

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

APPLE, INC., ET AL.
Petitioner

v.

AMERANTH, INC.
Patent Owner

Case CBM2015-00080
Patent No. 6,384,850

MAIL STOP PATENT BOARD
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PATENT OWNER'S PRELIMINARY RESPONSE

TABLE OF CONTENTS

	<u>Page</u>
I. STATEMENT OF PRECISE RELIEF REQUESTED	1
II. INTRODUCTION.....	1
III. OVERVIEW.....	8
A. 35 U.S.C. §103 Overview	8
B. Overview Of Turnbull Declaration Errors And Omissions.....	13
C. Overview Of Petition Errors And Omissions.....	19
IV. THE PETITION SHOULD BE REJECTED FOR IMPROPER INCORPORATION BY REFERENCE	23
V. CLAIM CONSTRUCTION	24
A. PO’s Proposals In Juxtaposition To Petitioner’s Flawed Proposals And Non-Proposals	27
1. “wireless handheld computing device”	28
2. “central database”	28
3. “web page”	28
4. “communications control module”	29
5. “synchronized”	30
6. “applications and data are synchronized between the central database, at least one wireless handheld computing device, at least one web server and at least one web page”	30
7. “wireless handheld computing device on which hospitality applications and data are stored”	32
8. “hospitality applications”	35
9. “API,” “outside applications” and “integration”	36
10. “single point of entry for all hospitality applications”	38

11. “automatic” 39

12. “digital data transmission” 39

B. Claim Construction Analysis Summary 40

VI. PETITIONER HAS NOT SHOWN THAT ANY OF CLAIMS 12-16 ARE MORE LIKELY THAN NOT OBVIOUS 41

A. Overview 41

B. Challenge 1: Inkpen/Digestor/Nokia..... 43

 1. Overview of References..... 43

 2. Synchronization, “applications and data” 45

 3. Integration/API/Outside Applications..... 46

 4. CCM, Protocols..... 47

 5. Wireless Handheld (Element “b”) vs. “Web Page” (Element “d”)..... 48

 6. Claim as a whole 50

C. Challenge 2: DeLorme 51

 1. Overview of Reference 51

 2. Synchronization, “Applications and Data” 52

 3. Integration/API/Outside Applications..... 53

 4. CCM/Protocol 54

 5. Handheld/Web page..... 55

 6. Claim as a whole 57

D. Challenge 3: Blinn/Inkpen 58

 1. Overview of References..... 58

 2. Synchronization, “applications and data” 60

 3. Integration/API/Outside Applications..... 62

- 4. CCM-Protocols 63
- 5. “Wireless Handheld,” “Web Page” 63
- 6. Summary as to Blinn/Inkpen..... 64
- E. Dependent Claims 65
- F. Objective Evidence Of Non-Obviousness..... 69
- VII. CONCLUSION 80

TABLE OF AUTHORITIES**Page****Cases**

<i>Allen Archery, Inc. v. Browning Mfg. Co.</i> 819 F.2d 1087 (Fed. Cir. 1987).....	75
<i>Apple v. ContentGuard, Inc.</i> CBM2015-00046, Paper 12.....	1
<i>Apple v. Smartflash LLC</i> CBM2015-00033, Paper 11 at 15-18 (PTAB May 28, 2015).....	42
<i>Bloomberg L.P. v. Quest Corp.</i> CBM2014-00205, Paper No. 16.....	1
<i>CBS v. Sylvania., Inc.</i> 415 F.2d 719 (1st Cir. 1969), <i>cert. denied</i> , 396 U.S. 1061 (1970).....	72
<i>CFMT, Inc. v. Yieldup Int’l. Corp.</i> 349 F.3d 1333 (Fed. Cir. 2003).....	41
<i>Cisco Systems, Inc., v. C-Cation Techs., LLC</i> IPR2014-00454, Paper 12 at 10 (PTAB Aug. 29, 2014).....	24
<i>Continental Can Co. v. Monsanto Co.</i> 948 F.2d 1264 (Fed. Cir. 1991).....	11
<i>DeSilva v. DiLeonardi</i> 181 F.3d 865 (7th Cir. 1999).....	24
<i>Epos Tech. Ltd. v. Pegasus Tech. Ltd.</i> 766 F.3d 1338 (Fed. Cir. 2014).....	26
<i>Ex parte Brud</i> , BPAI Appeal 2009-011707 at 3, 4 (Exh. 2013).....	34

<i>Free Motion Fitness, Inc. v. Cybex Int'l, Inc.</i> 423 F.3d 1343 (Fed. Cir. 2005).....	66
<i>Fresenius USA, Inc. v. Baxter Int'l, Inc.</i> 582 F.3d 1288 (Fed. Cir. 2009).....	43
<i>Heidelberger v. Hantscho Prods.</i> 21 F.3d 1068 (Fed. Cir. 1994).....	78
<i>Hockerson-Halberstadt, Inc. v. Converse Inc.</i> 183 F.3d 1369 (Fed. Cir. 1999).....	25, 26
<i>Hoechst Celanese Corp. v. BP Chem. Ltd.</i> 78 F.3d 1575 (Fed. Cir. 1996).....	22, 49
<i>In re Hoch</i> 428 F.2d 1341 (CCPA 1970).....	50
<i>In re Kahn</i> 441 F.3d at 988.....	64
<i>In re McLaughlin</i> 443 F.2d 1392 (CCPA 1971).....	15
<i>In re Papst Licensing Digital Camera Patent Litigation</i> 778 F.3d 1255 (Fed. Cir. 2015).....	27
<i>In re Roufett</i> 149 F.1350 (Fed. Cir. 1998).....	77
<i>In re Royka</i> 490 F.2d 981 (CCPA 1974).....	41
<i>In Re Sponnoble</i> 405 F.2d 578 (CCPA 1969).....	10
<i>In re Warner</i> 379 F.2d 1011 (CCPA 1967).....	42
<i>Interconnect Planning Corp. v. Feil</i> 774 F.2d 1132 (Fed. Cir. 1985).....	11

<i>KSR Int’l Co. v. Teleflex Inc.</i> 550 U.S. 398 (2007)	43, 64
<i>Medichem v. Rolabo</i> 353 F.3d 928 (Fed. Cir. 2003)	41
<i>Oatey Co. v. IPS Corp.</i> 514 F.3d 1271 (Fed. Cir. 2008)	22
<i>Phillips v. AWH Corp.</i> 415 F.3d 1303 (Fed. Cir. 2005)	27
<i>Plantronics, Inc. v. Aliph, Inc.</i> 724 F.3d 1343 (Fed. Cir. 2013)	11
<i>Power-One, Inc. v. Artesyn Tech., Inc.</i> 599 F.3d 1343 (Fed. Cir. 2010)	78
<i>Rambus Inc. v. Rea</i> 731 F.3d 1248 (Fed. Cir. 2013)	73
<i>Sensonics Inc. v. Aerosonic Corp.</i> 81 F.3d 1566 (Fed. Cir. 1996)	65
<i>Tempur Sealy Int’l, Inc. v. Select Comfort Corp.</i> IPR 2014-01419, Paper 7 (PTAB Feb. 17, 2015)	23, 24
<i>Teva Pharm., Inc. v. Sandoz, Inc.</i> 723 F.3d 1363 (Fed. Cir. 2013)	72
<i>Travelocity v. Cronos Tech.</i> CBM2014-00082, Paper No. 12, Oct. 16, 2014, p. 5	42
<i>Unique Concepts, Inc. v. Brown</i> 939 F.2d 1558 (Fed. Cir. 1991)	33
<i>Vitronics v. Conceptronic, Inc.</i> 90 F.3d 1576 (Fed. Cir. 1996)	49

Other

37 C.F.R. §42.6(a)(3) 2

37 C.F.R. §42.22(a)(2) 2

37 C.F.R. §42.104(b)(4) 2

37 C.F.R. §42.104(b)(5) 2

37 C.F.R. §42.207(a) 1

37 C.F.R. §42.300(b)..... 24

77 Fed. Reg. 157 at 48697-98 (Aug. 14, 2012) 24

35 U.S.C. §101 1

35 U.S.C. §103 1, 8, 80

35 U.S.C. §112 1, 22

35 U.S.C. §312(a)(3) 2

Microsoft Comp. Dict. (4th ed.1999)25, 28, 29, 37, 39, 54

PATENT OWNER'S LIST OF EXHIBITS

Exhibit No.	Description
2001	Food.com Internal Memorandum, "Ameranth Licensing Contract," Sept. 13, 1999
2002	iOS Simulator User Guide, March 9, 2015
2003	Ameranth/Par Technology Corp. License Announcement, Jan. 28, 2013
2004	http://blogs.wsj.com/digits/2014/04/02/apples-jobs-declared-holy-war-on-google-over-android/ , discussing Apple 2010 emails made public in <i>Apple v. Samsung</i> Litigation
2005	The House that Tech Builds, http://hospitalitytechnology.edgl.com/news/the-house-thattech-builds99460?referalttype=newsletter , Hyatt CTO Interview, April 8, 2015
2006	Domino's Press Release, http://www.prnewswire.com/news-releases/dominos-pizza-first-in-industry-to-offer-mobile-ordering58317297.html , Sept. 27, 2007
2007	"Domino's app let's you voice-order pizza," http://www.usatoday.com/story/money/business/2014/06/16/dominos-voice-ordering-app-nuancefast-food-restaurants/10626419/ , June 16, 2014

2008	“Starbucks to roll out innovations in mobile platform-- Company says new mobile features could be ‘holy grail’ of throughput,” http://nrr.com/quick-service/starbucks-roll-out-innovations-mobile-platform , March 13, 2014
2009	“Starbucks’ mobile order and pay sees hot start, aided by Integration,” www.mobilecommercedaily.com , April 27, 2015
2010	“Agilysys Introduces InfoGenesis Roam Mobile Software,” June 21, 2011
2011	<i>Ex parte McNally</i> , Appeal No. 2012-001503 (PTAB Nov. 4, 2014)
2012	Decision in Appeal No. 2010-000055 (BPAI March 3, 2011)
2013	Decision in Appeal No. 2009-011707 (BPAI Feb. 14, 2011)
2014	Decision in Appeal No. 2009-008033 (BPAI Jan. 28, 2011)
2015	Excerpts from Microsoft Computer Dictionary (4th ed. 1999)
2016	“The Computerworld Honors Program--Case Study,” Award to Marriott International, Inc. (2006)
2017	Decision in BPAI Appeal No. 2011-004999 (PTAB Oct. 17, 2013)
2018	Transcript of FS/TEC Awards Presentation (Feb. 2009)

I. STATEMENT OF PRECISE RELIEF REQUESTED

In accordance with 37 C.F.R. §42.207(a), Patent Owner, Ameranth, Inc., (“PO”) submits this Preliminary Response to Petitioner’s belated, second, Covered Business Method (“CBM”) review (“Petition” or “Pet.”) against U.S. Patent No. 6,384,850 (“the ‘850 patent”). For the reasons below, the Petition for review of claims 12-16 should be denied because the claims are not invalid under 35 U.S.C. §103.¹

II. INTRODUCTION

Petitioner’s first attempt to invalidate **original** claims 12-16 of Ameranth’s ‘850 patent based on 35 U.S.C. §101/112 (filed 16 months earlier) failed entirely, just as this belated second attempt under 35 U.S.C. §103 fails.

Petitioner’s five asserted references, comprising three different obviousness challenges, each have fatal shortcomings. They teach away from the claimed invention, would require substantial changes to their principles of operation, and fail to teach or suggest critical claimed features (mostly ignored by the Petition while relying on incorrect constructions and failing to even consider the most important claim terms). The Petition also violates multiple case law directives, rules and regulations,

¹ Petitioner’s standing argument merely references CBM2014-00016, and is thus insufficient. PO submits that Petitioner was required to provide, in the Petition, the basis for standing. Also note that the PTAB has recently held that claims having structural similarities to the ‘850 claims were directed to a technological invention. *See Bloomberg L.P. v. Quest Corp.*, CBM2014-00205, Paper 16; *Apple v. ContentGuard, Inc.*, CBM2015-00046, Paper 12. Moreover, the cited prior proceeding involved a different patent and different claims, and relies on a claim recitation, “applicable to a predetermined type of ordering,” which does not appear in any ‘850 claim. Petitioner’s entire basis for standing is that the “ordering” in this phrase relates to the ordering of a meal at a restaurant.” (Pet. at 7). The Petition thus fails *ab initio*.

each violation individually compelling denial.² Additionally, the Petition fails because it does not identify sufficiently the differences between the claims-at-issue and the purported prior art references.

These hospitality based claims represent an extraordinarily visionary and multi-faceted “system of systems”—with both the applications **and** the data innovatively and uniquely synchronized **and** integrated—between both hospitality **and** non-hospitality applications, and including web, wireless, and handheld devices (for both consumer **and** staff use)—all leveraging a single central database storing the hospitality applications and data. The PTAB clearly recognized the multi-faceted specificity of these five claims in the prior proceeding:

The **combination** of these components **interact in a specific way to synchronize applications and data** between the components and **outside application** that is **integral to the claimed invention** and **meaningfully limit** these claims.

CBM2014-00015, Paper 20 at 24 (emphasis added).

[C]laim 12’s limitation “**applications and data are synchronized** between the central database, at least one wireless handheld computing device, at least one Web server and at least one Web page” is a further limitation that is **directed to** the system’s ability to **synchronize applications and data**.

Id. at 15-16 (emphasis added). The claimed inventive features/elements recognized by the PTAB as meaningfully specific were clearly core to Ameranth’s 1998-99 invention, the claims of the ‘850 patent and to Ameranth’s own 21st Century

² The Petition violated numerous rules/requirements promulgated under the AIA, including: 37 C.F.R. § 42.6(a)(3); 37 C.F.R. § 42.22(a)(2); 37 C.F.R. § 42.104(b)(4); 37 C.F.R. § 42.104(b)(5) and 35 U.S.C. § 312(a)(3).

Restaurant™ and 21st Century Hotel™ “system of systems.” Such “systems of systems” have become a ubiquitous reality now in 2015, and are in widespread use across the entire spectrum of hospitality companies and applications. The recognition of this claimed subject matter as innovative and non-obvious has been repeatedly confirmed by petitioners and defendants themselves whom, after copying Ameranth’s inventions, cannot refrain from boasting about their own uses of those inventions—often claiming the ‘850 inventions as **their own** breakthroughs, and in some cases even seeking awards for themselves for Ameranth’s technology (including defendant Marriott, who’s late-1990s system is the subject of the very base reference that Petitioner’s obviousness challenges now seek to rely on).³

Significantly, Marriott copied and claimed for itself the very inventions of claims 12-16 of the ‘850 patent after Ameranth provided information regarding the subject matter in 1999/2000 at Marriott’s request.⁴ In a February 3, 2000 letter from Steve Glen, Marriott VP, to Ameranth’s Keith McNally, Glen confirmed that Marriott was “**very interested**” in the “**innovative features**” of Ameranth’s 21st Century Restaurant™ technology, and that Marriott would be “**closely monitoring** your [Ameranth’s] progress with the domestic side of Marriott” and that Marriott hoped that this would “**deliver the breakthrough solutions** that we are seeking.” (Exh. 1012 at

³ Marriott, Starwood, Starbucks, Pizza Hut, Hilton, Dominos, Papa John’s, Micros, Agilysys and many others all received detailed briefings and/or demonstrations of Ameranth’s patented technology during the inventive time frame or thereafter from Keith McNally, lead inventor of Ameranth’s ‘850 patent family, or from his staff.

⁴ Contemporaneous facts detailing the conception of the invention, secondary factors demonstrating non-obviousness and nexus to the claimed invention is further provided below in the section titled “Objective Evidence of Non-Obviousness.”

647, 964) (emphasis added)).

Then, after Ameranth disclosed its “breakthrough” inventions to Marriott, Marriott brazenly sought an award from Computerworld for upgrading its MARSHA system based on the very technology it had learned about from Ameranth. Marriott won that award in 2006, clearly based on Ameranth’s `850 technology as embodied in the same key inventive elements of `850 claims 12 and 13 as were recognized by the Board in the prior CBM (*i.e.*, “synchronization” and “integration” with “outside applications” from a “central database” and “single point of entry” and across “all elements” for “consistency”), thus proving nexus between the copying and the claims.

The following excerpts from the 2006 Computerworld Award make Marriott’s copying abundantly clear, with the **bold** highlighting emphasizing Marriott’s claiming, as its own, the functions of the same key `850 claim 12 elements shown in brackets:

In 2003, Marriott successfully completed an aggressive 11-month **upgrade** to its entire Internet technology architecture and operating environment ... Based on open-systems standards and *fully-integrated* [**“integration”**] with key inventory, *marketing and loyalty programs*. [**“outside applications,”** *e.g.*, “affinity program companies” as disclosed in the `850 patent (Exh. 1001 at 2:13)]

The **integrated** infrastructure [**“integration”**] is focused on delivering value, with impressive results, including: ... **Consistency of information across systems** [**app/data synchronization** and **“single point of entry”**] ... delivered **consistently** at all **locations**. [**app/data synchronization**]

Marriott integrated MARSHA with all of the company’s key business applications and made its entire inventory *available as a single image* [**“central database”**] *in real-time across all channels* [**synchronization**].

Exh. 2016 at 2, 3. Noteworthy is Marriott asserting that the “consistency” of the information, *i.e.*, “synchronization,” needed to occur across both “**systems**” and “**all**

locations” and with a **“single image”** and **“integrated”** with **“marketing and loyalty programs”** just as the ‘850 claims recite and Ameranth had disclosed to Marriott.

All three major pizza company defendants also copied the claimed technology and received a joint technology innovation award in 2009 for deploying it, including the **“interfaces with social networks”** (**“outside applications”**) aspect of claim 12 of the ‘850 patent (**“outside applications”** include, *e.g.*, **“affinity program groups”**—social networks):

[T]he 2009 FS/TEC innovation awards are simultaneously being presented to **Domino’s Pizza Inc., Papa John’s International Inc., and Pizza Hut Division** of Yum Brands Inc. From development of **mobile device ordering platforms to interfaces with social networks**

Presentation of Rob Grimes (FS/TEC CEO), FS/TEC 2009 Awards transcript⁵ at 10:33 (Exh. 2018) (emphasis added). Further, in receiving its award, Pizza Hut admitted that it had tried but failed to integrate mobile ordering with affinity program groups:

[I]n the late 90s, we really made a run at this ***and it wasn’t successful***

Statement of Delaney Bellingers - Pizza Hut, FS/TEC 2009 Awards transcript at 12:29 (Exh. 2018) (emphasis added) (thus demonstrating "failure of others").

This copying and claiming for themselves by giant company infringers has continued unabated into 2015, and they now use even more self-laudatory terms to describe what they copied from Ameranth. For instance, Starbucks claimed the entirety of Ameranth’s inventions/claims as its own self-described **“holy grail”** in 2014,⁶ just

⁵ Video/Audio in possession of PO.

⁶ “Starbucks to roll out innovations in mobile platform,” March 13, 2014 (Exh. 2008) (“Starbucks is poised to unveil innovations **within its mobile platform** that will include ordering ahead and new payment features that the company has called a potential **“holy grail”** for throughput. ... Management referred to **mobile ordering** as

before filing Petitions of its own (CBM2015-00091, -00099) asserting the opposite—*i.e.*, that everything Starbucks now refers to as a “holy grail” **for itself** was obvious/known back in 1998. The very subject matter of ‘850 claims 12-16, including the visionary “single point of entry” for all hospitality applications (claim 13)—integrated with a **mobile** application on handhelds was, less than two months ago, on April 27, 2015, praised by Starbucks as its own “ecosystem” which is providing Starbucks the very benefits Ameranth envisioned, invented and claimed long ago:

Kevin Johnson, Starbucks’ president and COO, said the company is seeing the benefits of having a **mobile** commerce platform that **integrates loyalty, a mobile application, a loyalty card program and in-store point of sale system**. This is not a bolt-on, this gets to **leverage** that existing **ecosystem**.

(Exh. 2009) (emphasis added). And just shortly before that, the CTO of a petitioner against these same ‘850 claims (in CBM2014-00015), Hyatt Hotels, also claimed the core inventive aspects of claims 12-16 as his own and in effect declared “eureka” for himself and Hyatt, even copying ‘850 claim 13’s innovative “single point of entry” claim element almost word for word both in French “mise en place” and in English (“**single API/API Façade**”):

There’s a metaphor that I like to use to describe what this technology platform is: I compare it to **mise en place**, which is a French phrase that translates to “**everything in its place**.” In a technology platform, the ingredients are our data from different sources, **for example reservations systems, loyalty systems, the CRM platform, and so on**. These are typically all housed in different places on the back end. Using what we call an **API façade**, we are presenting what **appears to be a single API** that front-end developers can use to access this data very quickly and

the potential “**holy grail**” of throughput”) (emphasis added).

efficiently. We can enable front-end developers to quickly create and iterate on new user interfaces. The goal is to simplify **a collection of APIs into one uniform API.**

Quotes from Matt O’Keefe, Hyatt CTO, April 8, 2015 (Exh. 2005) (emphasis added).

Thus, as recently as a few months ago, the core ideas long ago conceived, claimed and first deployed by Ameranth were being praised and claimed as breakthroughs by co-petitioners and co-defendants of the present Petitioner companies who nonetheless are arguing obviousness in their Petition. Despite these readily apparent contradictions and conflicting positions (those above are just exemplary, many more are detailed below in the objective evidence section of this response), Petitioner challenges these same ‘850 claims yet again, but they were simply **not** obvious in 1998 as evidenced, *inter alia*, by what is going on right now.

Ameranth was the **first** to identify the actual problem to be solved, **first** to invent the synchronous and integrated technology to solve it, **first** to introduce products based on its inventive solution, **first** to win multiple best-product awards for the products/technology embodying the claims of the ‘850 patent, **first** to receive public praise for its products and the inventive technology (including from Petitioner companies), **first** to patent that technology and **first** to license the patented technology.

In fact, the ‘850 inventions first publicly disclosed in the Fall of 1998 were almost immediately recognized as such by the entire hospitality market (and they were not inventions by, *e.g.*, Marriott, Starbucks or Hyatt), as demonstrated by the overwhelming objective evidence in the record of the family of the five issued patents, as discussed below. Just recently, and once again, claims in this family were determined to be non-obvious, this time unanimously by a panel of three other ALJs,

when Ameranth's 5th patent of the family (U.S. 9,009,060), issued on April 14, 2015.⁷ Only by a fictionalized hindsight-induced telling of the actual story of what happened in the hospitality field could '850 claims 12-16 be determined to have been obvious in 1998. However, 35 U.S.C. §103 requires actual evidence, not fiction, and in accordance with precedent and the Rules of the Board. The Petition clearly fails.

III. OVERVIEW

A. 35 U.S.C. §103 Overview

Analyzing obviousness at the time of the invention, as required, is not a simple or easy task, particularly because the invention was first conceived in 1998, many years ago and long before many technological advancements which are today taken for granted. But the burden is on Petitioner to prove obviousness, which it fails in multiple ways (technically, factually, procedurally, and legally). Petitioner is simply **wrong** in its characterizations of the invention/claims, the asserted prior art and everything in the Petition which bears on either.

The inventive **solution**, as defined in these “system of system” claims of the '850 patent, simply was not obvious to any POSA⁸ in the Fall of 1998, and was not apparent to Mr. McNally (Ameranth's founder and lead inventor—clearly a POSA) or his co-inventors until they conceived it. In fact, until then (Fall of 1998), like the entire hospitality marketplace, Mr. McNally and his co-inventors had not themselves previously recognized the actual underlying multi-

⁷ *Ex Parte McNally*, No. 2012-001503 at 4 (PTAB Nov. 4, 2014) (Exh. 2011) (“Appellant argues that the references **do not disclose** application software enabled to **configure hospitality data for display** on the non pc standard display sized screen of a wireless handheld device. **We agree.** .”) (emphasis added).

⁸ PO does not materially dispute Petitioner's definition of the skill level of a POSA.

dimensional synchronization, integration and menu generation **problem** needing to be **solved** in the industry (aspects of which are encompassed by claims 12-16).

The hospitality market challenge faced by the ‘850 inventors was unlike the challenges in any other field.⁹ Nowhere else did a customer expect to have a customized product produced and delivered to them “on the spot” and made “their way” and, in the quick-service restaurant or pizza markets, literally created/delivered to the customer in a matter of “minutes.” The *time criticality* of the hospitality market challenge is clearly stated in the ‘850 specification.¹⁰ The challenge/problem that Mr. McNally and his co-inventors first recognized in 1998 was how to seamlessly integrate wireless handheld and web-based ordering to the existing restaurant/hospitality systems using their existing database, without requiring a wholesale and fundamental change to the existing systems, without manual programming of each handheld and while still yielding an easy to use and customized operator interface for both restaurant staff and remote customers to place precise orders, so that customers would have it “their way”—all the while maintaining synchronization across the whole system. This is clearly explained in the ‘850 patent:

These challenges include building a menu using their existing database and transferring the menu onto hand-held devices or Web pages that will interface with servers wirelessly or to

⁹ Exh. 1001 at 1:32-36 (“[U]ser-friendly information management and communication capability not requiring extensive computer expertise **has not heretofore been available** for use in everyday life such as for **restaurant ordering, reservations and wait-list management.**”) (emphasis added).

¹⁰ Exh. 1001 at 1:54-55 (“**the time criticality** of ordering, reservation and wait-list management and other similar applications.”) (emphasis added).

restaurants/customers over the internet. The menu generation approach of the present invention is the first coherent solution available to accomplish these objectives easily and allows one development effort to produce **both the handheld and web page formats**, link them **with the existing POS systems** ...

Exh. 1001 at 3:49-58 (emphasis added). Further, this problem needed to be solved as part of an overall synchronized and integrated “system of systems”—not only across technology modes—but also with and between other hospitality and non-hospitality applications as well. These problems were solved by the inventors, and various aspects of that solution are encompassed by ‘850 claims 12-16.

The salient question regarding the present Petition is whether both the “problems” and the “solution” were obvious to a POSA back in August 1998. Both must have been obvious to warrant the sanction of invalidation, because being the first to identify a previously unrecognized underlying problem indicates non-obviousness.¹¹ Ameranth’s inventors *were the first* to identify the actual underlying problems and the first to solve them as evidenced by the specification disclosure and claims. However, using the ‘850 specification, drawings and claims as a guide, as well as the very extensive prosecution history files (from the entire patent family) and the benefit of observing the technological advancements of the last 15+ years, Petitioner and its expert Turnbull now, in 2015, allege that everything claimed was obvious by little more than a wave of the hand, devoid of any serious examination of the claims, specification or alleged prior art. But it is well recognized that what might appear via hindsight to have been obvious long

¹¹ “[A] patentable invention may lie in the discovery of the source of a problem.” *In Re Spinnoble*, 405 F.2d 578, 585 (CCPA 1969).

ago, in fact often was not.¹²

Fortuitously, the actual factual history is documented, as shown herein and in the record of U.S. Pat. No. 8,146,077 (“‘077”) (which is fully available in consideration of the present Petition against the ‘850 patent), and compels a conclusion of non-obviousness.¹³ It is a requisite of Supreme Court precedent that, if objective evidence exists, as to what the marketplace truly thought about the uniqueness of the invention at the time and subsequent thereto, such evidence **must** be considered in an obviousness analysis. Such evidence exists in spades, yet the Petition ignored it entirely, despite Petitioner filing an exhibit including numerous objective evidence declarations. (Exh. 1012 at 541-724, 860-906, 944-70, 972-1017, 1025-26). This was error.¹⁴

Evidence from the time of the invention, from actual market participants, is the most accurate determinant of obviousness.¹⁵ Petitioner’s base references

¹² We are admonished that “[t]hat which may be made clear and thus ‘obvious’ to a court, with the invention fully diagrammed and aided . . . may have been a breakthrough of substantial dimension when first unveiled.” *Interconnect Planning Corp. v. Feil*, 774 F.2d 1132, 1138 (Fed. Cir. 1985).

¹³ The only reason that the §1.131 and 1.132 Declarations present in the ‘077 file (reflecting the then-contemporaneous events) were not filed in the ‘850 prosecution, was that the ‘850 claims were allowed without any need for same.

¹⁴ The Federal Circuit “has consistently pronounced that **all evidence** pertaining to the objective indicia of non-obviousness **must be considered before** reaching an obviousness conclusion.” *Plantronics, Inc. v. Aliph, Inc.* 724 F.3d 1343, 1355 (Fed. Cir. 2013) (emphasis added) (“The significance of this fourth *Graham* factor **cannot be overlooked** or be relegated to ‘secondary status.’”) (emphasis added).

¹⁵ See, e.g., *Continental Can Co. USA, Inc. v. Monsanto Co.*, 948 F.2d 1264, 1273 (Fed. Cir. 1991) (“The significance of a new structure is often better measured **in the**

Inkpen/Marriott and Blinn were from Petitioner Marriott (CBM2014-00015) and Microsoft/Expedia.¹⁶ What did Marriott (one of the world's largest hotel companies, then and now) and Microsoft (the world's largest software company, then and now) **truly** think as to the "obviousness" of Ameranth's inventions at the time of the invention? Marriott referred to the inventions as "innovative," and then copied them, and Microsoft praised,¹⁷ partnered with and invested in Ameranth to gain access to Ameranth's technology, *i.e.*, as manifested by the then-pending '850 patent application, which was Ameranth's only relevant intellectual property asset at the time. It is preposterous for Petitioner to allege now, 15+ years later, that a POSA would have found Ameranth's inventions obvious at the time based on any combination involving documents or technology of Marriott or Microsoft. Clearly, the actions of those companies alone, at the time, compel a conclusion of non-obviousness. Extensive contemporaneously-documented objective evidence of non-obviousness, including extensive and multi-faceted confirmations of nexus of the documented licensing, praise/awards, copying, failure of others and commercial success to the claimed invention, is further provided below.

marketplace than in the courtroom.") (emphasis added).

¹⁶ Note that Microsoft owned Petitioner Expedia (CBM2015-00095, -96, -97) at the time of the invention and up until the Summer of 2001.

¹⁷ "Ameranth provides a **total turnkey solution** integrating Pocket PC's with wireless networks, and **linking them** to PC servers, and the internet" (Statement of Doug Dedo, Group Product Manager, Mobile Devices Division, Microsoft, May 22, 2000 (Exh. 1012 at 552, 661)) (emphasis added).

B. Overview Of Turnbull Declaration Errors And Omissions

The Petition's reliance on the Turnbull Declaration is misplaced and the Declaration itself is fatal to the entire Petition. **First**, it is clear that Turnbull did not read or consider the Board's conclusion as to these claims from the first petition (CBM2014-00015) and that he did not even fully read or consider the specification. For example, he entirely missed the disclosure of restaurant menus on wireless handhelds which is clearly shown in '850 Figure 7. Turnbull stated:

It is notable that there are **no figures** depicting the **restaurant menu** content generated **on a wireless handheld device**.

Turnbull Dec. at ¶58 (Exh. 1002). However, the '850 patent states, in reference to Figure 7's disclosure of a wireless handheld interface:

Figure 7 is a schematic representation of a **point of sale interface on the wireless handheld**

Exh. 1001 at 4:52-53 (emphasis added). '850 Figure 7 clearly shows a "restaurant menu" on a *wireless handheld device user interface*. (Exh. 1001, Fig. 7). Thus all of Turnbull's conclusions were indisputably based on his having completely omitted this vital disclosure/teaching from his analysis, leading in part to his incorrect assessments relative to claim 12 element "b" (the "wireless handheld computing device" limitation) and of the claims overall.

Further, Turnbull admitted that he did not understand the actual synchronization aspects of the invention as required in '850 claim 12, first wherein clause, leading him to mis-construe the claim meaning and scope and to mis-apply the construction he purported to apply. He further read out "applications and" from what is synchronized per the claims. Turnbull stated:

I have considered interpretation of this phrase as used in the '850 and '325 patents. From my review, I believe that the phrase is **incongruent**

with how a POSITA would describe any similar application functionality. Turnbull Dec. at ¶81 (Exh. 1002) (emphasis added). PO submits that in fact it is only Turnbull's **arguments** which are "incongruent" with the actual, properly construed and considered claimed invention as a whole.

Second, Turnbull mixed up claim elements with one another, impermissibly applied the same structure of the prior art against multiple and different claim elements and omitted entire critical claim terms/elements from his constructions/consideration (e.g., "integration") and thus he omitted such elements entirely from his §103 prior art mappings. For example, the Petition, in relying on the Turnbull Declaration, states:

- b) The "communications control module" is **mapped onto** the THISCO switch. Ex. 1002 ¶ 117b.
- c) The "outside applications" are **mapped onto** the GDSs. Ex. 1002 ¶ 117c.
- d) The "application program interface" is **mapped onto** the code on the THISCO switch that translates the messages and commands in the various GDS protocols such as the TPF protocol to the format and protocol accepted by MARSHA. Ex. 1002 ¶ 117d.

Pet. at 33 (emphasis added). However, the Thisco switch cannot satisfy two different software-based claim elements at the same time (in fact it cannot meet any—because it is a hardware device as discussed below). There is no disclosure of what the GDSs were, but they clearly were not "outside applications," nor does the Petition explain how they are "integrated" with the system as required by claim 12 due to the fact that Turnbull and Petitioner entirely read out the **integration** term (as properly construed). Further, the Petition's approach of **mapping** the disclosures of the prior art to the claim elements by an expert using the '850 "claims as a frame"¹⁸ is a classic use of hindsight

¹⁸ See IPR2015-00284 non-Inst. Dec., Paper 14 at 16, May 27, 2015 ("Using the '058

as the source of and guide for the combinations.

Third, when unable to find a disclosure of critical claim functionality, Turnbull simply parsed out those terms from his constructions and from his review overall, for example, his complete omission of “**applications and**” from the critical “wherein *applications and* data are synchronized ...” element, the importance of which was well understood by the PTAB as is reflected in the citation above from the CBM2014-00015 ruling. Thus, Turnbull and the Petition missed and failed to even consider one of the fundamental tenets of the claims/invention, *i.e.*, that **both** the “applications” and the “data” are synchronized, not merely the “data”—as Petitioner’s incorrect characterization assumed despite the explicit claim language to the contrary. Turnbull seemingly viewed ‘850 claims 12-16 as simply reflecting the placing of an order via a handheld device:

The use of such **wireless handheld devices for taking and communicating orders** from customers was known to shorten the time necessary for the servers **to bring orders** to customers.

Pet. at 25 (emphasis added). However the PTAB has already disagreed, which confirms that Petitioner and others in CBM2014-00015 have made the same mistake here as they did in their first Petition, by oversimplifying the claims. That has now resulted in Turnbull’s entirely missing or reading out the requirement to synchronize **both** the “applications” and the “data.” In CBM2014-00015, the Board stated:

We do **not view these claims** as reciting merely the abstract idea of “placing an order or reservation using a general purpose computer and

patent claim as the **basis for** the selection of components to be combined, rather than solely as information available to a person of ordinary skill in the art at the time of the invention, is **not a rationale for combining**, but, rather, **impermissible hindsight.**” (*citing In re McLaughlin*, 443 F.2d 1392, 1395 (CCPA 1971) (emphasis added)).

wireless handheld device,” but rather as **a particular practical application** of the idea of *application and data* synchronization.

Inst. Dec., Paper 20 at 24 (emphasis added).

Fourth, of the claim terms he actually construed/considered, Turnbull repeatedly misconstrued not only individual terms, but also entire claim elements.

Fifth, by misunderstanding the actual invention, Turnbull misapplied his arguments as to the construction/meaning of the claims themselves– even leading him to mistakenly apply purported **hardware device** disclosures against entirely **software-**based claim elements.

Sixth, on top of the five aforesaid critical errors, Turnbull compounded the mistakes by misinterpreting the actual inventions/disclosures and the principles of operation of his chosen prior art selected by hindsight to attempt to fill voids irrespective of how anything actually operated.

Seventh, the entire Petition is impermissibly rife with “incorporations by reference” from the Turnbull Declaration without supporting explanation actually in the Petition itself. This, combined with argument within the claim charts, should also be disallowed. For example, with regard to the Petition’s assertion of the DeLorme reference (a travel/mapping related disclosure which Petitioner mistakenly attempted to characterize as a “hospitality” reference) against what is actually recited in claim 13 (*i.e.*, a “single point of entry ...”), there is not a single piece of actual **evidence** cited in the Petition against the subject matter of this claim. Rather, the entirety of Petitioner’s attempted match-up is merely attorney argument and incorporation by reference:

As discussed above, DeLorme discloses that the TRIPS data is synchronized data between the central database and at least one wireless handheld device (*i.e.* WCU 907) and at least one web page (downloaded

from the TRIPS Internet web site). Ex. 1024 at 14:24-47, 72:37-43, and 72:67-73:6. *See also* Ex. 1002 ¶ 222

Pet. at 60. Ignoring this “argument” and the improper “incorporations by reference,” as the Board should, there is nothing left but an **empty box** in Petitioner’s claim chart, and this is but one example of many such instances.

Worse still, none of this “argument” is technically correct, or even close to it. DeLorme’s WCU is not a “wireless handheld computer” (as properly construed). Nor did it have a “web browser” (required by the Board’s “web page” construction and under Petitioner’s theory of how the combination meets the claims) for downloading or viewing “web pages” (undisclosed as well)—this is abundantly clear from the fact that there is no disclosure of this subject matter or even the recognition of the need for an actual “web page” or HTML in DeLorme (as properly construed) and certainly no disclosure or recognition of a need for “downloading” a web page to a handheld.

Nor is there any disclosure in DeLorme of a “web server” or the need therefor, as is required by claim 12 element “c,” nor even a single reference to the use of HTTP communications or recognition of how it worked and/or the benefits of it, as is clear in the ‘850 specification in support of the internet/web functionality recited in the claims. A mere generic mention of the “internet” is not a disclosure of the specific functionality recited in the claims. In fact, the actual wireless “communications” between the DeLorme back-end system and the disclosed “portable” (two-hand carry/hold) “WCU” is little more than “**yes/no**” responses¹⁹ via DeLorme’s very

¹⁹ “For example, the WCU **907** in FIG. **9** also includes simplified input means **915** whereby the remote TRIPS user **901** can at least answer “+” or “-“, (i.e. “yes” or “no”) by way of reply or come-back to responsive communications from the TRIPS provider” (Exh. 1024 at 73:66-74:3; *see also* Exh. 1024 at 74:4-29).

limited and proprietary “packets” based protocol.²⁰ The PTAB itself has recognized the very limited nature of the DeLorme disclosure in rejecting an argument similar to the characterization of DeLorme put forth in the present Petition:

[W]e agree with Appellants ... there is no disclosure of the claimed user entry of a proprietary search term that uniquely identifies a geographical location. As argued by Appellants, the disclosed dialogue between a user and Delorme’s TRIPS travel information system **merely provides for “yes” or “no” responses to the TRIPS system communications.**

October 17, 2013 Appeal 2011-004999 Ruling at 4 (Exh. 2017) (emphasis added).

The woefully inadequate communications means of DeLorme actually teaches away from synchronized user operations with the central database and/or via the internet and/or with “web pages,” and this alone would have made the claimed systemic synchronization with **both** applications and data and on both handhelds and web pages impossible in the DeLorme system. These are merely a few of the fatal frailties of DeLorme as compared to the multi-faceted systemic claims of the ‘850 patent.

Eighth, despite the legal requirement to consider objective evidence in the record (which Turnbull acknowledged,²¹ but inexplicably did not do), Turnbull entirely ignored the overwhelming amount of objective evidence compelling a non-obviousness conclusion. This evidence includes the fact that Marriott, the purported

²⁰ “FIG 9 reveals two-way communications or transmissions at **903**—preferably wireless to facilitate mobile usage—which involves standard TRIPS data “**packets**” (Exh. 1024 at 73:18-20) (emphasis added).

²¹ “[O]bviousness requires consideration of four factors (although not necessarily in the following order): ... Whatever objective factors indicating obviousness or non-obviousness **may be present** in any particular case.” Turnbull Dec., Exh. 1002 at 23 (emphasis added).

source of the material in Petitioner’s base reference Inkpen, had copied Ameranth’s technology to solve the problems it had with its MARSHA system. Turnbull made no attempt to rebut, explain or argue against any of this evidence in any way despite clearly knowing about the overwhelming bulk of it (including Marriott material), as evidenced by the fact that Petitioner submitted numerous secondary factors declarations as Exhibit 1012 (as part of the prosecution history of the patent family). Turnbull’s opinions are thus legally improper and cannot support the Petition. Thus the Petition innately fails, for lack of evidence and ignoring objective factors evidence, in addition to Turnbull’s numerous other errors and omissions.

C. Overview Of Petition Errors And Omissions

Turnbull’s errors and miscalculations are then reflected throughout each of the Petition’s three obviousness challenges, *i.e.*, (1) the combination of Inkpen, Nokia and Digestor, (2) DeLorme (as discussed above and in more detail below) and (3) Inkpen and Blinn. PO submits that the attempted combination of Inkpen/Digestor produces nothing more than a doubly-convoluted amalgamation of disparate parts/elements (Inkpen itself is a superficially disclosed combination of disparate parts/elements) which relies on a strategy of applying a self-described “**bag of tricks**” to accomplish its fundamental purpose (Digestor). These are not PO’s words or assessment, rather they are the direct assessments/admissions of **the very authors** of the respective Inkpen and Digestor references:

It may sound like a rather “**convoluted route**”
Exh. 1021 at 239-40 (reference p. 230-310 (emphasis added)).

[T]o perform document re-authoring two things are required: a set of re-authoring techniques (a “**bag of tricks**”), and a **strategy** for applying them.
Exh. 1022 at 4 (emphasis added).

The Petition ignored these critical admissions. And the “convoluted” combination included a purported reference of Marriott (Petitioner in CBM2014-00015), the Marriott MARSHA system, whose protocol was admittedly incompatible with HTTP communications—operating on an IBM mainframe under TPF:

Its MARSHA system is based on operating software called transaction processing facility (TPF), which runs on **an IBM main-frame**. This is **totally incompatible** with the **TCP/IP** communications protocols used by the Internet.

Exh. 1021 at 239 (reference p. 230) (emphasis added). The IBM mainframe used by the MARSHA system is then linked to and dependent on a complex hardware “switch” device called “Ultraswitch” from an entirely different company (Cisco).²² None of these hardware-based components can satisfy the software-based elements of 850 claims 12-16 nor would a POSA have imagined to use an IBM mainframe-based approach to practice the entirety of the recited invention (in fact neither did IBM who partnered with Ameranth as part of its 21st Century Restaurant™ system at the time of the invention).²³ Thus it is unsurprising that Marriott, then still relying on the hodgepodge system discussed by Inkpen, upon learning of Ameranth’s inventions in 1999, sought access to said inventions for itself.

In 2000, Marriott obtained access to and tested Ameranth’s technology embodying the ‘850 patent,²⁴ and later copied the Ameranth innovations. Marriott

²² “The newly formed Cisco developed a computerized switch called ‘Ultraswitch’” (Exh. 1021 at 174).

²³ IBM was a launch partner with Ameranth as to the 21st Century Restaurant™ System, in May 1999, at the Chicago NRA Show. (Exh. 1012 at 363, 392).

²⁴ Feb 3, 2000 Letter from Steve Glen, VP of Marriott (Exh. 1012 at 647, 964) (“We are **closely monitoring** your progress with the domestic side of Marriott”) (emphasis

even went so far as to apply for and win a 2006 Computerworld technology award for itself based on that copying five years after Ameranth had won its own award from Computerworld for its much earlier inventions (both awards are discussed below in the context of objective evidence of non-obviousness). These are hardly the actions one would have taken or the statements one would have made in response to an “obvious” idea at the time of the invention. Nonetheless, Petitioner in fact did assert that just such a selection of “convoluted” and unsatisfactory alleged “prior art” rendered the entirety of Ameranth’s multi-faceted “system of systems” claims 12-16 to have been obvious.

Doubling down on the Marriott MARSHA discussion in Inkpen, Petitioner proposed yet another combination with the Marriott MARSHA system, this time with a patent of Microsoft (the Blinn reference), ignoring that Microsoft itself also concurrently sought and obtained Ameranth’s inventive technology through a partnership and a direct investment into Ameranth. Once again, this reality and “inconvenient truth” was simply ignored. Further, the Petition simply ignored the admission and reality of the Inkpen reference, that MARSHA was “**totally incompatible**” with HTTP and the internet (upon which the Blinn reference approach entirely relied) **without** the Cisco hardware Ultraswitch (which the Petition did not include in this combination in any manner whatsoever), thus making the combination entirely inoperable. Further, Petitioner failed to include any wireless handheld disclosure/reference containing a web browser in this combination.²⁵

added).

²⁵ The Petition impermissibly tried to rely on PocketWeb and NetHopper **without** including them in the Petition’s statement of references constituting the combination put forth as grounds for obviousness. The Board has rejected such attempts.

Further, Petitioner's current arguments are belied by, and inconsistent with, arguments it put forth in its prior Petition (CBM2014-00015). First, Petitioner sought to invalidate the '850 claims in the prior Petition based on a 35 U.S.C. §112 theory that the specification did not even teach "web page" implementations and only taught the preferred embodiment of a "database on the handheld." But, inexplicably, Petitioner now has reversed course and bases all grounds for invalidity only on a "mobile web page" being displayed on the handheld via a browser. However, this would impermissibly read out the preferred embodiment²⁶ of a handheld database/application from claim 12 element "b," *i.e.*, storage on the handheld of hospitality applications and data. Petitioner's arguments attempting to limit the claims to only the preferred embodiment were rejected by the Board. However, that does not allow Petitioner to flip its argument 180 degrees and now argue that claim 12 element b is limited to only web page/browser handheld implementations. The opposite is true, as shown below. The attempt to transform the claimed synchronization system invention (pursuant to clearly defined principles of operation) into something which operates by different principles innately fails as to claims 12-16 because these claims are not directed to a "web page only" approach. The Petition fails for this and numerous other reasons as set forth herein.

²⁶ This is because "it is unlikely that an inventor would define the invention in a way that excluded the preferred embodiment, or that persons of skill in this field would read the specification in such a way." *Hoechst Celanese Corp. v. BP Chem. Ltd.*, 78 F.3d 1575, 1581 (Fed. Cir. 1996). Moreover, absent express disavowal of claim scope, claims cannot be construed to exclude a disclosed embodiment. *Oatey Co. v. IPS Corp.*, 514 F.3d 1271, 1276-77 (Fed. Cir. 2008).

IV. THE PETITION SHOULD BE REJECTED FOR IMPROPER INCORPORATION BY REFERENCE

The Petition relies heavily on cites to evidence and supporting documents not included within it, especially (but not limited to) the **301-page** Turnbull Declaration, for arguments, support, and proffered evidence not included or adequately discussed in the Petition itself. This tactic has been repeatedly rejected by the Board, and the Board should apply its Rules here and refuse to consider all information "presented in a supporting declaration [or exhibits] but not discussed sufficiently in a petition."

This is not a situation in which just a few supporting external references are cited. Rather, it is pervasive throughout the entirety of the §103 based arguments, in and outside of the claim charts, and occurring in dozens of instances. *E.g.*, Pet. at 38, 40, 43, 44, 47, 49 (bottom of pages), 37, 40, 41, 45, 48, 49, 50 (top of pages) (this is just for the first challenge; it is continued throughout the Petition). This is an improper attempt to circumvent the 80-page limit. Further, Petitioner included many conclusory arguments within the single spaced claim charts, further opining on the material which was improperly incorporated by reference.

In *Tempur Sealy Int'l, Inc. v. Select Comfort Corp.*, IPR 2014-01419, Paper 7 (PTAB Feb. 17, 2015) the Board held that a petition had several deficiencies that could not be "saved" by a massive expert declaration or other supporting documents. The Board has rejected attempts to incorporate a large expert declaration into a petition:

Incorporation “by reference amounts to a self-help increase in the length of the [] brief[,]” and “is a pointless imposition on the court’s time. A brief must make all arguments accessible to the judges, rather than ask them to play archeologist with the record.” **In the Petition before us, incorporation by reference of numerous arguments from Dr. Roy’s 250-page Declaration into the Petition serves to circumvent**

the page limits imposed on petitions.²⁷

The Petition itself lacks sufficient explanation as to numerous claim elements and cannot resuscitate itself via improperly incorporated exhibits. The "obviousness" portion of the Petition is chock-full of conclusory "It would have been obvious that...", or "a POSITA would be motivated to..." or "a POSITA would understand that..." assertions that have no support or explanation other than in the Turnbull Declaration, and mostly not even there. The effect of packing the Petition with these conclusory statements is, again, that Petitioner has improperly availed itself of "a self-help increase in the length of the brief," which should be rejected.

V. CLAIM CONSTRUCTION

During a review before the Board, the claims of an unexpired patent are provided their broadest reasonable interpretation in light of the specification. 37 C.F.R. § 42.300(b); 77 Fed. Reg. 157 at 48697-98 (Aug. 14, 2012).

The Petitioner and the Board must construe all claims, including all dependent claims (which Petitioner fatally glossed over), before performing any analysis of validity. Further, since the '850, '325 and '077 patents all claim priority from the same application, claims across the entire family of patents must be construed consistently between each other and PO's proposals yield that consistency. While Petitioner perfunctorily proposed a few '850 constructions, it has failed to consider these constructions in the context of the patent family overall. For the few '850 constructions

²⁷ *Cisco Systems, Inc., v. C-Cation Techs., LLC*, IPR2014-00454, Paper 12 at 10 (PTAB Aug. 29, 2014) (emphasis added), citing *DeSilva v. DiLeonardi*, 181 F.3d 865, 866-67 (7th Cir. 1999). Petitioner's use of the Turnbull Declaration is, as in *Cisco* and *Tempur Sealy*, a very large "self-help increase in the length of the brief." The Turnbull Declaration is even larger than the declarations in *Cisco* and *Tempur Sealy*.

it did propose, Petitioner then largely ignored those proposals and made little attempt to actually apply them to an analysis of how the prior art purportedly meets the claims.

Critically, despite the requirement to do so,²⁸ Petitioner failed to consider the claims as a whole and failed to consider all of the pertinent elements of any claim. Petitioner simply provided an incomplete claim chart including random material from the extrinsic references as well as impermissible attorney argument, and conclusorily stated that every claim element was obvious, without any substantive explanations or facts supporting those conclusions.

The scope of the invention, and of the particular '850 claims being challenged yet again (claims 12-16), was abundantly clear to the original Examiner, to the PTAB, and to PO's 36 licensees. Unsurprisingly, only the accused infringers and their experts (Petitioner's expert in the prior CBM was similarly "confused") seem to have difficulty understanding the claims. Having apparently not fully reviewed the specification/drawings, or the Board's prior rulings/determinations respecting these claims, or the vast quantity of objective evidence on the record, having ignored BRI meanings of claim terms clearly known in the field (as evidenced by the 1999 Microsoft Computer Dictionary²⁹) and having misunderstood or mischaracterized critical individual terms/elements, as well as the claims as a whole, as discussed above,

²⁸ See, e.g., *Hockerson-Halberstadt, Inc. v. Converse Inc.*, 183 F.3d 1369, 1374 (Fed. Cir. 1999) ("Proper claim construction . . . demands interpretation of the entire claim in context, not a single element in isolation.").

²⁹ Relied on by the Board, Petitioners in prior proceedings and PO for definitions of terms used in the field at the time of the invention and thus known to a POSA. PO does not propose any constructions from the Microsoft Dictionary or otherwise which are inconsistent with the intrinsic evidence.

Petitioner's expert Turnbull has proposed incorrect constructions in multiple instances.

First, claim terms cannot be construed in a vacuum or on a stand-alone basis. Claims must be construed upon considering the claims as a whole in context and in light of the entire specification and the prosecution history, as viewed through the lens of a POSA at the time of the invention.³⁰ Further, disclosed embodiments, especially preferred embodiments, cannot be read out of the claims.³¹ Still further, no claim term can be ignored, differences between claims must be considered relative to the doctrine of claim differentiation, and extrinsic evidence does not trump intrinsic evidence. Yet the Petition violated each and every one of these tenets of claim construction, and more, in its flawed proposals. Consequently, all aspects of the Petition fail—because without the proper constructions the Petition and expert's analysis and conclusions innately fail as being based on an improper foundation.

It is axiomatic that before patentability can be assessed and determined, the claims must be properly construed. PO has done so, as is shown below, by considering, as it must, the **intrinsic** evidence as the guiding principle³² including the

³⁰ See, e.g., *Hockerson-Halberstadt, Inc. v. Converse Inc.*, 183 F.3d 1369, 1374 (Fed. Cir. 1999) (“Proper claim construction . . . demands interpretation of the entire claim in context, not a single element in isolation.”).

³¹ “[A] claim construction that excludes a preferred embodiment . . . is rarely, if ever correct and would require highly persuasive evidentiary support.” *Epos Tech. Ltd. v. Pegasus Tech. Ltd.*, 766 F.3d 1338, 1347 (Fed. Cir. 2014)

³² Petitioner's attempt to incorporate extrinsic evidence from a different forum fails. Petitioner alleged that Ameranth's prior preliminary infringement contentions should limit construction of claim terms here. (Pet. at 23). First, Petitioner mischaracterized PO's statements. Second, the claim construction standards in the district court were different. Third, that proceeding occurred years ago and prior to the Board's constructions in the first '850 Petition (CBM2014-00015), and prior to numerous other

specification/drawings, the prosecution history and other related claims.³³ PO's proposals were formulated by adherence to the following oft-cited guidance, frequently cited by the PTAB for its own BRI constructions:

The construction that stays true to the claim language and most naturally aligns with the patent's description of the invention will be, in the end, the correct construction.

In re Papst Licensing Digital Camera Patent Litigation, 778 F.3d 1255, 1261 (Fed. Cir. 2015) (citations omitted). In contrast, Petitioner's proposals are inconsistent and often incoherent attempts to shoehorn a term into a particular opportunistic definition simply to match against prior art, with no regard for the overall context of the claim language or the prior art itself. PO urges the Board to carefully consider and adopt all proposals herein, as they are entirely supported by the intrinsic evidence, knowledge in the art at the time of the invention, and were formulated using Federal Circuit claim construction mandates.

A. PO's Proposals In Juxtaposition To Petitioner's Flawed Proposals And Non-Proposals

Petitioner's construction mistakes resulting from the above errors/omissions include misconstruing (1) "communications control module" ("CCM"), (2) "synchronization" (3) "wireless handheld computing device on which hospitality applications and data are stored," (4) "outside applications," (5) "application program

decisions from both the Federal Circuit and Supreme Court. Intrinsic evidence is the controlling determinant in claim construction. Petitioner also mischaracterized the import of PO's representations in the oral hearing in CBM2014-00013. (Pet. at 23). That proceeding did not involve the presently challenged claims.

³³ "Other claims of the patent in question, both asserted and unasserted, can also be valuable sources of enlightenment as to the meaning of a claim term." *Phillips v. AWH Corp.*, 415 F.3d 1303, 1314 (Fed. Cir. 2005).

interface” and (6) “single point of entry,” as well as reading out (7) “hospitality applications,” (8) “integration,” (9) “automatic,” (10) “wireless handheld computing device,” (11) “web page,” (12) “central database” and (13) “digital data transmission;” and parsing out (14) “applications and” from the overall claimed system. These errors are discussed below in the context of the correct constructions proposed by PO.

1. “wireless handheld computing device”

PO proposes “a wireless computing device that is sized to be held in one’s hand.” This is a straightforward construction. *See* Everingham Order (Exh. 1032 at 24, and discussed below). Petitioner ignored the meaning of this terminology in a superficial attempt to allow a match-up of a two-hand, portable device of Digestor.

2. “central database”

PO proposes “a database file structure connected to the system in association with a central server, comprised of records, each containing fields, together with a set of operations for searching, sorting, recombining and other functions.” Microsoft Comp. Dict. (4th ed.1999) (Exh. 1034 at 8); Exh. 1001 at 2:24, 11-34-35 (“backoffice server (central database)”); *id.* at 2:8-10, 11:13-15 (“synchronization between a central database and multiple handheld devices”). Petitioner’s ignoring of the meaning and import of this term led, in part, to its complete misunderstanding of the overall synchronization functionality recited in the claims.

3. “web page”

The PTAB has construed to mean “a document, with associated files for graphics, scripts, and other resources, accessible over the internet and viewable in a web browser.” CBM2014-00015 (Exh. 1017 at 8)). Petitioner ignores the Board’s proper construction leading, in part, to the attempt to allege that DeLorme disclosed

specialized “web page” functionality based on the mere mention of “the internet.”

4. “*communications control module*”

Petitioner mistakenly proposed and relied on a construction viewing this terminology as a hardware “device.” Pet. at 22 (“a *device* used as an intermediary in transferring communications to and from the host computer to which it is connected.”) (emphasis added). That is simply incorrect. It is a software element, as Judge Payne concluded in prior district court litigation, “the specification itself provides the best construction for the term at issue.” (Exh. 1033 at 13). Judge Payne correctly construed the CCM as “a software layer that sits on top of a communications protocol and acts as an interface between hospitality applications and the communications protocol” relying entirely on intrinsic evidence. Moreover, Judge Payne observed the “inherent clarity” of the meaning of the definition. *Id.* Clearly, BRI cannot permit a software module to be construed as a router or a switch or a bus (which Petitioner tried to “match” against the CCM), all of which are clearly “hardware devices” as defined in the 1999 Microsoft Computer Dictionary³⁴ and as understood by a POSA. All of the Petition’s and Turnbull’s combinations depend on hardware components for this software element and thus all three challenges fail.

Further, it is clear that it is the software-based CCM that deals with communications messaging protocols, and not the separately recited API (which rather deals with software application-to-application direct integration as discussed further

³⁴ Exh. 2015 (Router: “An intermediary device on a communications network that expedites message delivery,” Switch: “1. A circuit element that has two states: on and off,” “4. In networking, a device capable of forwarding packets directly to the ports associated with particular network addresses,” Bus: “A set of hardware lines (conductors) used for data transfer among the components of a computer system”).

below). Petitioner and its expert either misunderstood what is claimed or they mischaracterized the claims in order to match the defective prior art to the claims. Read properly, *i.e.*, straightforwardly, the Petition’s attempted match-ups of disclosure of the asserted references fails to meet the actual distinct claim elements.

5. “synchronized”

In its non-institution ruling in CBM2014-00014, the Board defined “synchronized” as “made to happen, exist, or arise at the same time.” However, this construction was not determined in the context of the claims of the entire patent family, nor does it take into consideration that the “timing” aspect of the claims is governed by the “real time” term in the ‘077 patent claims. PO thus submits that “synchronized” simply means “made or configured to make consistent” pursuant to the specification and usage in the other claims of the patent family. *See* Exh. 1001 at 2:23-26, 4:15-18, 11:34-36 (“in synch with the backoffice server (central database) so that the different components are in equilibrium at any given time and an overall consistency is achieved”).

6. “*applications and data are synchronized between the central database, at least one wireless handheld computing device, at least one web server and at least one web page*”

First, in its proposed construction, Petitioner parsed out “applications and” from the overall claim element. This is simply an irreparable error, impacting every other claim element, term and the construction of claim 12 as a whole. To not understand that this claim is not only about simply synchronizing “data” between the recited components simply misses the core inventive aspect of the claims, which is the fulcrum upon which all other claim elements are supported.

Turnbull’s admission clearly confirms a fatal misunderstanding or

mischaracterization of the claimed subject matter, taking the position that the claimed subject matter was “incongruent” with “any similar application functionality:”

I have considered interpretation of this phrase as used in the '850 and '325 patents. From my review, I believe that the phrase is **incongruent** with how a POSITA would describe any similar application functionality.

Exh. 1002 at ¶81. This error also led Turnbull and Petitioner to misinterpret claim 12 elements “a” and “b” and their interactivity with the other claim elements as well as errors as to API and “outside applications.” Petitioner’s construction proposal including “at the same time” is a non-starter because it is a physical impossibility to have the exact same data present in all locations at precisely the same time even if this claim included a real time restriction, which it does not.³⁵ Still further, the very concept that all of the same data stored in the “central database” would also be stored on a “Web page” is ludicrous, and no POSA would have thought this to be the proper construction in 1998-99, or at any time actually. Thus Petitioner’s proposal implying that “the same data is present” in all these disparate devices is also non-sensical, because clearly, *e.g.*, a “web page” does not have or need to have the entirety of the “data” in the “central database” within the web page itself—nor could it (nor would the application on the handheld device have exactly the “same data” either). This is why PO’s proposal is the correct BRI construction for “synchronized” as discussed above.

PO submits that the construction of “synchronized” proposed above obviates

³⁵ The specification encompasses “batch processing” as well as communications over dial up modems. At the time of the invention, when wireless data rates were very slow (even 1G was not yet available, and 56KBPS modems were typical), no POSA would have thought that the exact same data was always present in all nodes of the system at the same time.

any need for further construction of this element. The remaining terms of this element are clear on their face as discussed above.

Further, “synchronization” is not the same as “integration,” a unique and claimed function discussed further below, in respect to integration between outside applications (non-hospitality applications) and hospitality applications.

7. ***“wireless handheld computing device on which hospitality applications and data are stored”***

Clearly, just as Petitioner argued in the first Petition (CBM2014-00015), the preferred embodiment for the wireless handheld device recited in claims 12-16 is the application and database stored on the handheld. Yet after asserting that a “web page” embodiment was not even taught by the patent, now Petitioner has reversed course and proposed for this limitation to be met by a mere “web page.” That would impermissibly read out the preferred embodiment. This element must be interpreted to require that a hospitality application/data is stored locally on the wireless handheld device.

For example, the Petition states “[a] POSITA would understand that Travel Web pages being rendered by a browser on a handheld device are data and hospitality applications.” (Pet. at 38). This statement and the other arguments made by Petitioner fail to address the requirement that the hospitality applications stored on the wireless handheld device do not require a web browser. Nor does the Petition discussion regarding claim 12 element b, at Petition page 38-39, address the requirement of storing the hospitality applications and data on the handheld device. The Petition’s only mention of storing applications is the meaningless argument that because claim 12 requires that hospitality applications and data are stored on a Web page, there must be rendering of Web pages comprised of hospitality applications and data on a

handheld device. (Pet. at 38-39). This is a mere conclusory statement based on the incorrect proposition that claim 12 elements b and d can be met by the exact same thing, *i.e.*, a web page. This is clearly incorrect as explained below.

Moreover, nothing the Petition says has anything to do with storing of either applications or data on the handheld device. That is because the Petition entirely mischaracterized the claimed invention as entirely “Web” based, as opposed to understanding that claim 12 is directed to both web aspects and native mobile application aspects, with the handheld device limitation of element b clearly reciting a native mobile “app” which is not satisfied by a mere web page.

Petitioner states that the claims “do not require that the wireless handheld device utilize a hospitality application different from a Web page rendered by a browser and do not otherwise preclude the hospitality application on the wireless handheld device from being a Web page rendered by a browser” and “nothing in the claims of the ’850 patent preclude both the ‘web page’ and the ‘wireless handheld device’ from being implemented as wireless handheld devices with browsers” (Pet. at 31). However, this assertion is directly contrary to the express claim language, which separately requires that “hospitality applications and data” are stored on both a wireless handheld device and a web page. The law is clear that different limitations in a claim are to be given effect.³⁶ Moreover, the specification clearly and consistently states that a handheld

³⁶ A reference disclosing a “web page” cannot meet both the handheld device and the web page limitations. *See Unique Concepts, Inc. v. Brown*, 939 F.2d 1558, 1563 (Fed. Cir. 1991) (two distinct claim elements should each be given full effect). Moreover, “[c]onsistent with the principle that all limitations in a claim must be considered to be meaningful, it is improper to rely on the same structure in the [alleged] reference as being responsive to two different claim elements.” *Ex parte Brud*, BPAI Appeal 2009-

menu/display is different from a web page menu/display. For example:

means to instantly download the menu configuration onto, e.g., a handheld device or Web page (Exh. 1001 at 3:17-19 (emphasis added))

the menu can be downloaded to either a handheld device or Web page (*Id.* 3:37-38 (emphasis added))

provide a wireless handheld interface to their desktop based POS systems or a Web page equivalent (*Id.* 3:47-48 (emphasis added))

Transferring the menu onto handheld devices or Web pages (*Id.* 3:50-51 (emphasis added))

preview of the handheld device or Web page version of the POS menu (*Id.* 10:2-3 (emphasis added))

A PDA or Web page format (*Id.* 10:23 (emphasis added))

Further, it is clear from the specification, consistent with the ordinary meaning as would be understood by a POSA, that an application is a software program, not data. (Exh. 1001 at 5:10-11 (“Generally, a particular application program presents information to a user through a window of a GUI”)); 8:53-54 (“the POS application on the handheld device”). Petitioner’s attempt to ignore or render redundant the recited “applications” thus also fails under the clear and unambiguous claim language, which is consistent with the specification disclosure of “application” software programs.

Still further, neither the specification nor the claims envision synchronizing between “web pages.” If claim 12 elements “b” and “d” were both web pages and were the “same” element, there would be no need to synchronize them. Moreover, there is no disclosure in Digester of synchronizing (as claimed), or any other asserted reference, of one web page format with a different web page format. Rather, Digester

transforms/converts a pre-existing web page from one form to another, and such transformation is uni-directional. A review of the entirety of the Digestor reference confirms it only provided mobile “**access**” to server-based WWW documents and flowed in one direction, *i.e.*, “**outward**,” and was entirely incapable of converting data coming back to it, *i.e.*, “**inward**,” back into its original form for synchronizing with the central database and then to/with other elements as required by ‘850 claim 12.

In addition to the plain language of claim 12 element b, which contains no reference to a browser, and in addition to the clear discussion in the specification requiring no such browser with respect to a wireless handheld device, the structure and language of claim 12 (outside element b) further supports the conclusion that a web browser is not required on the wireless handheld computing device, by making the wireless handheld computing device a distinct element of the system apart from a web server and a web page. *See, e.g.*, '850 claim 12, first wherein clause ("applications and data are synchronized between the central data base, at least one wireless handheld computing device, at least one Web server and at least one Web page") (Exh. 1001). If every wireless handheld computing device in the system required a web browser, there would be no need to synchronize the handheld component of the system with the web-page component; that would be entirely redundant. Such an intrinsically unsupportable reading of the claims must be rejected. Petitioner’s attempt to read “applications” out of claim 12 thus fails. Claim 12 element b cannot be browser-dependent.

8. “hospitality applications”

Petitioner ignored the correct meaning of CCM by converting it to a hardware device in an attempt to match to their asserted prior art, which fails in any event irrespective of the attempted conversion. As to “hospitality applications,” Petitioner

went even further by simply ignoring the limitation entirely, despite the fact that every challenged claim is uniquely focused on the hospitality market and that market’s specialized applications and needs. In light of the fact that none of Digestor, DeLorme nor Blinn are hospitality references, it is clear why Petitioner hoped to escape the import of this critical limitation. However, the Board has already properly construed it, in effect, as “applications used to perform services or tasks in the hospitality industry.” CBM2014-00014, Non-Inst. Dec. at 16-17; *see also, e.g.*, Exh. 1001 at 4:6-7 (“hospitality applications, e.g., reservations, frequent customer ticketing, wait lists, etc.”); 3:66-67, 11:18-19 (“computerized hospitality applications”).

9. “API,” “outside applications” and “integration”

These three terms are very closely related, and compel the correct construction of each other when the claim is considered as a whole, which Petitioner did not do. Petitioner misread the first term (as a generic API divorced from the definition of its function within claim 12) and/or ignored the second and third terms all together. Reading these terms out, compounded by already having entirely written out the critical “applications and” as part of the claimed “synchronization” element, and perceiving integration to be the same as synchronization, served to make Petitioner’s analysis even more erroneous.

Further, Petitioner impermissibly read out two crucial terms: “outside applications” and “integration.” Clearly the BRI for “outside applications” is simply “**non**-hospitality applications” as compelled by the claim language and structure itself—they clearly cannot be “hospitality applications” because the outside applications are what are being integrated with the hospitality applications. Petitioner entirely failed to address the critical “integration” term—which is manifestly different from

“synchronization.” In fact, “integration” is what APIs do—they enable “integration” between applications, and not just mere data/message exchanges. The proper construction for “integration” is clear from the 1999 Microsoft Computer Dictionary definition of same as well as the definition of “integrated software:”

Integration: “In computing, the combining of different activities, programs, or hardware components into a functional unit.”

Integrated software: "A program that combines several applications in a single package.”

(Exh. 2015). These definitions are also consistent with the specification, which states: a well-defined API that enables third parties such as POS companies, affinity program companies and internet content providers to **fully *integrate with computerized hospitality applications***

(Exh. 1001 at 3:63-67; 11:15-19). This “**fully integrate**” language is also key to the proper construction of the claim overall and to the construction of the full claim term “applications **and** data are synchronized ...” As reflected in the ‘850 patent, the inventors realized, 17 years ago, that in Ameranth’s 21st Century Restaurant™ or 21st Century Hotel™ system embodying the patent claims, not only would the central database, wireless handhelds, web servers and web pages containing the **hospitality applications** be synchronized (both at the application **and** data level), but that all of this would also need to **fully integrate** with the recited “**non-hospitality**” third party “outside applications.” Facebook or Twitter are exemplary “affinity program groups” (commonly referred to today as, *e.g.*, “social media/networks”) and Google (with Google Maps) is an exemplary “internet content provider” (emphasis added) (Exh. 1001 at 3:63-67; 11:15-19). And this would not be **only** “exchange” of data/messages, as Petitioner mistakenly asserted. The “hospitality” and “non-hospitality” applications

themselves are actually **integrated with each other** according to the proper construction of “integration.” Today, the “outside/third party,” *e.g.*, GPS/Google Maps functionality, “fully integrates” with, *e.g.*, the Domino’s in-store POS pizza application for its delivery drivers, while also integrating information with, *e.g.*, “outside/third party” Facebook/Twitter applications.

10. “single point of entry for all hospitality applications”

Petitioner failed to propose a construction for this term, nor consider it properly as to any of the asserted references. Therefore, none of the Petition’s limited and off-the-mark citations to those references are applicable.

The proper construction is one that leverages Judge Payne’s focused construction as to “single point of entry” itself, but **the element** needs to be considered as a whole to be consistent with the claim and the specification cites directly related to this element. Judge Payne construed “a single point of entry” as “a center of communication.” (Exh. 1033 at 18).³⁷ PO submits that this is the proper BRI construction and that the full term in which it appears should be construed as “a center of communication for all hospitality applications.”

³⁷ “The communication module also provides a **single point of entry for all hospitality applications, e.g., reservations, frequent customer[,], ticketing, wait lists, etc. to communicate with one another wirelessly and over the Web.** This communication module is a layer that sits on top of any communication protocol and acts as an interface between hospitality applications and the communication protocol and can be easily updated to work with a new communication protocol without modifying the core hospitality applications.” (Exh. 1001 at 4:5-13) (emphasis added).

11. “automatic”

Petitioner simply read out this vital term, which once again led Petitioner to incorrectly apply inappropriate snippets from the asserted prior art, as discussed below. PO proposes “done or produced as if by machine.” This is the ordinary and customary definition of “automatic” established by the BPAI/PTAB. *See* BPAI Appeal No. 2010-000055 at 5 (Exh. 2012) (relying on Merriam Webster Collegiate Dictionary (<http://www.merriam-webster.com/dictionary/automatic>)).

12. “digital data transmission”

Petitioner ignored the import of this term of claim 16 entirely. This terminology had a precise definition as reflected in the 1999 Microsoft Computer Dictionary, which is exactly as a POSA would have understood it. *See* Exh. 2015 (Digital data transmission: “Exchange of communications in which all information is transmitted in binary encoded (digital) form.”). While “all digital” system deployments may well be viewed as the norm today, that was not the case at the time of the invention, when high speed digital access was rarely available either wirelessly or in the home. The sound of a 28.8K analog modem dialing over an analog telephone line is something the millennial generation has never heard, yet that was commonplace in 1998-99. Thus, the inventors recognized that an “all digital” system incorporating all of the other elements of claim 12 was unique at the time of the invention. Therefore, such functionality across all elements of the asserted prior art, as combined, must actually be shown in order to disclose this limitation in the context of the claim as a whole. That was not done in the Petition.

B. Claim Construction Analysis Summary

As detailed in the '850 patent, the inventors understood that the claimed overall systemic synchronization needed the vital “communications control module” recited in claim 12 and then, in some instances, the closely-associated “single point of entry” functionality additionally recited in claim 13. The CCM was the communications messaging “glue” that connected disparate pieces of the claimed system together in a new, harmonious, and non-obvious way. While a POSA would have known that the internet and web server based system of these claims would rely primarily on HTTP communications as is clearly confirmed in the specification, the claims and the disclosed invention overall had to have the ability to adapt and interface with other communications protocols as well, and these claims include just such functionality.

Thus, when the claim terms are properly and fully construed and considered together, including the full term “applications and data are synchronized ...,” with the correct definition for API and “integration,” and including (not excluding as Petitioner’s argument requires) the preferred embodiment of a database on a handheld, claims 12-16 are multi-faceted and highly specific, just as the Board correctly determined in CBM2014-00015. Unlike the Board, however, the Petition failed to give effect to the bulk of the claimed subject matter, merely waving it aside without even a mention as to many critical terms, in an apparent quest to match the claims against asserted references irrespective of what those references actually disclosed at the time of the invention.

The most fundamental flaw in Petitioner’s allegations of obviousness is its failure to consider or give effect to the “applications” aspect of the challenged claims relative to the claimed overall systemic synchronization. This failing permeates and

infected all other analysis the Petition attempted to do. Moreover, each of the terms/elements have meaning individually, but together they form a unified whole reflecting the systemic vision and solution of the inventors.

VI. PETITIONER HAS NOT SHOWN THAT ANY OF CLAIMS 12-16 ARE MORE LIKELY THAN NOT OBVIOUS

A. Overview

The effect of Petitioner's multiple, and multi-faceted, claim construction errors is that it really is not even necessary to step through each of the challenges, element by element, to mandate a conclusion that the Petition has not stated any credible ground for obviousness. All of Petitioner's grounds were based on improper and/or incomplete claim constructions. However, claim interpretation is at the heart of patent examination because a claim must be properly interpreted before its scope can be compared to the prior art.

Medichem v. Rolabo, 353 F.3d 928, 933 (Fed. Cir. 2003) (emphasis added).

The Petition entirely missed both the overall "synchronization" of the claims as a whole, *i.e.*, that they include "applications and data" being synchronized, and the full "integration" of "non-hospitality applications" with "hospitality applications." Thus Petitioner simply could not have shown that any claim is more likely than not invalid. Nor could Petitioner have met its burden in light of the fact that it did not even consider numerous claim terms in its analysis. "[O]bviousness requires a suggestion of all limitations in a claim." *CFMT, Inc. v. Yieldup Int'l. Corp.*, 349 F.3d 1333, 1342 (Fed. Cir. 2003) (citing *In re Royka*, 490 F.2d 981, 985 (CCPA 1974) ("[T]he prior art reference (or references when combined) must teach or suggest all the claim limitations.")).

Additionally, the Petition fails to identify sufficiently the differences

between the claims-at-issue and the purported prior art references. The PTAB has rejected many petitioners' §103 arguments for just this reason. *See, e.g., Travelocity v. Cronos Tech.*, CBM2014-00082, Paper No. 12, Oct. 16, 2014, p. 5 (“because Petitioner failed to identify the *differences* between each of the applied references and the subject matter recited in the challenged claims, Petitioner failed to demonstrate why a person of ordinary skill in the relevant art would *combine* the references in the manner proposed to achieve the recited subject matter”); *Apple v. Smartflash LLC*, CBM2015-00033, Paper 11 at 15-18 (PTAB May 28, 2015) (“Petitioner has not identified sufficiently the differences between the claimed invention and each reference, or how the teachings of the references are to be combined, if at all.”).

Moreover, the Petition could not have supplied “facts” against all claim elements because it ignored and/or omitted numerous claim terms/elements. “Where the legal conclusion [of obviousness] is not supported by facts it cannot stand.” *In re Warner*, 379 F.2d 1011, 1017 (CCPA 1967). Still further, omission of multiple terms from the challenges compels a conclusion of non-obviousness because the absence of even one claim element within the prior art or a combination of prior art supports a conclusion of non-obviousness. *Fresenius USA, Inc. v. Baxter Int’l, Inc.*, 582 F.3d 1288, 1301-1302 (Fed. Cir. 2009).

Consequently, due to the Petition’s omission of claim elements alone, the Petition fails all of the above established tenets of law. The omissions are only the most blatantly “obvious” flaws, however. Petitioner’s misinterpretation of terms/elements and the meanings of entire clauses further exacerbates the situation, as these infirmities compel the conclusion that the claims were not

considered by Petitioner “as a whole” because Petitioner clearly did not understand the claims as a whole. Thus, all of the Petition’s attempts to align disparate parts of random alleged prior art fail, as shown below. Petitioner’s proposed “mappings” largely make no sense and fail in multiple ways.

Finally, *KSR* compels a non-obviousness conclusion because Petitioner did not even understand the purpose and proper construction of the claims, thus it could not possibly have proposed a way to combine the elements as recited in ‘850 claims 12-16. Obviousness is not demonstrated absent a showing that a POSA had an “apparent reason to combine the known elements *in the fashion claimed.*” *KSR Int’l Co. v. Teleflex Inc.*, 550 U.S. 398, 418 (2007) (emphasis added).

Each of the three §103 challenges are analyzed below as to independent claim 12 and in accordance with the claim construction errors identified above, as each relates to how these errors led Petitioner to improper challenges as to each of the elements vis-à-vis the alleged teachings of the asserted prior art. Following the independent claim analysis for each of the three challenges is an analysis of dependent claims 13-16, as to all three challenges together, because the errors for each challenge are similar.

B. Challenge 1: Inkpen/Digestor/Nokia

1. Overview Of References

Inkpen is a curious choice for a prior art “reference,” in that it is hearsay in the form of a general book on travel related activities, by an author who clearly was not technically qualified as a POSA in all of the disciplines he purported to cover. It is perplexing that Petitioner chose to rely on such a “second hand” account of what allegedly was happening within the Marriott

Hotel systems of the late 1990's, considering that Marriott is a member of the joint defense group which includes Petitioner. Further, by relying on a second-hand hearsay-based book rather than the actual alleged prior art itself, Petitioner seeks to avoid the legal requirement to explain how entirely different pieces of prior art would be combined, if that was even possible.³⁸ This is reflected in Petitioner's attempt to treat two different devices, *i.e.*, the Cisco switch and the TravelWeb server as if they were part of the same reference, despite their being from entirely different companies. Thus Petitioner's assertion that it would have merely been a "design choice" to merge the two devices into one is without substantiation.³⁹

The Digester disclosure has numerous inherent and inescapable flaws, as discussed above in the Overview section, several of which would lead a POSA away from relying on it either alone or in combination with Inkpen. The Digester web page "transformation" approach was entirely contrary to the claimed functionality and includes critical admissions in that regard. For example, as just one of its many infirmities, Digester did not connect, let alone synchronize with, a central database (the critical aspect of the claimed invention, as explicitly recited in '850 claims 12-16). The claims do not recite nor require generation or synchronization

³⁸ Merely being mentioned in the same book cannot serve as a basis for combination. If true, everything listed in a technical dictionary could be combined with everything else merely by virtue of being listed in the same catalog. That is absurd.

³⁹ Irrespective of the propriety of combining Cisco and TravelWeb, the very basis of Marriott's hodgepodge system at the time of the invention was **convoluted** at best and largely reliant on hardware-based devices, while the applicable elements of the '850 claims are software-based.

of anything with an already-existing, large, web page as was the Digestor approach. In any case, Inkpen and Digestor together simply do not yield the inventions of claims 12-16 for the reasons detailed herein.⁴⁰

2. Synchronization, “Applications And Data”

Petitioner and its expert clearly did not understand, or mischaracterized, this claimed functionality. Parsing out “applications and” from the required overall synchronization functionality (claim 12 fully recites “*applications and data are synchronized ...*”), and requiring the “same data” to be present in all of the claimed elements “at any given time,” was simply off the mark and led Petitioner astray. Moreover, the explicit teachings of Inkpen/MARSHA demonstrate the lack of synchronization as claimed, even between other elements of claim 12 excluding element b. For example, Inkpen admits that “[n]either of these systems [Thisco and Travel Web] need to hold a data base of rates or rooms. *All data and inventory records continue to be held by MARSHA.*” (Pet. at 36; Exh. 1021 at 31) (emphasis added). The Petition goes on to state that “[t]his is an important point because it eliminates any problems that would undoubtedly arise from duplicating Marriott’s hotel information on other servers.” *Id.* This is a clear teaching away from synchronizing data across the entire system as claimed, not to mention that in the absence of data synchronization, there is no teaching or suggestion of synchronizing hospitality applications, which a POSA would recognize is not appropriate if data is not being synchronized. Further, Petitioner attempts to read out the term “between” in

⁴⁰ Petitioner also included a Nokia device having a rudimentary web browser in this combination. However, it is not a viable reference to combine in respect to these claims, including claim 12 element “b,” for the reasons indicated below.

‘850 claim 12 first wherein clause. Clearly, a function of the claimed system is to “synchronize” hospitality applications and data *between* the central database, wireless handheld computing device, web server and web page. Using Digester for “web page” to “web page” conversions is not the claimed synchronization of applications and data.

3. Integration/API/Outside Applications

Petitioner entirely reads out “integration,” as properly construed, incorrectly confused the API to be part of “messaging protocols”—which it is not, and failed to appreciate that “outside applications” are “**non-hospitality**” applications and not simply one node of an overall “hotel reservations” system communicating with another such node via a different message protocol, as with the CCM. In its attempt to “match up” to the recited API, Petitioner stated:

The communications system utilized by Marriott for hotel reservations includes a THISCO switch. Inkpen at Fig. 5.36. The THISCO switch includes an API for communicating with other applications: “On the demand side, the THISCO switch communicates with all major GDSs **using the proprietary message format of each one.**”

Pet. at 40 (emphasis added). Note also that, once again, Petitioner relies on single spaced attorney argument within the claim chart. Moreover, the cited material says nothing about an “API” despite the unsupported argument that it does. This was simply not an API for “integration” as claimed. Petitioner then followed the argument in the claim chart with yet more argument, again with no evidence supporting it:

A POSITA would have considered the software in the THISCO switch that communicates with all major GDSs using their proprietary message formats to constitute or include an application program interface for interfacing with the GDSs.

Pet at 40-41. The “proprietary message formats” referred to in this passage are “communications” message protocols, however, not an API. Communications protocols are encompassed by the CCM function of the claim, while the API’s function is to “integrate” the different “non-hospitality/outside applications” with hospitality applications by integrating the different applications from **within** the applications themselves, and not via external messaging protocols. Further, the referenced GDSs are simply other hospitality applications, *i.e.*, hotel reservations, and they are not “**non-hospitality applications**” for application-to-application “integration” (*e.g.*, Twitter/Facebook) **with** the claimed “hospitality applications” as properly construed.

The Petition further relies only on attorney argument to allege that some kind of unidentified/undisclosed “software in the Cisco switch” performs the API function, but does not provide evidence of any such software.

Further, because Petitioner’s position is that this message format conversion was an API, even if it were to be read (incorrectly) as such, that would leave Petitioner’s “match up” lacking anything applied against the claimed CCM functionality.

4. CCM, Protocols

As explained above, in relation to the Petition’s misconstruing and misunderstanding API, Petitioner and its expert asserted that the “**message conversions**” of the Ultraswitch was a disclosure of the claimed **API**. Thus clearly they could not properly assert that these “message conversions” were also a disclosure of the CCM functionality, yet that is what they did:

The switch has a supply and demand side. On the supply side, it connects to hotel inventory systems and **translates their messages and commands into a standard Cisco format** that is used for all processing

within Ultraswitch. On the demand side, the Cisco switch communicates with all major GDSs **using the proprietary message format of each one.**

Pet. at 41 (emphasis added). The Petition fails as to this aspect because the same thing in the prior art cannot satisfy two different claim elements.

Petitioner further cited to Ultraswitch **hardware devices** to attempt to meet this software limitation:

In any event, although THISCO chose to implement the **Ultraswitch** and the Travel Web server **as separate devices** connected by **high speed communications lines**, it would have been obvious to a POSITA at the time of the '850 patent that this was a design choice and that the Ultraswitch and the Travel Web server could have been implemented **as a single device.**⁴¹

Pet. at 43 (emphasis added). However, the properly-construed CCM must “**sit on top of**” the hospitality software application, which no POSA would have believed was a “device.”⁴²

5. **Wireless Handheld (Element “b”) vs. “Web Page” (Element “d”)**

The Petition seeks to read out the preferred embodiment of a database stored on the handheld device and attempts to rely on the same structure to meet both of claim 12 elements “b” and “d” with a “web page on a handheld” converted from large to small web pages via Digestor. The argument fails for

⁴¹ Once again, the Petition provides no evidence for this alleged combinability. In effect, Petitioner is alleging that two separate, complex, hardware devices of different companies could be “redesigned” to incorporate the totality of the functionality of one into the other. This is mere speculation, unsupported by any evidence.

⁴² To the extent the Petition could be read to argue that the Cisco switch contained software functionality, it did not identify evidence of any such functionality; thus the argument as to CCM fails irrespective of how the CCM “match up” is characterized.

numerous reasons. For example, the Petition states “[a] POSITA would understand that Travel Web pages being rendered by a browser on a handheld device are data and hospitality applications.” (Pet. at 38). This statement and the other arguments made by Petitioner fail to address the requirement that the hospitality applications stored on the wireless handheld device do not involve a web browser as explained above in the context of construing the pertinent claim terminology. Nor does the Petition discussion regarding claim 12 element b, at Petition page 38-39, address the requirement of storing the hospitality applications and data on the handheld device.

Moreover, Digester cannot meet the handheld device limitation because, *inter alia*, it operated by converting a standard web page to a smaller size web page (and transmitted data only in that one direction, which is thus not synchronous). Digester’s imprecise, “semantic,” transformations cannot yield a precise or even predictable output and thus a hospitality application which attempted to use the Digester approach would not be able to, for example, keep an order straight.

Reading element b to require web browser/web page implementation would exclude a preferred embodiment disclosed by the ‘850 patent and encompassed by the claims.⁴³ This preferred embodiment is the storage of a menu database on the handheld device.⁴⁴ In regards to handheld devices other than Nokia cited by Petitioner

⁴³ A claim construction that excludes a preferred embodiment is "rarely, if ever, correct." *Vitronics v. Conception, Inc.*, 90 F.3d 1576, 1583 (Fed. Cir. 1996) (emphasis added). This is because "it is unlikely that an inventor would define the invention in a way that excluded the preferred embodiment, or that persons of skill in this field would read the specification in such a way." *Hoechst Celanese Corp. v. BP Chem. Ltd.*, 78 F.3d 1575, 1581 (Fed. Cir. 1996).

⁴⁴ It is indisputable that the claims of the ‘850 patent and the specification encompass

via the Digestor document, they must be ignored for failure to provide any argument regarding their alleged disclosure or functionality.⁴⁵ Because all of Petitioner’s arguments for this combination respecting claim 12 element b involve a web browser on a wireless handheld device (which is shown above, in the context of claim construction, to be an incorrect interpretation of the wireless handheld device limitation), and none of Petitioner’s asserted references disclose hospitality applications and data stored on the handheld device (*i.e.*, they do not disclose a mobile “app” approach), Petitioner’s arguments fail as to claim 12 element b.

6. Claim As A Whole

By conflating API with CCM, seeking to rely on the same device (the Ultraswitch) to meet the two different elements, and then again relying on the same web page element to meet both elements “b” and “d,” and erroneously alleging that a web page could meet even element “b,” while not referencing any “non-hospitality

databases being transmitted/downloaded to and “stored on” the recited wireless handheld computing device and that the preferred embodiment used the Windows CE operating system to enable the databases/menus to be stored on and operational with. Exh. 1001 at 10:63-65, 8:45-59, 10:8-13. Windows CE was NOT a “browser-based” approach, it was used in the preferred embodiment for storing of a menu database on the handheld device using the Windows CE OS. The Petition is devoid of any explanation as to how the web conversion approach of Digestor could be used with Windows CE or any reason a POSA would try to do so.

⁴⁵ Proposed combinations must be made explicit. *In re Hoch*, 428 F.2d 1341, 1342 n.3 (CCPA 1970) (“Where a reference is relied on to support a rejection, whether or not in a ‘minor capacity,’ there would appear to be no excuse for not positively including the reference in the statement of the rejection.”). Petitioner did not list these devices as part of their combination, nor did they offer any argument as to how they meet element b. They argue only that Digestor mentions them.

application” for integration with hospitality applications, nor any actual “integration” **between applications** at all, and entirely reading out the actually claimed synchronization of both “applications and data,” Petitioner’s challenge fails entirely.

C. Challenge 2: DeLorme

1. Overview Of Reference

DeLorme’s TRIPS system was a travel/mapping solution as would be expected considering that DeLorme Publishing Co. was a paper/CD map product company founded by inventor David DeLorme. In fact, DeLorme’s primary thrust at the time of the DeLorme patent was still distributing its map/travel “software” to consumers via CDs. While it is true that DeLorme vaguely identified some hospitality applications, to DeLorme those applications were third parties to his TRIPS system. Petitioner tries to reverse that reality. Further, any reference to hospitality applications was incidental and not the thrust of the invention of DeLorme, and thus DeLorme had no recognition of the actual synchronization challenges unique to the hospitality market which the ‘850 patent addressed. It is also clear, despite the length of the DeLorme specification, that the inventor had no recognition of, nor any understanding of, the actual problems addressed by the system recited in the ‘850 claims, and thus he proposed no solutions to the problems solved by the ‘850 claims. DeLorme made not a single mention of “web page,” “web server,” “HTML” or “HTTP” communications. In fact, as discussed above, DeLorme’s wireless concept was based on a proprietary protocol, which was incompatible with a HTTP-based system, could not possibly have provided a “synchronous” solution (even as regards “data” alone), and most certainly not with regard to the claimed

“*applications and data*.” While PO recognizes that the exact terms of claims need not be disclosed in prior art, an advocate of obviousness cannot simply refer to a disclosure of “using the internet,” without any disclosure of any of the claimed functionality involving the Web/internet, particularly in light of the fact that Petitioner relies on DeLorme standing alone. Petitioner’s allegation that DeLorme alone disclosed all of the detailed, interrelated and systemic elements of the ‘850 claims is a non-starter as further detailed below.

2. Synchronization, “Applications And Data”

Neither the term nor the need for nor the concept of “synchronization” appears in any context, even **a single time**, throughout the entire expansive DeLorme specification. However, once again, that is not surprising because in 1997 neither DeLorme nor anyone one else in the hospitality industry had even recognized the synchronization problems solved by the ‘850 invention. The purported disclosures of DeLorme cited by Petitioner of course do not include the synchronization of **both** “applications and data” because Petitioner misconstrued and parsed out the requirement for it. Petitioners allege, via attorney argument only, that “geographical, topical, temporal and accounting data” in the TRIPS database discloses hospitality applications and data stored in the central database. (Pet. at 52-53). However, this was only data, not the claimed “applications and data” and it was not actual hospitality applications such as food/drink ordering, waitlists, restaurant/hotel reservations etc., nor has Petitioner provided any argument that a POSA would think it would be. Moreover, the applications and data that **would be** synchronized are not disclosed. Petitioner states that users may “view updated real time TRIPS **data** via the internet site” and that this discloses the total synchronization

of all of the elements in the claim overall and of the claim element. (Pet. at 56) (emphasis added). But at most this was “**data**” only and not “applications and data” and moreover synchronization is not disclosed even at just the “data” level because, *inter alia*, there is no mention of a “web server” as required by claim 12. Petitioner then points to the wireless WCUs being updated, yet does not even attempt to explain how that occurs via the required web server or that it includes “applications and data” as claimed. Petitioner thus provides no match up to the claimed element of synchronization **between** the four recited elements. In fact, synchronization could not occur “**between**” the recited components because the required web server uses HTTP communications and the WCU uses its own slow, proprietary protocol. Petitioner offers no explanation whatsoever as to how any synchronization of “*applications and data*” occurs.

3. Integration/API/Outside Applications

Petitioner tries to rely on a box labeled “231” in reference to “Input/Output” to teach this claimed functionality. (Pet. at 54-55, 57). But there is no teaching of an API in this material, and Petitioner, like its expert, reads out the correct construction of “integration”—which is integration of two different software applications, one “hospitality” and the other “non-hospitality.” Input/Output is not a teaching of either the claimed API nor of “integration” of **applications**, and Petitioner ignores the correct construction of the “outside applications” limitation, which is “non-hospitality” as discussed above regarding claim construction. Petitioner attempts to make “outside applications” equate to just another provider, but that is diametrically contrary to the clear explanation in the patent. Further, as discussed above, DeLorme is

not a hospitality application and Petitioner's argument that the TRIPS hospitality applications interface with third party applications (Pet. at 57) is backwards and incorrect. TRIPS is not a hospitality application. If anything, what Petitioner identified as the third party application, *e.g.*, reservation systems, are hospitality applications (which lack details). Petitioner clearly misunderstands the nature of "hospitality applications" and "outside applications" as claimed.⁴⁶ DeLorme does not in any way suggest this limitation.

4. CCM/Protocol

Petitioner clearly seeks to rely on an **internal** hardware "bus" **within** DeLorme's own base system to meet this **software**-based limitation intended to provide communications over differing message protocols **outside** a base system. Similar to Inkpen, DeLorme's disclosure of a "bus" cannot satisfy the CCM limitation. DeLorme's bus was a physical hardware device,⁴⁷ which a POSA would have known was not a software layer⁴⁸ which sat on top of communications protocols and could be updated to work with new communications protocols as required by the correctly construed claim 12 element f and wherein clause. Petitioner's distortion of CCM to be a hardware device rather than software is necessary to Petitioner's

⁴⁶ Petitioner tries to satisfy multiple limitations with the same component allegedly shown in the prior art. This fails as a matter of black letter law as detailed above.

⁴⁷ *See* Microsoft Comp. Dict. (4th ed. 1999) (Exh. 2015) (Bus: "A set of hardware lines (conductors) used for data transfer among the components of a computer system. ... Buses are characterized by the number of bits they can transfer at a single time, equivalent to the number of wires within the bus.").

⁴⁸ *See* Microsoft Comp. Dict. (4th ed. 1999) (Exh. 2015) (Layer: "the protocol or protocols operating at a particular level within a protocol suite").

flawed §103 argument, because in the DeLorme reference, what Petitioner says is a "communications control module" is a device, and in particular a bus.

5. Handheld/Web Page

First, the WCU in DeLorme is a “two hand” portable device and not a wireless handheld device as properly construed. Nor does the cited material from DeLorme teach or suggest hospitality applications and data being stored on a handheld device. DeLorme merely refers to “get[ing] travel information and/or mak[ing] travel arrangements ‘on the go.’” (Exh. 1024 at 72:16-17). The passage cited by Petitioner says nothing about storing applications and data on a wireless handheld computing device. There is no disclosure or suggestion of either in the cited passage. DeLorme clearly provides no disclosure of a locally-stored “app” and associated data for the claimed wireless handheld device. Rather, DeLorme’s mobile functionality involved “simple transactions entailing offer and acceptance” (Exh. 1024 at 74:28-29), which were accessed via “simplified input means 915” (Exh. 1024 at 73:67), *i.e.*, hardwired or dedicated buttons, whereby a remote user presses a “RESCUE 916, ROUTING 918, or the RESERVATIONS 920 ‘button’ and/or some equivalent simplified and dedicated input means on his/her WCU 907.” (Exh. 1024 at 75:1-3 (emphasis added)). A “dedicated input means” is not a “hospitality application” stored on a handheld device any more than a talk/listen toggle button on a two way radio is a hospitality application stored locally on a handheld device. In fact, DeLorme’s disclosure teaches away from locally-resident hospitality applications and data via his reference to “dumbed down” computer devices. (Exh. 1024 at 76: 21).

Still further, the purported “wireless handheld” in DeLorme relied on by Petitioner (*see* Exh. 1024 Figure 9B reference number 907) is clearly not “sized to be

held in one's hand" and unsurprisingly Petitioner did not propose any construction for "wireless handheld computing device" because Petitioner seeks to ignore the limitation altogether. However, Figure 9(b) of DeLorme clearly shows that the referenced device is merely a "portable" device which needs to be held in "two hands." A POSA would have known that this was because it also needed GPS at the time, which was not yet miniaturized into "chips" (as they are now in cell/smart phones), and because DeLorme wanted the "wireless communications unit" to be interchangeable with the vehicle mounted mode of operation. And, again, DeLorme teaches away from locally resident and stored hospitality applications and data via his reference to "dumbed down" computer devices. (Exh. 1024 76: 21).

Further, DeLorme relied on proprietary communications with little more than a "yes/no" back and forth or fixed button capability thus it had neither a hospitality application and data stored in it, nor was a browser based approach viable, since DeLorme's WCU had no web browser, nor did the WCU communicate through the web server, as required, nor for that matter did DeLorme even disclose a "web server" in the first place. The Petition stated:

DeLorme further discloses using distributed applications, such as Java "applets," on Web pages to provide TRIPS hospitality functionality:

"Such purely online TRIPS embodiments can be implemented utilizing recent advances in distributed applications, "agents" or online "applets" developed in Java, or equivalent computer languages—plus other state-of-the-art software enhancements for online or Internet usage."

Pet. at 54. This is nothing but attorney argument. There is no disclosure of anything being on "web pages" nor did it have anything to do with web pages,

which were simply not mentioned in the DeLorme disclosure. Applets were used for many “non-web page” functions. Petitioner provided no evidence that the material cited from DeLorme was directed to “web pages” nor did they even show *applications and data* stored on web pages nor with a browser, just as they failed to do so for “wireless handhelds” as well.

6. Claim As A Whole

Having not pointed to any disclosure or suggestion of “synchronization” in DeLorme (especially not of both applications and data), nor an API of any kind, nor “integration” at the applications level of any kind and certainly not between hospitality and non-hospitality applications, relied on a hardware bus to teach the software CCM and having ignored the requirement for all the synchronization to occur via the web server, Petitioner failed in its attempted match-up to claim 12 in its entirety. Further still, the PTAB has acknowledged in a previous appeal ruling that DeLorme’s “yes/no” selections and proprietary messaging protocol was extremely rudimentary as regards DeLorme’s “WCU.” (Appeal 2011-004999 Ruling at 4 (Exh. 2017)). DeLorme’s very limited handheld and communication capability would have made it impossible for the entire system to be synchronized as claimed. Moreover, the communications between DeLorme’s WCU and database did not occur via a web server, as is required by claim 12. For these reasons and others, including DeLorme’s failure to disclose or suggest element b of claim 12 requiring applications and data stored on a handheld and DeLorme’s failure to disclose synchronizing at all, leastwise with/through a web server, it is impossible for DeLorme to teach or suggest synchronizing the wireless handheld devices of element b with the other system elements as required.

D. Challenge 3: Blinn/Inkpen

1. Overview Of References

Blinn is not prior art,⁴⁹ nor does it disclose a hospitality application. Petitioner seems to have recognized this critical shortcoming by attempting to combine Blinn with Inkpen. However, the Petition merely points to disparate disclosures in each, referencing the Inkpen/Marriott disclosure in only one instance (with respect to “central database” in the claim chart) (Pet. at 65), but then provided no explanation whatsoever as to **how** the entirely different applications and data to be stored in the central database would be combined with each other, which seemingly would not have been practical, if even possible. That is the entirety of the alleged Blinn/Inkpen “combination;” no other elements nor the overall synchronization of/between the two is even discussed and thus it fails entirely. Thus, for all practical purposes, Blinn stands alone, rather than as a constituent of a “combination.” Further, consistent with the curious choice of Inkpen’s book as a supposed reference, Petitioner

⁴⁹ Petitioner relies on U.S. Patent No. 6,058,373, issued on May 2, 2000, which Petitioner refers to as “Blinn.” Petitioner wrongly claims that “Blinn” is entitled to an earlier date as a 102(b) reference, the date of April 27, 1999, on the ground that “Blinn” is “incorporated by reference” in an earlier patent, U.S. Patent No. 5,897,622. But Petitioner is wrong and its “incorporation” argument is technically defective. Petitioner is therefore wrong in claiming that “Blinn was ‘publicly available’ when the ‘622 patent issued...” What is incorporated, and the only thing that could even theoretically be used as a reference dated April 27, 1999, is the “application” from which “Blinn” issued, and not the “Blinn” patent itself. But Petitioner does not cite to the application and does not assert the application itself as a 102(b) reference.

mistakenly tries to characterize Inkpen as some kind of “system” in and of itself, *i.e.*, in regard to “its” MARSHA system (as if Inkpen equaled Marriott):

Inkpen discloses hospitality applications and data for use **in its** MARSHA computerized reservation system, and a POSITA would have found it obvious to include the hospitality applications from **Inkpen/MARSHA** into the system disclosed by Blinn to permit Blinn to function with hospitality applications.

Pet. at 66 (emphasis added). But Inkpen is just a book, and the law requires specific citations to facts/evidence, not just a broad hand-waving reference to an entire book, including dozens of different/disparate systems.

Further, as discussed above, by Inkpen’s own admission, the MARSHA system could not interface with internet based systems, such as Blinn, **without** the Cisco Switch, yet Petitioner failed to include that mandatory element in the Blinn/Inkpen combination, thus further rendering it incomplete, incompatible and unworkable. Petitioner itself cited to the **admission** in Inkpen that the Marriott system was incapable of even connecting to the internet/web for reservations without the hardware switches/devices and secondary systems which the Petition mistakenly relied on in its first combination (Inkpen/Nokia/Digestor) as purporting to meet the claimed CCM requirements. Petitioner stated:

A user can get certain information via the Marriott.com website (e.g., room rates property descriptions, hotel addresses) but can **only** check availability and make reservations **via a connection through the Marriott Server to the Travel Web site to the THISCO switch and then to Marsha**

Pet. at 28-29 (emphasis added). Thus, without the Cisco Switch and the TravelWeb server in the challenge, the Marriott/Inkpen system and its database (text-based/IBM

Mainframe) could not even talk to web-based systems, thus it could not work with Blinn, thus proving the following Petition contention incorrect and the Blinn combination entirely defective:

It would have been obvious to a person of ordinary skill in the art to combine the prior art elements of Blinn and Inkpen to achieve an online merchant system that includes the capability for online transactions with hospitality applications.

Pet. at 64. It cannot be reasonably disputed that Marriott's late-90s MARSHA system would not have worked with a Blinn-type approach. If it had been possible, Marriott would certainly have done so rather than the hodgepodge, convoluted option it was compelled to pursue prior to adopting Ameranth's approach as manifested in the claims of the '850 patent.

Finally, Petitioner attempted to rely on undisclosed references which were not part of the stated challenge, which PO submits is fatal to the challenge.

2. Synchronization, "Applications And Data"

Essentially, Petitioner attempts to avoid these critical requirements by asserting that any web based system innately provides them by virtue of the mere existence of the web and applications and data, under the premise that web based access to a central database is "synchronization." Clearly it does not, particularly when "applications" in addition to "data" is required to be synchronized, and which Petitioner read out of the claim. Likewise, Petitioner attempts to read out "synchronized" and "between" in '850 claim 12 first wherein clause. As discussed above in the context of Petitioner's first combination, a function of the claimed system is to "synchronize" hospitality applications and data *between* the central database, wireless handheld computing device, web server and web page. The

Petition tries to rely on Blinn for its disclosure of web pages transmitted to a browser. But there is no inherent synchronization “between” a central database and any of the other recited components simply by virtue of serving web pages. Failing to point to any disclosure in Blinn of storage of hospitality data on a web page or a web server or a handheld, or to any disclosure of storage of hospitality applications on a web page or a web server or a handheld, as the relevant terms are properly construed, nor how to have done so is fatal to Petitioner’s argument.

Further, Petitioner relies on an incorrect construction of synchronization:

It would have been obvious to a POSITA that upon the store server process and consumer browsers on computers and handheld devices becoming connected, the sales and item data maintained on the store server databases would be sent to the consumer browsers, including PocketWeb and NetHopper, rendered on the consumer computer and wireless handheld device, and thereby the data and applications on the store server process and the consumer browsers on the computers and handheld devices would become synchronized (as that term is properly construed).⁵⁰

Petitioner also inappropriately seeks to rely on additional disclosures from PocketWeb and NetHopper to meet the claim limitations, which is a violation of the requirement to clearly state the constituents of a proposed combination. Moreover, the argument does not provide any explanation for how these devices would provide the claimed synchronization as properly construed and including both applications and

⁵⁰ Pet. at 70-71. As previously explained, Petitioner’s reliance on what it *believed* to be the correct construction of “synchronized” (which excluded consideration of “applications and” from the full element) confirms this citation and argument to be fundamentally misplaced.

data. Petitioner only alleges that information from a database could have been sent to a browser on these devices. That does not meet numerous claim limitations nor the claim as a whole as discussed at length throughout this response.

3. Integration/API/Outside Applications

Petitioner relies on a commercial off-the-shelf software “**component**” from VeriFone to purportedly disclose this functionality:

Blinn discloses that the system discloses communications with third party credit card authorization software including “VeriFone’s Point of Sale (vPOS) software” that integrates **with the hospitality applications** on the store server process 106 to process the order.

Pet. at 71 (emphasis added). This assertion fails in multiple respects. First, the VeriFone payment processing “component” is just a sub-function of POS systems such as Blinn (VeriFone merely being one such choice), and it was an “off-the-shelf” software module, *i.e.*, **component** to be purchased/loaded⁵¹ **into** a Blinn-type POS application—it was **not** a separate application to be “integrated” via an API. Nor could VeriFone and Blinn meet the overall “integration” element requirement because, once again, Blinn itself is not even a hospitality application, thus there is no “hospitality” application even involved in the relied-on disclosures. Petitioner simply read out the “integration” term/requirement and “hospitality applications,” which completely misapprehends the “system of systems” nature of claim 12.

⁵¹ “While the preferred embodiment does not have a payment optional **component 1276** which performs card authorization, software such as VeriFone's Point of Sale (vPOS) software could be used. VeriFone's Point of Sale (VPOS) software is **publicly available** and can be obtained from VeriFone, Inc.” (Exh. 1025 at 37:59-66 (emphasis added)).

4. CCM–Protocols

Having mistakenly concluded that the CCM was a device, once again, Petitioner mistakenly seeks to meet the “software based” CCM with a hardware device, in this case by a “router”⁵² device, and the error is compounded by also relying on a component of the “operating system,” *i.e.*, the “TCP/IP stack:”

The Microsoft Windows® NT *operating system includes a TCP/IP stack* which handles all incoming and outgoing message traffic passed over the communications medium 108.” ... By handling “all incoming and outgoing message traffic” sent to and from the merchant system, *the TCP/IP stack* working in conjunction with the router 204 serve the role of the communications control module.

Pet. at 68-69 (emphasis added). However, the correct construction for the CCM is clearly not as a part of the operating system; rather the CCM “sits on top of protocols” and interfaces with the hospitality “**applications**”—it is not at, nor does it interface at, a lower level, *i.e.*, the CCM is not part of the “operating system.” Petitioner’s argument once again misapprehends and/or tries to frame the claimed invention as basic and rudimentary. To do this, Petitioner ignored almost everything of significance in the claims. There is no countenance in any precept of obviousness law for such wholesale butchery of the actual wording of claims or turning a blind eye to the intrinsic evidence.

5. “Wireless Handheld,” “Web Page”

The cited material from Blinn (Pet. at 66) which Petitioner attempts to apply against claim 12 element b is entirely off point. As discussed above in regard to other asserted references, this limitation requires functionality for storing of both hospitality

⁵² See Exh. 2015 (Router: “An intermediary device on a communications network that expedites message delivery”).

applications and data on the recited wireless handheld computing device. Blinn is not a “**hospitality**” application and nothing in the material quoted in the Petition provides any such disclosure, nor do the cites to other portions of Blinn, nor did the Petition provide any supporting argument for why “it would have been obvious to a POSITA that the consumer computer **102** could have stored hospitality applications and data.” (Pet. at 66). Such conclusory statements cannot form the basis for a conclusion that it is more likely than not that a claim is obvious. Blinn thus provides no disclosure of a locally-stored “hospitality app” and associated data for the claimed wireless handheld device as recited in claim 12 element b. Rather, Blinn’s alleged mobile functionality relied on by Petitioner is non-hospitality and entirely browser-based, and is thus inconsistent with the mobile “app” based approach reflected in claim 12 element b as detailed above.

6. Summary As To Blinn/Inkpen

The Petition and the Turnbull declaration both ignored the significance of the “hospitality” language and thus failed to make any argument as to why the hospitality requirement of claim 12 would be satisfied by the combination of Blinn and Inkpen, which as explained were not properly combinable. Further, Petitioner gave no reason for combining disparate references having different functionality. Thus Petitioner’s argument fails at the basic level to make a legally sufficient obviousness case because it amounts to simple hindsight-based substitution without providing a basis for making the substitution. *KSR*, 550 U.S. at 417-18 (Obviousness not established where “the claimed subject matter may involve more than the simple substitution of one known element for another”) (emphasis added) (citing *In re Kahn*, 441 F.3d at 988). Worse still, Petitioner did not propose that the Marriott MARSHA system be “substituted” for

an element of Blinn, instead simply offering attorney argument that somehow MARSHA could be “**included into**” Blinn. (Pet. at 66). Whatever that is supposed to mean as to either the MARSHA or Blinn structures, it was unexplained by the Petition.⁵³

Further, as discussed above, because Blinn does not disclose “hospitality applications and data,” it cannot disclose a wireless handheld computing device “on which hospitality applications and data are stored” as recited in element “b” of claim 12. Petitioner’s citations speak only to a purported “communications medium” and do not point to any disclosure in Blinn of storing any hospitality applications and data. (See Pet. at 66). Likewise, the requirement of claim 12 element “d” of a “Web page on which hospitality applications and data are stored” is not met by Blinn, nor does the Petition point to any purported disclosure of same, merely arguing conclusorily that a POSA would have known to “customize” Blinn to do so, without explaining how or why a POSA would be motivated to do so. (Pet. at 67). Further, and tellingly, the Blinn patent was assigned to a company, Microsoft, which in fact did not develop the inventions of the ‘850 patent on its own, and instead invested in PO Ameranth’s technology encompassed by the ‘850 claims, as discussed above.

E. Dependent Claims

’850 dependent claims 13-16 contain additional elements that further distinguish them over the prior art. Yet in all instances Petitioner deemed these claims to be met by the same structures as independent claim 12, thus making

⁵³ In any event, using a secondary reference for “alternative” or “additional” function based on review of the challenged patent disclosure is impermissible hindsight. See *Sensonics Inc. v. Aerosonic Corp.*, 81 F.3d 1566, 1570 (Fed. Cir. 1996).

the dependent claims “superfluous.” This is impermissible, as recently confirmed by the PTAB.⁵⁴ For example, Petitioner’s arguments regarding the recited “single point of entry” functionality (claim 13) fails as they all are based on an incorrect construction of “single point of entry” which, once again, Petitioner did not construe and chose to ignore, and effectively read out the correct “center of communications for hospitality applications” construction mandated by the intrinsic evidence. Petitioner merely pointed to **the same** disclosure in their alleged prior art as they did for the CCM limitations of claim 12. The Petition does not refer to any additional reference from any of Petitioner’s challenges which actually discloses or suggests such functionality. The Petition essentially alleges that this functionality would have been inherent, alleging, *e.g.*, that Blinn’s discussion of what Petitioner asserts is a CCM and the use of a browser on a handheld device somehow satisfies the “single point of entry” requirement. (Pet. at 73-74). Those arguments are shown to be insufficient above.

Similarly, as to DeLorme, Petitioner relies on what it asserts is a satisfaction of the “synchronized” and handheld limitations. Those arguments are shown to be insufficient above. Moreover, the Petition makes no argument of any disclosure in DeLorme of a “single” point of entry, merely referring to

⁵⁴ IPR2015-00284 non-Inst. Dec. at 7, May 27, 2015 (“Additionally, under the doctrine of claim differentiation, **claim 1 is presumed to be broader than dependent claim 7**, which specifically recites a temperature gradient in the physical object. Therefore, Petitioner’s proposed construction **would make dependent claim 7 superfluous.**”) (emphasis added) (*citing Free Motion Fitness, Inc. v. Cybex Int’l, Inc.*, 423 F.3d 1343, 1351 (Fed. Cir. 2005)).

alleged synchronization between a central database, a handheld device and a web page and once again citing to the same alleged CCM for two **different** elements and relying on a **hardware** “bus” for a **software** functionality:

A POSITA would understand that that the communication control module (*i.e.* **Interface and Interaction Bus 209** in Fig. 2 or Main Menu 413 and **Interaction Bus 414**) serves as an interface

Pet. at 59 (emphasis added).

Regarding Inkpen, Petitioner’s own arguments are self-defeating. The Petition relies on the “Cisco switch ... with an in-built capability to handle both TPF links to hotel systems and, via its Travel Web booking engine, TCP/IP for Internet traffic.” (Pet. at 46). There are thus two points of entry mentioned in Inkpen as regards the Marriott system, not one as required by claim 13. In its third challenge, Petitioner simply reads out “**hospitality**” from the claim, as evidenced by the following:

By handling “all incoming and outgoing message traffic” sent to and from the merchant system, the TCP/IP stack working in conjunction with the router 204 serves as a single point of entry for **all applications**.

Pet. at 73 (emphasis added).

Also, Petitioner’s flawed characterization of the alleged prior art fails to address in any manner the “automatic” requirement of dependent claims 14 and 15. Claims 14 and 15 require that information entered on a Web page or wireless handheld device is “automatically communicated” to other system components. But the Petition does not actually cite to evidence of “automatic” functionality. It simply reads out the term, and thus tries to negate the entirety of synchronous system claims 14 and 15, by implying that automatic is

meaningless, *i.e.*, that all systems were inherently synchronous and automatic, without any evidence of such. Further the Petition's reference to the possibility of updated data being **reflected** in "future downloads" (Pet. at 49, 61, 74) misses the mark because the claim includes "is" and "communicated," not "may be" **reflected** in the future.

Moreover, the "web **download**" would only result later and from a human action/request, thus also making it non-"automatic." As discussed above, the ordinary and customary definition of the term "automatic" is "done or produced as if by machine." (Exh. 2012). The "automatic" aspects of claims 14 and 15 are indisputably integral to the claimed invention, *e.g.*, the specification states: "For example, a reservation made online would be automatically communicated to the backoffice server and then synchronized with all the wireless handheld devices wirelessly." (Exh. 1001 at 4:18-21). Petitioner was required to analyze **each claim** individually and consider all elements of each claim as a whole in conducting the analysis. Petitioner did not do that, however.

As regards Inkpen/Nokia/Digestor, the Petition merely referenced claim 13, which cited material from Inkpen which says nothing about automatic functionality, and conclusorily states that a POSA would just "know" that information was transmitted automatically. That fails. Nor did Petitioner cite to anything in DeLorme whatsoever about anything in the system being "automatic" as required by dependent claims 14 and 15. The Petition relies on what had previously been referenced in regards to claims 12 and 13, and makes the conclusory statement

that a POSA would have seen automatic functionality in that material.⁵⁵ A disclosure of a system set up to perform the functionality automatically was required, but such disclosure was not identified by Petitioner.

As explained previously, the proper construction of “digital data transmission” was ignored and read out by Petitioner in regards to all three challenges. Petitioner simply, and repeatedly stated that “[t]he communications [] are inherently digital.” (Pet. at 49, 61, 76). However, Petitioner did not analyze this claim from the perspective of a POSA **at the time of the invention**, as required. In the late 1990s, at the time of the invention, all such communications were **not** inherently digital. Many communications at the time, if not most, were in fact not digital, as discussed above regarding claim construction. This was nonetheless simply ignored by the Petition. Instituting a CBM review of the dependent claims would be improper because their unique inventive functionality was effectively **ignored** by the Petition and thus a challenge to those claims has been waived.

F. Objective Evidence Of Non-Obviousness

The present Petition, filed seventeen years after the conception of the inventions of the ‘077 patent, now alleging obviousness in 1998, does not merely ask the Board to **ignore** history (which Petitioner and its expert did), it seeks to **change** history, *i.e.*, replace the actual factual circumstances of what really happened when the Ameranth inventors first recognized the underlying problem to be solved, and conceived its

⁵⁵ As to Blinn and Inkpen, Petitioner attempts to ignore the clear grammatical structure of claims 14 and 15 in an attempt to argue that a single structure, *i.e.*, a handheld with a web page merely completing a transaction, meets the “automatic communication” requirement. (Pet. at 75-76). This fails. Web page and handheld, as disclosed and claimed, are separate elements to be communicated to. *See* Exh. 1001 at 4:18-24.

solution, publicly demonstrated the inventions embodied in its 21st Century Restaurant™ system (Nov. 1998) and then introduced products embodying the claims of Ameranth's patents into the hospitality market (Nov. 1998 - May 1999).

Unprecedented and nearly instantaneous industry-wide recognition followed for the breakthrough products and technology embodying the inventions described in the patents, attesting to the novel and innovative nature of Ameranth's patented technology. This is evidenced in the comprehensive Secondary Factors Declarations provided to the Patent Office in the prosecution of the '077 patent (Exh. 1012 at 541-724, 860-906, 923-1017, 1025-26), including detailed explanations of nexus to/with the claimed subject matter (Exh. 1012 at 923-1017) and as elaborated below.⁵⁶ PO submits that objective factors including praise/awards, commercial success, copying, failure of others and licensing confirm the non-obviousness of all challenged '850 claims as is detailed herein.

Ameranth's 1998-99 product introductions/demonstrations actually involved many of the Petitioner companies as well as owners of the alleged prior art references asserted in the slew of "second round" CBM Petitions recently filed against the Ameranth family of patents, which include Agilysys,⁵⁷ Microsoft/Expedia, Starwood,⁵⁸

⁵⁶ In an Interview Summary, the Examiners noted: "The Applicant explained how the secondary factors show non-obviousness." (Exh. 1012 at 1030).

⁵⁷ While now claiming Ameranth's inventions were obvious, Agilysys licensed Ameranth's 21st Century Restaurant System™ technology and later-issued patents, first in 1999 (Exh. 1012 at 948) and continuing for **13 years** through 2012—at which time Agilysys abruptly stopped paying license fees and then blatantly copied.

⁵⁸ Starwood adopted Ameranth's technology and partnered with Ameranth in 2000 (Exh. 1012 at 552, 650). "Starwood is very excited to be able to offer Ameranth's software to our hotels in North America" (Exh. 1012 at 689).

Oracle/Micros, IBM⁵⁹ and Marriott. Thus, this is an *extraordinary* situation where the contemporaneous objective evidence does not merely retrospectively **imply** non-obviousness. Rather, indisputable facts and events which actually occurred at the time of the invention (directly involving many of the very references being asserted against Ameranth) **prove** that Ameranth’s inventions were **not** deemed to be obvious at the time of the invention, including involvement of many of the present Petitioners (in this and other recently-filed Petitions) and the very companies which Petitioner now alleges would have “combined” their products in lieu of using/licensing Ameranth’s technology.

However, these companies did *not do* in 1998/1999 what Petitioners now allege via hindsight would have been “obvious” for them *to do*. This is the “history” of what actually happened in 1998-99, which directly and indisputably refutes Petitioner’s 2015 assertions—yet Petitioner now effectively asks the Board to “ignore” this evidence as evidenced by the fact that Petitioner itself ignored it. These very companies partnered/worked with Ameranth (IBM/Marriott/Starwood), or sought to license Ameranth’s inventions exclusively for themselves (Oracle/Micros), or licensed it (Agilysys), or they invested directly in Ameranth (Microsoft/Expedia) to secure the use of Ameranth’s intellectual property for themselves. That the world’s largest hospitality IT company, Micros, sought to exclusively license Ameranth’s technology at the very time of the invention is overwhelming and directly **on point** objective evidence of what actually happened during the inventive timeframe.

IBM was the world’s largest computing company, Microsoft (then owner of

⁵⁹ IBM was a launch partner with Ameranth as to the 21st Century Restaurant™ System, in May 1999, at the Chicago NRA Show. (Exh. 1012 at 363, 392). .

Expedia) the world's largest software company, Micros the world's largest POS/PMS company and Marriott/Starwood two of the world's largest hotel companies. These facts, actions and statements thus compellingly confirm the non-obviousness of the inventions.⁶⁰ Further, Ameranth was a tiny company and had no "market power" to influence these companies to adopt its innovations and partner with it—rather, all it had was the innovations/technology itself and thus, conclusively, the third party actions in 1998/1999 were all based on the merits of the technology.

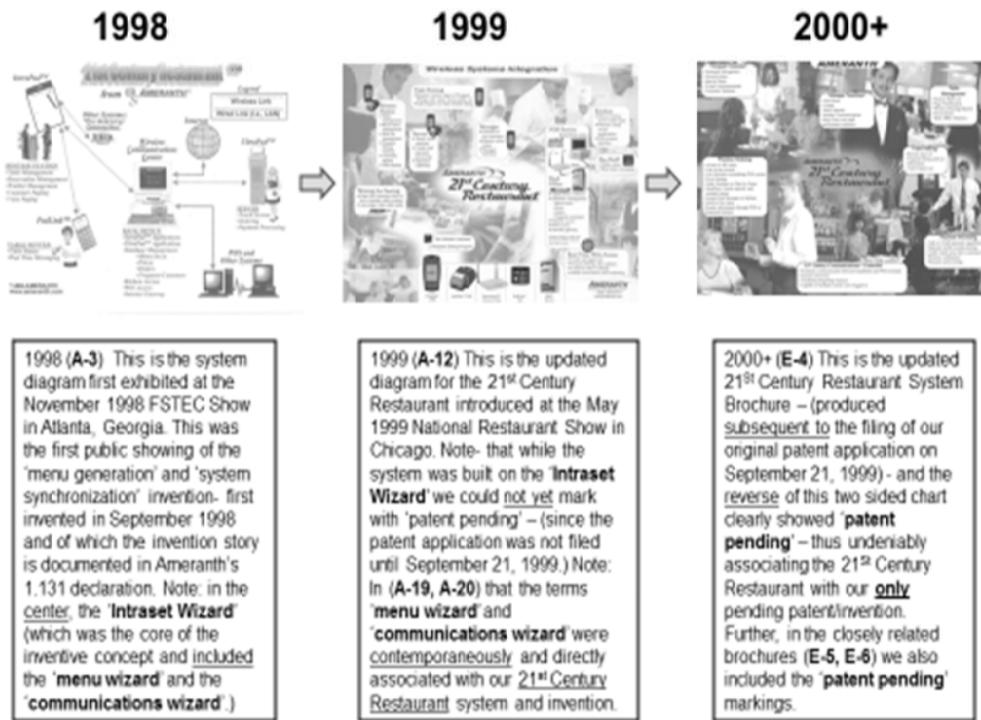
Additionally, it was not only these renowned companies that believed Ameranth's technology was a breakthrough. Rather, it was literally the entire hospitality marketplace and across the entire spectrum of independent experts, press/writers and decision-makers. Beyond Micros, Marriott, Microsoft/Expedia, Starwood and IBM, Symbol (then the world's largest LAN and mobile device supplier), Food.com (then the world's largest online food ordering company), JTECH (then the world's largest hospitality paging company) and six other of the largest hospitality POS companies all partnered with, licensed, sought to license and/or invested in Ameranth—whose sole product at the time was the soon to be "patent pending" 21st Century Restaurant™ system.

The system/claimed functionality is shown in the evolution of the contemporaneous 1998-2000 21st Century Restaurant System™ Brochures ('077 Nexus Declaration (Exh. 1012 at 962)) below, and include "patent pending" markings—shortly after the filing of the original '850 application, which included specific "screen shots" of the then operational 21st Century Restaurant™ system (Exh. 1010 at 55-61).

⁶⁰ *CBS v. Sylvania, Inc.*, 415 F.2d 719, 728 (1st Cir. 1969) ("the leader in color television development chose to license"), *cert. denied*, 396 U.S. 1061 (1970).

These Brochures included the disclosure of key inventive/claimed features, e.g., system synchronization, communications and integration (e.g., Exh. 1012 at 991) thus further confirming the nexus between the 21st Century Restaurant™ product and `850 claims 12-16. There is a "presumption of a nexus" when a product is "coextensive" with a patent claim. *Teva Pharm., Inc. v. Sandoz, Inc.*, 723 F.3d 1363, 1372 (Fed. Cir. 2013).⁶¹

Ameranth – ‘21st Century Restaurant’ - Evolution



Beyond the undisputed and dispositive actions taken to partner with Ameranth by the largest and most well-financed companies across the technical and hospitality market spectrum, the entire hospitality market press and numerous nationally

⁶¹ “Objective evidence of nonobviousness need only be ‘reasonably commensurate with the scope of the claim.’” *Rambus Inc. v. Rea*, 731 F.3d 1248, 1257 (Fed. Cir. 2013).

renowned publications including the Wall Street Journal, Time Magazine and Harvard Business review praised Ameranth's 21st Century Restaurant™ technology.

Showing still more objective evidence of non-obviousness were independent writers describing Ameranth's 21st Century Restaurant product technology with titles such as "**Brainstorm** Eases Restaurant Ordering Process." (1.132 Dec. (Exh. 1012 at 706)) (emphasis added). Contemporaneous praise such as "Brainstorm" in respect to Ameranth's inventions shows the hindsight-based allegations of obviousness from accused infringers to be entirely untrue. Further still, at the time of the invention, multiple technology award committees (each committee consisting of numerous recognized experts in their fields at the time of the invention) selected Ameranth's 21st Century Restaurant™ product/technology as the winner of numerous best technology awards, over all other IT technologies offered or available—one of which was personally nominated by Bill Gates. For Bill Gates, arguably the single most respected IT entrepreneur/executive in the world, at least at the time of Ameranth's inventions, to have personally nominated Ameranth for an award with the praise "Ameranth is one of the leading pioneers of the information technology age for the betterment of mankind" (Exh. 1012 at 543, 953), is the most compelling endorsement that Ameranth's technology was **not** obvious. Further, Microsoft/Expedia then made the strategic decision to not only partner with, but also to invest in, Ameranth.

Additionally, a Business Week article about Ameranth's technology, and its co-founder and lead inventor, Keith McNally (Ameranth's current President), commented:
 Keith McNally's eMenu technology is his latest bid to speed service, and gain efficiencies, in the restaurant and hotel industries . . . it's **not quite Star Trek**

Exh. 1012 at 890, 965 (emphasis added). Before pilot testing Ameranth's technology

in 2000, Steve Glen, vice-president of Marriott, wrote:

As you are aware, Marriott International is **very interested** in [Ameranth's] **21st Century Restaurant System technology** and we believe that **many of its innovative features** will enhance the efficiency of our operations, increase customer satisfaction and help increase profitability in our operations.

Exh. 1012 at 647, 964 (emphasis added).⁶² Also, Ameranth was notified that:

The case study of your exceptional use of information technology-Ameranth Wireless Improv Comedy Club Solution-has been included in the Computerworld Honors Online Archive as an example of a **revolutionary change** you have **created** at the commencement of a new century.

Exh. 1012 at 695 (emphasis added). A September 2000 press release for the Moby Award won by Ameranth states:

This award, from Mobile Insights honors the **best and finest implementations** of mobile computing and wireless data communications.

Exh. 1012 at 661 (emphasis added) (the actual “best and finest implementation” clearly would not have won this award if was an “obvious idea”); Exh. 1012 at 964.

Just one week before the original application from which the ‘850 patent claims priority was filed, Food.com, an early mover in the online ordering market, sought to obtain the exclusive right to Ameranth’s technology with specific reliance on the technical features of the ‘850 claims—thus further confirming the nexus:

I have met with Keith McNally [Ameranth Founder and lead inventor of the ‘077 patent] to agree on the deal points on a Licensing Agreement.

Here are the products and services we would want...

1. Communications Wizard—this tool creates a standard that can be

⁶² See *Allen Archery, Inc. v. Browning Mfg. Co.*, 819 F.2d 1087, 1092 (Fed. Cir. 1987) (praise in the industry for a patented invention, specifically praise from a competitor, tends to indicate that the invention was not obvious) (emphasis added).

used to integrate with any POS terminal and establishes the online ordering protocol.

Internal Food.com Memo between its entire Executive Team (Exh. 2001; *see also* Exh. 1012 at 957, 962, 970 (item “A-20”)).

In yet another confirmation of non-obviousness, and from an independent and compellingly knowledgeable source, the Harvard Business School Press (2005) stated that “Ameranth’s main product, 21st Century Restaurant is *poised to become the industry standard* for mobile wireless ordering and payment processing in restaurants.”) (Exh. 1012 at 965, 1017 (emphasis added)). Ameranth’s technology has indeed become the industry standard, through infringers such as the Petitioner companies’ affirmative choice to **copy** and use Ameranth’s technology without license.

The above evidence of praise/awards (all of which was simply ignored by Petitioner), characterizing the technology as a “breakthrough,” “not quite Star Trek,” “pioneering,” “revolutionary change,” “best and finest,” and “innovative” are conclusive objective evidence of non-obviousness.

Also confirming nexus, and that the technical features which received praise and awards were not based on technology that was previously available or from other sources, the Computerworld Honors Program Award summary (nominated by Bill Gates) stated that “Ameranth could develop and install the entire Web, PC, and wireless system—**something no other company could match**” (Exh. 1012 at 697), “the 21st Century CommunicationsTM middleware, [] routes data, regardless of programming language, across a variety of platforms” (*id.* at 698), the Ameranth product provided “a wireless **interface to the databased information**,” (*id.* at 699), was “**unique** in its ability to **route and synchronize data across the three platforms**”

(*id.*) and was “**the only application of its kind**” (*id.*) (emphasis added). This functionality including, *e.g.*, “interface to the databased information” and “**route and synchronize** data across all three platforms,” aligns with the critical inventive aspects of the `077 “**synchronization**” claims—thus a nexus exists between the patent claims (embodying technology not previously known) and the awards, praise, and commercial success of PO’s 21st Century Restaurant System™ family of products.

Still further, the non-obviousness of the claimed inventions has been confirmed over and over again, recently, through the licensing of the ‘850 patent family, across a wide spectrum of the world’s largest to smallest companies (36 in total) and including praise from the CEO’s of the licensees,⁶³ and with the majority of these licenses occurring entirely outside of litigation. These licensees include, *e.g.*, Taco Bell (subsidiary of Yum Brands (the world’s largest restaurant company)), Cognizant Inc., a Fortune 500 company, Xpient and Par POS systems (among the top ten largest POS companies in the world) and many of the largest online/mobile ordering companies.⁶⁴

Additionally, while now alleging that Ameranth’s inventions were obvious in 1998, the infringing defendants have copied and continue to publicly claim key inventive elements of Ameranth’s claims (if not Ameranth’s claims in their entirety),

⁶³ Par License Announcement (Exh. 2003) (“Reaching an agreement with Ameranth for the use of its **novel patents** was important to Par, since we provide **many of the restaurant and hotel industry’s top brands and renowned properties** with our industry leading hospitality products, solutions and services,” stated Paul Domorski, Chairman & CEO of Par Technology Corporation”) (emphasis added).

⁶⁴ *See In re Roufett*, 149 F.3d 1350, 1355 (Fed. Cir. 1998) (“licenses showing industry respect for the invention” is objective evidence of nonobviousness).

as “breakthroughs” of *their own*—essentially alleging that they were the true inventors of these alleged “non-inventions.”⁶⁵

Further examples of copying include Petitioner (CBM2014-00014) Hyatt Hotel’s CTO claiming that it invented the “single point of entry” of `850 claim 13.⁶⁶

Dominos also copied Ameranth and claimed a “breakthrough” on September 27, 2007—alleging that it was the first to provide a solution for configuring menus for mobile screens (“It also **automatically adapts to the size** of any cell phone screen”)⁶⁷ (emphasis added). This too confirms non obviousness and nexus. *Power-One, Inc. v. Artesyn Tech., Inc.*, 599 F.3d 1343 (Fed. Cir. 2010) (“Artesyn's position that Power-One's invention was obvious is **inconsistent** with its position that its own infringing product was **an advancement** in the industry.”) (emphasis added).

All three major pizza company defendants copied the claimed technology after receiving presentations from Ameranth, and they received a joint technology innovation award in 2009 for deploying it,

Anyone who’s ever wondered what restaurant chains might do to take advantage of new media marketing, **web 2-0** such as **social networks**, or the proliferation of **cellular phones** and **internet capable mobile devices**, need look no further than the big three pizza players.

Presentation of Rob Grimes (FS/TEC CEO), FS/TEC 2009 Awards transcript at 10:33

⁶⁵ *Heidelberger v. Hantscho Prods.*, 21 F.3d 1068, 1072 (Fed. Cir. 1994) (“litigation argument that an innovation is really quite ordinary carries diminished weight when offered by those who had **tried and failed to solve the same problem**, and then **promptly adopted the solution** that they are **now denigrating**”) (emphasis added).

⁶⁶ Hyatt Hotels CTO Interview, April 2015 (Exh. 2005).

⁶⁷ Exh. 2006 (“With the addition of yet another order-taking channel, Domino's is thrilled to lead the market with this **breakthrough** technology.”) (emphasis added).

(Exh. 2018) (emphasis added). Confirming the “failure of others”—in receiving its award for Ameranth’s copied technology, Pizza Hut admitted that it had tried in the late 90’s but failed:

[I]n the late 90s, we really made a run at this *and it wasn’t successful*
Statement of Delaney Bellingers - Pizza Hut, FS/TEC 2009 Awards transcript at 12:29
(Exh. 2018) (emphasis added).

Further, just as Hyatt (with its “API Façade”) did, Starbucks clearly has also copied and claimed for itself the inventive features of Ameranth’s `850 claim 13, with its “holy grail” as further admitted, e.g., *on April 27, 2015* (Exh. 2009) (“Kevin Johnson, Starbucks’ president and COO, said the company is seeing the benefits of having a mobile commerce platform that **integrates loyalty, a mobile application, a loyalty card program and in-store point of sale system.**”) (emphasis added).

Further proving nexus and copying, and again from the very companies involved in filing petitions against the `850 patent, after having licensed Ameranth’s technology/products from 1999 to 2012 and thus clearly having had direct access to it, Agilysys (formerly Infogenesis [“IG”]) copied Ameranth’s 21st Century Restaurant™ product/technology, and launched its copycat “IG Roam” mobile ordering product which embodied the claimed inventions⁶⁸ and halted license payments to Ameranth after paying those fees for 13 years.

Ameranth was/is entirely focused on the very products and technology that it has pioneered and uniquely introduced into the **hospitality** market. The copying,

⁶⁸ Exh. 2010 (“Agilysys ... today announced the general availability of the **InfoGenesis™ Roam mobile software solution**, a food and beverage ordering assistant for the company's award-winning InfoGenesis™ POS system.”) (emphasis added).

praise/awards, failure of others, commercial success and licensing confirmed above to have a nexus with key inventive aspects of the '850 claims compel a conclusion of non-obviousness at the time of the invention (especially because the Petitioner and its expert entirely ignored all of the objective evidence—which is in the record and clearly was known to Petitioner).

All of these leading companies, press/writers, experts, prestigious publications, customers, partners, multiple technology awards committees, 36 current licensees—along with multiple examiners, supervisory examiners and PTAB ALJs, and many companies who are now petitioners themselves, would **all** have to have been **wrong** at the time of and following the invention for Petitioner's 2015 obviousness contentions to now, in conflict with the record evidence, be **right**. Petitioner's litigation-induced hindsight view is shown to be wrong by the clear record evidence.

VII. CONCLUSION

For at least the reasons set forth above, the Board should not initiate a CBM review in this case. Petitioner has not established standing, and has failed to establish that any of claims 12-16 of the '850 patent are more likely than not invalid under 35 U.S.C. §103.

June 4, 2015

Respectfully Submitted,

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CERTIFICATE OF SERVICE

I certify that, in accordance with 37 C.F.R. §42.6, a true and correct copy of the foregoing Patent Owner's Preliminary Response was served on June 4, 2015 by causing said documents to be delivered via electronic mail, per agreement of the parties, to counsel for Petitioner at the following addresses:

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