

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

APPLE INC.

Petitioners

v.

PERSONALIZED MEDIA COMMUNICATIONS LLC

Patent Owner

Case No.: IPR2016-01520

Patent No.: 8,559,635

For: Signal Processing Apparatus and Methods

DECLARATION OF ALFRED WEAVER, PH.D.

PURSUANT TO 37 C.F.R. § 1.68

Mail Stop PATENT BOARD
Patent Trial and Appeal Board
United States Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450

PMC Exhibit 2001

Table of Contents

	<u>Page</u>
I. Qualifications & Engagement.....	1
II. Materials Reviewed and Relied upon	7
III. Summary of Conclusions	7
IV. Legal Standards	8
A. Anticipation	9
B. Obviousness.....	9
C. Claim Construction	11
D. Persons of Ordinary Skill in the Art.....	12
V. Background Technology of the '635 Patent	12
VI. Claim Construction	19
A. Decryption terms	19
B. “receiving an encrypted digital information transmission ... unaccompanied by any non-digital information transmission”	34
VII. The '635 Patent is Patentable Over the Prior Art.....	36
A. Priority.....	36
(a) Claim 3	45
(b) Claims 4 and 7.....	59
(c) Claim 13.....	79
(d) Claim 18.....	95
(e) Claim 20.....	110

(f)	Claims 21 and 28.....	122
(g)	Claim 32.....	132
(h)	Claim 33.....	145
B.	Claim 3 Is Patentable over Campbell.....	160
(a)	Campbell Does Not Qualify As Prior Art.....	161
(b)	“receiving at said remote transmitter station one or more second instruct signals which operate at the subscriber station to identify and decrypt said unit of programming or said one or more first instruct signals, said remote transmitter station transferring said one or more second instruct signals to said transmitter”.....	163
(c)	“receiving a control signal which operates at the remote transmitter station to control the communication of a unit of programming and one or more first instruct signals and communicating said control signal to said remote transmitter station”.....	165
(d)	“receiving a code or datum identifying a unit of programming to be transmitted by the remote transmitter station, said remote transmitter station transferring said unit of programming to a transmitter”.....	166
C.	Claim 33 is Patentable over Chandra in view of Nachbar.....	170
(a)	Chandra and Nachbar Do Not Qualify As Prior Art.....	173
(b)	Claim 33.....	173
D.	Claims 13, 18, 20, 32 Are Patentable over Chandra.....	181
(a)	Chandra Does Not Qualify As Prior Art.....	181
(b)	Claim 18.....	181
(c)	Claim 20.....	183

(d)	Claim 32.....	184
(e)	Claim 13.....	185
E.	Claims 4, 7, 21, and 28-30 Are Patentable over Seth-Smith	187
(a)	Seth-Smith Does Not Qualify As Prior Art	187
(b)	Claim 4.....	188
(c)	Claim 7.....	189
(d)	Claim 21	189
(e)	Claim 28.....	190
(f)	Claims 29 and 30.....	190
VIII.	CONCLUSION	191

I, Dr. Alfred C. Weaver, do hereby declare:

1. I am making this declaration at the request of Patent Owner Personalized Media Communications, LLC (“PMC”) in the matter of the Inter Partes Review No. IPR2016-01520 of U.S. Patent No. 8,559,635 (“635 Patent.”)

I. QUALIFICATIONS & ENGAGEMENT

2. I earned a Bachelor of Science in Engineering Science in 1971 from the University of Tennessee. I also earned a Master of Science in Computer Science from the University of Illinois at Urbana-Champaign in 1973. Thereafter, I earned a Ph.D. in Computer Science at the University of Illinois at Urbana-Champaign in 1976.

3. I am currently a Professor of Computer Science and the Associate Chair of the Department of Computer Science at the University of Virginia (“UVa”). I have been employed at UVa continuously since 1977. Over the period of my employment at UVa, I have taught more than 25 different courses, including electronic commerce, operating systems, computer networks, and various programming courses. Moreover, I have been the graduate advisor for 69 Ph.D. and master’s students, all in Computer Science.

4. In addition to my teaching duties, I am also the Founding Director of UVa’s Applied Research Institute, a group of faculty engaged in research areas related to national security and funded by both government and industry. To date,

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.