, 945 F.3d at 1191 (“Inherency ‘may not be established by probabilities or possibilities,’ and ‘[t]he mere fact that a certain

thing *may* result from a given set of circumstances is not sufficient.”) (quoting *In re Oelrich*, 666 F.2d 578, 581 (CCPA 1981)). In addition to the improper inherency argument, Petitioner’s contention suffers from hindsight bias and attempt to reverse engineer Da Costa to meet the claim limitations of the ’788 Patent. EX2001, ¶95; *see also KSR Int’l Co. v. Teleflex Inc.*, 550 U.S. 398, 421 (2007) (“A factfinder should be aware, of course, of the distortion caused by hindsight bias and must be cautious of arguments reliant upon *ex post* reasoning.”); *Metalcraft of Mayville, Inc. v. Toro Co.*, 848 F.3d 1358, 1367 (Fed. Cir. 2017) (“[W]e cannot allow hindsight bias to be the thread that stitches together prior art patches into something that is the claimed invention.”).

D. Ground 3 – The Challenged Claims are Not Unpatentable Under 35 U.S.C. § 103(a) As Obvious Over Liaw (EX1005) in view of Greene (EX1006) in further view of Matsui (EX1008).

Ground 3 of the Petition relies upon the combination of Liaw, Greene, and Matsui. Petitioner’s addition of Matsui fails to address the substantial deficiencies of Petitioner’s Ground 1 thus fails to provide any basis for institution. *See supra*, at Section VI.B. Moreover, for the same reasons as Ground 1, a POSITA would not have been motivated to combine Liaw with Greene. *See supra*, at Section VI.B.1. A POSITA would find Matsui’s system further inapplicable and redundant to those in Liaw and Greene, as Matsui describes a system where “a gamma correction curve and common electrode voltage are synchronously changed in

accordance with the detection result and thereby luminance adjustment is performed” and “[t]herefore, it is possible to automatically perform luminance adjustment correspondingly to changes of the peripheral condition used.” EX1008, 7:31-39; EX2001, ¶99.

1. Petitioner Fails to Cure the Deficiencies of Liaw and Matsui identified in Prosecution.

As described in detail above, Petitioner asserts Matsui for the same purpose and disclosure identified by the Examiner during prosecution. *See supra*, at Section II.E. (wherein the Examiner’s argument that “it would have been obvious to one of ordinary skill in the art to incorporate Matsui's external light detection into Liaw's display, as this further provides capability to adjust gamma correction according to different ambient display condition, thus resulting in an optimal display independent of ambient lighting condition” was subsequently overcome during prosecution) (citing EX1002, 97). Petitioner’s failure to correct or discuss *how* or *why* the Examiner was incorrect or how the disclosures of Greene would otherwise correct this duplicative argument already addressed by the office, is fatal to Petitioner’s Ground 3. *See Endo v. Scianamblo*, No. IPR2018-01322, Paper 15 at 7 (P.T.A.B. Jan. 14, 2019) (“On the record before us, we do not find that Petitioner has shown sufficiently how the Examiner erred in evaluating the asserted prior art. This evidence clearly weighs in favor of denying institution.”) (citations

omitted). Further, as described above, the Applicant demonstrated that Liaw contains no reprogrammable or non-volatile functionality, as required by the claims. *See* EX1002, pp.74-79. Petitioner's failure to demonstrate a motivation to combine any such functionality in Matsui with the system in Liaw renders Ground 3 deficient.

2. Liaw, Greene, and Matsui do not disclose the “reprogrammable and non-volatile” integrated circuit requirements as recited by Independent Claim Limitations 1[1], 3[3], and 5[1].

For the same reasons discussed in response to Petitioner's Ground 1, Liaw and Greene fail to disclose claim limitations 1[1], 3[3], and 5[1]. *See supra* at Sections VI.B.2 and 3. Petitioner concedes that Matsui does not disclose the use of “reprogrammable and non-volatile” memory, but instead asserts that “a POSITA would have understood that the adjusted settings would need to be retained when power is removed for the adjustments to be useful, *implying some form of non-volatile storage.*” Petition at 64. Matsui's alleged optimization does not “imply some form of non-volatile storage” is present, despite Petitioner's expert's hindsight. EX2001, ¶103. Matsui teaches away from the use of “reprogrammable and non-volatile” memory as it describes two methods for correction: 1) a “manually adjustable” system, and 2) a “synchronously” adjusting system based on detection of light intensity around apparatus. EX1008, 6:16-24; EX2001, ¶104. In

either system, a POSITA would have readily understood that there is no need to reprogram or store gamma voltages after the device is powered off, because the system will still need to be “manually” or “synchronously” adjusted once turned back on. EX2001, ¶104. The dynamic character of Matsui’s apparatus is the objective, for example, it describes “synchronously adjusting” the luminance based on a detected tilt of the display screen. EX1008, 6:25-30. Thus, a POSITA would not have sought to add reprogrammable and non-volatile storage to Matsui’s dynamically adjusting apparatus. EX2001, ¶105.

3. Liaw, Greene, and Matsui do not disclose a “means for executing said predetermined algorithm” as recited by Independent Claim Limitations 1[4] and 5[5].

As noted in Section III.A above, Petitioner failed to construe this term, which is included in claim limitations 1[4] and 5[5] and, therefore, the Board should deny institution to Claims 1-2 and 4-6 on this basis alone. *See* CTPG at Section II.B.6 (citing 37 C.F.R. § 42.104(b)(3)). For the same reasons discussed in response to Petitioner’s Ground 1, Liaw and Greene fail to disclose claim limitations 1[4] and 5[5]. *See supra* at Sections VI.B.2 and 3. Left with only Matsui, Petitioner omits any discussion of whether Matsui discloses claim limitations 1[4] and 5[5], rendering its challenge to those claim limitations materially deficient. *See* Petition at 64, 69-70.

E. Ground 4 – The Challenged Claims are Not Unpatentable Under 35 U.S.C. § 103(a) As Obvious Over Liaw (EX1005) in view of Da Costa (EX1007).

The alleged combination of Liaw and Da Costa only amplify the noted deficiencies of the references, as both are directed to the real-time dynamic use of gamma correction and, therefore, are antithetical to the claims of the '788 Patent. Petitioner incorrectly asserts that “a POSITA would have been motivated to incorporate Da Costa’s programmable registers and digital-to-analog conversion circuitry into Liaw’s gamma correction system to provide more flexible and dynamic control over gamma reference voltages.” Petition at 71. As repeatedly stated, however, both Liaw and Da Costa are directed to dynamic gamma correction and, therefore, a POSITA would not have consulted either reference for the purpose of combining them to create a reprogrammable, non-volatile system such as those claimed in the '788 patent. *See supra*, at II.F.5; EX2001, ¶109.

1. Liaw and Da Costa do not disclose the “reprogrammable and non-volatile” integrated circuit requirements as recited by Independent Claim Limitations 1[1], 3[3], and 5[1].

For the same reasons discussed in response to Petitioner’s Grounds 1 and 2, Liaw and Da Costa fail to disclose claim limitations 1[1], 3[3], and 5[1]. *See supra* at Section VI.B and C.

2. Liaw and Da Costa do not disclose a “means for executing said predetermined algorithm” as recited by Independent Claim Limitations 1[4] and 5[5].

For the same reasons discussed in response to Petitioner’s Grounds 1 and 2, Liaw and Da Costa fail to disclose claim limitations 1[4] and 5[5]. *See supra* at Section VI.B and C.

VII. CONCLUSION

For the foregoing reasons, Phenix respectfully requests that the Board deny all grounds of challenge, dismiss the Petition, and decline to institute *inter partes* review.

Dated: March 12, 2025

Respectfully submitted,

/ Rodney R. Miller/

Rodney R. Miller (Reg. No. 66,073)

Lead Counsel for Patent Owner

IPR2025-00044

U.S. Patent No. 7,557,788

CERTIFICATE OF COMPLIANCE

Pursuant to 37 C.F.R. § 42.24(d), the undersigned certifies that this Preliminary Response complies with the type-volume limitation of 37 C.F.R. § 42.24(b). The word count application of the word processing program used to prepare this Preliminary Response indicates that the Preliminary Response contains 12,271 words.

Dated: March 12, 2025

Respectfully submitted,

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Rodney R. Miller (Reg. No. 66,073)

Lead Counsel for Patent Owner

IPR2025-00044

U.S. Patent No. 7,557,788

CERTIFICATE OF SERVICE

Pursuant to 37 C.F.R § 42.6(e), I hereby certify that a true and correct copy of the foregoing was served on Counsel for Petitioner via filing through the P-TACTS System, as well as by delivering a copy via electronic mail to the following:

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