

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

LAM RESEARCH CORP.,

Petitioner

v.

DANIEL L. FLAMM,

Patent Owner

U.S. Patent No. RE40,264 E

Issued: April 29, 2008

Named Inventor: Daniel L. Flamm

Title: MULTI-TEMPERATURE PROCESSING

Case IPR2015-01768

Patent RE40,264 E

PETITIONER'S REPLY

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<i>Allied Erecting and Dismantling Co., v. Genesis Attachments, LLC</i> , Slip Op. No. 15-1533	3
<i>CFMT, Inc. v. Yieldup Int’l. Corp.</i> , 349 F.3d 1333, 1342 (Fed. Cir. 2003) and <i>KSR</i> , 550 U.S. at 418	3, 15, 16, 21
<i>Graham v. John Deere Co. of Kansas City</i> , 383 U. S. 1, 17-18 (1966)	16
<i>In re Keller</i> , 642 F.2d 413 (C.C.P.A, 1981)	3, 19
<i>MCM PORTFOLIO LLC v. Hewlett-Packard Co.</i> , 812 F. 3d 1294 (Fed. Cir. 2015)	15
<i>In re Mouttet</i> , 686 F.3d 1322 (Fed. Cir. 2012)	3, 20
<i>In re Ochiai</i> , 71 F.3d 1565 (Fed. Cir. 1995)	15
<i>Sakraida v. Ag. Pro., Inc.</i> , 425 U.S. 273, 282 <i>reh’g denied</i> , 426 U.S. 955 (1976)	3, 4
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37 C.F.R. § 42.104(b)(4).....	13
35 U.S.C. § 103(a)	1, 6, 16

EXHIBIT LIST

Exhibit	Description
1001	U.S. Patent No. RE40,264 (the '264 patent)
1002	European Patent Application Number 90304724.9 (Tegal)
1003	U.S. Patent No. 5,151,871 (Matsumura)
1004	U.S. Patent No. 4,913,790 (Narita)
1005	U.S. Patent No. 4,680,086 (Thomas)
1006	U.S. Patent No. 5,219,485 ('485 Wang)
1007	D. S. Fischl, G. W. Rodrigues, and D. W. Hess, <i>Etching of Tungsten and Tungsten Silicide Films by Chlorine Atoms</i> published in August 1998 by The Journal of Electrochemical Society in Vol. 135, No. 8 (Fischl)
1008	U.S. Patent No. 4,992,391 ('391 Wang)
1009	U.S. Patent No. 5,174,856 (Hwang)
1010	Declaration of Joseph L. Cecchi, Ph.D.
1011	American Heritage Dictionary, Third Edition, 1993
1012	Merriam-Webster's Collegiate Dictionary, Tenth Edition, 1993
1013	U.S. Patent No. 4,645,218 (Ooshio)
1014	Curriculum Vitae of Joseph L. Cecchi, Ph.D.
1015	Daniel L. Flamm and G. Kenneth Herb, "Plasma Etching Technology – An Overview" in Plasma Etching, An Introduction, Dennis M. Manos and Daniel L. Flamm, eds. (Academic Press, San Diego, 1988)
1016	Declaration of Morgan Chu In Support of LAM's Unopposed Motion for <i>Pro Hac Vice</i> Admission
1017	Declaration of Talin Gordnia In Support of LAM's Unopposed Motion for <i>Pro Hac Vice</i> Admission
1018	Declaration of Joseph L. Cecchi, Ph.D. in support of Reply

I. INTRODUCTION

On February 24, 2016, the Board ordered an IPR with respect to the following grounds of unpatentability:

(1) Whether claims 56-58 are unpatentable under § 103(a) as having been obvious over the combined disclosures of Tegal, Matsumura, Narita, Thomas and Wang '485;

(2) Whether claims 60, 62, 63 and 71 are unpatentable under § 103(a) as having been obvious over the combined disclosures of Tegal, Matsumura, Narita, Thomas and Fischl;

(3) Whether claims 51, 55 and 68 are unpatentable under § 103(a) as having been obvious over the combined disclosures of Tegal, Matsumura, Narita and Thomas;

(4) Whether claims 56 and 59 are unpatentable under § 103(a) as having been obvious over the combined disclosures of Tegal, Matsumura, Narita, Wang '391, Thomas and Wang '485;

(5) Whether claim 61 is unpatentable under § 103(a) as having been obvious over the combined disclosures of Tegal, Matsumura, Narita, Thomas, Fischl and Ooshio; and

(6) Whether claim 70 is unpatentable under § 103(a) as having been obvious over the combined disclosures of Tegal, Matsumura, Narita, Thomas, Fischl and

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