Trials@uspto.gov 571-272-7822 Paper No. 62 Filed: September 28, 2017

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

HEWLETT-PACKARD ENTERPRISE CO.; HP ENTERPRISE SERVICES, LLC; and TERADATA OPERATIONS, INC., Petitioner,

v.

REALTIME DATA LLC d/b/a IXO, Patent Owner.

> Case IPR2016-00783 Patent 6,597,812 B1

Before GEORGIANNA W. BRADEN, JASON J. CHUNG, and SCOTT C. MOORE, *Administrative Patent Judges*.

CHUNG, Administrative Patent Judge.

FINAL WRITTEN DECISION Inter Partes Review 35 U.S.C. § 318(a) and 37 C.F.R. § 42.73



A L A R M Find authenticated court documents without watermarks at <u>docketalarm.com</u>.

I. INTRODUCTION

Hewlett-Packard Enterprise Company, HP Enterprise Services, LLC, and Teradata Operations, Inc. (collectively, "Petitioner"), filed a Petition to institute an *inter partes* review of claims 1–4, 8, 14–17, 21, and 28 of U.S. Patent No. 6,597,812 B1 ("the '812 patent"). Paper 1 ("Pet."). Realtime Data LLC ("Patent Owner"), filed a Preliminary Response pursuant to 35 U.S.C. § 313. Paper 12 ("Prelim. Resp.").

Upon consideration of the Petition and the Preliminary Response, on October 5, 2016, we instituted *inter partes* review of claims 1–4, 8, 14–17, 21, and 28 ("instituted claims"), pursuant to 35 U.S.C. § 314. Paper 19 ("Dec.").

Subsequent to institution, Patent Owner filed a Patent Owner Response. Paper 29 ("PO Resp."). Petitioner filed a Reply to Patent Owner's Response. Paper 37 ("Reply"). An oral hearing was held on June 30, 2017 and a transcript of the oral hearing is available in the record. Paper 59 ("Tr.").

We issue this Final Written Decision pursuant to 35 U.S.C. § 318(a) and 37 C.F.R. § 42.73. For the reasons discussed herein, Petitioner has shown by a preponderance of the evidence that claims 1–4, 8, 14–17, 21, and 28 of the '812 patent are unpatentable. *See* 35 U.S.C. § 316(e).

A. Related Matters

Petitioner and Patent Owner inform us that the '812 patent is involved in multiple suits in the U.S. District Court for the Eastern District of Texas. Pet. 1; Paper 9, 1–2; Paper 10, 2–3; Paper 58, 4–5. Patent Owner also informs us that the '812 patent is involved in a suit in the U.S. District Court for the Northern District of California. Paper 9, 2; Paper 10, 2–3; Paper 58, 4–5.

B. The Instituted Grounds

We instituted the following grounds of unpatentability:

References ¹	Basis	Instituted Claims
O'Brien ² and Nelson ³	§ 103(a) ⁴	1–4, 8, and 28
O'Brien, Nelson, and Welch ⁵	§ 103(a)	14–17 and 21

C. The '812 Patent

The '812 patent describes systems and methods "for providing lossless data compression and decompression." Ex. 1001, Abs. The '812 patent further describes "characteristics of run-length encoding, parametric dictionary encoding, and bit packing to comprise an encoding/decoding process." *Id.* Figure 1 of the '812 patent is reproduced below.

¹ Petitioner also relies upon the Declarations of Dr. Charles D. Creusere. Ex. 1005

² U.S. Patent No. 4,929,946; issued May 29, 1990, (Ex. 1002, "O'Brien")
³ MARK NELSON, THE DATA COMPRESSION BOOK (1992), (Ex. 1003, "Nelson")

⁴ The Leahy-Smith America Invents Act ("AIA"), Pub. L. No. 112-29, 125 Stat. 284, 287–88 (2011), revised 35 U.S.C. § 103, effective March 16, 2013. The '812 patent was issued prior to the effective date of the AIA. Thus, we apply the pre-AIA version of § 103.

⁵ U.S. Patent No. 4,558,302; issued Dec. 10, 1985, (Ex. 1004, "Welch")



Figure 1 of the '812 patent, reproduced above, is a detailed block diagram of a system for combining run-length encoding with dictionary encoding. Ex. 1001, 5:14–23. Input buffer 11 temporarily buffers an input data stream, and encoder 12 compresses the input data stream. *Id.* at 4:66–5:2. Encoder 12 implements a combination of run-length encoder 13 and dictionary encoder 14. *Id.* at 5:14–22. More specifically, encoder 12 identifies any run-length sequence in the data stream and outputs one or more code words from dictionary 15 to represent the run-length sequence. *Id.* at 5:31–37. Dictionary encoder 14 builds a character string comprising two or more characters that does not comprise a run-length sequence, searches dictionary 15 for a code word corresponding to the character string, and then outputs the code word representing the character string. *Id.* at 5:38–42.

D. The Instituted Claims

We instituted *inter partes* review of claims 1–4, 8, 14–17, 21, and 28.

Claim 1 is illustrative and reproduced below:

1. A method for compressing input data comprising a plurality of data blocks, the method comprising the steps of:

detecting if the input data comprises a run-length sequence of data blocks;

outputting an encoded run-length sequence, if a run-length sequence of data blocks is detected;

maintaining a dictionary comprising a plurality of code words, wherein each code word in the dictionary is associated with a unique data block string;

building a data block string from at least one data block in the input data that is not part of a run-length sequence;

searching for a code word in the dictionary having a unique data block string associated therewith that matches the built data block string; and

outputting the code word representing the built data block string. Ex. 1001, 16:53–17:2.

II. ANALYSIS

A. Principles of Law

A claim is unpatentable under 35 U.S.C. § 103(a) if "the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains." *KSR Int'l Co. v. Teleflex Inc.*, 550 U.S. 398, 406 (2007). The question of obviousness is resolved on the basis of underlying factual determinations, including: (1) the scope and content of the prior art;

DOCKET



Explore Litigation Insights

Docket Alarm provides insights to develop a more informed litigation strategy and the peace of mind of knowing you're on top of things.

Real-Time Litigation Alerts



Keep your litigation team up-to-date with **real-time** alerts and advanced team management tools built for the enterprise, all while greatly reducing PACER spend.

Our comprehensive service means we can handle Federal, State, and Administrative courts across the country.

Advanced Docket Research



With over 230 million records, Docket Alarm's cloud-native docket research platform finds what other services can't. Coverage includes Federal, State, plus PTAB, TTAB, ITC and NLRB decisions, all in one place.

Identify arguments that have been successful in the past with full text, pinpoint searching. Link to case law cited within any court document via Fastcase.

Analytics At Your Fingertips



Learn what happened the last time a particular judge, opposing counsel or company faced cases similar to yours.

Advanced out-of-the-box PTAB and TTAB analytics are always at your fingertips.

API

Docket Alarm offers a powerful API (application programming interface) to developers that want to integrate case filings into their apps.

LAW FIRMS

Build custom dashboards for your attorneys and clients with live data direct from the court.

Automate many repetitive legal tasks like conflict checks, document management, and marketing.

FINANCIAL INSTITUTIONS

Litigation and bankruptcy checks for companies and debtors.

E-DISCOVERY AND LEGAL VENDORS

Sync your system to PACER to automate legal marketing.

