

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

**SONY CORPORATION,
Petitioner**

v.

**RAYTHEON COMPANY,
Patent Owner**

Case IPR2015-01201

Patent 5,591,678

**DECLARATION OF ARTHUR J. MEDRANO
REGARDING THE BUSINESS RECORDS OF RAYTHEON COMPANY**

I, Arthur J. Medrano, declare and certify:

1. I head the Office of Records Management and am the records manager for Raytheon Company's ("Raytheon") Space and Airborne Systems ("SAS") division, headquartered in McKinney, Texas. I have been in this position since 2006. I am of legal age and competent to testify in court. I make this Declaration based upon my personal knowledge of the matters described herein.

2. I am familiar with the record keeping policies and procedures of Raytheon and I direct all of the SAS division's records management. My duties include managing inactive records and document storage processes.

3. I understand that Raytheon acquired Hughes Aircraft Company ("Hughes") in 1997. I further understand that as part of that acquisition, Raytheon acquired certain patents, including U.S. Patent No. 5,591,678 ("the '678 Patent"), as well as certain documents related to the '678 Patent and to Hughes' research and development ("R&D") programs. Documents related to Hughes' R&D programs include Independent Research and Development ("IR&D" or "IRAD") Technical Plans, white papers, invention disclosures, and lab notebooks. Raytheon's SAS division has internal responsibility within Raytheon for these R&D documents and for the '678 Patent.

4. I and my staff at the Office of Records Management conducted the search for the records relating to Hughes' R&D programs.

5. I and my staff at the Office of Records Management have knowledge of the locations where those documents are physically stored. The records from Hughes' R&D programs, including documents associated with the '678 Patent, are stored at Raytheon's SAS facility in McKinney, Texas, other SAS facilities across the United States of America, as well as third-party facilities, run by Iron Mountain, located across the United States of America.

6. In the course of Raytheon's discovery investigation related to Civil Action Nos. 2:15-CV-341-JRG-RSP, 2:15-CV-342-JRG-RSP, both pending in the United States District Court for the Eastern District of Texas, and IPR2015-01201, I, or staff working at my direction, collected the IRAD documents, white paper, invention disclosures, and lab notebook that are listed in Appendix A to this declaration. These particular documents have been stored at an Iron Mountain facility both prior to, and subsequent to, Raytheon's acquisition of Hughes.

7. I and my staff have reviewed the documents listed in Appendix A. I and my staff found the documents listed in Appendix A, and each of these documents was in a condition that created no suspicion as to its authenticity. The documents listed in Appendix A were found in Iron Mountain facilities, which is where I and my staff expect to find old Hughes documents. Each of the documents listed in Appendix A is at least twenty (20) years old.

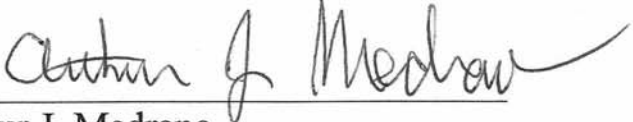
8. Based on my work at Raytheon, I have learned, and I understand, that the documents listed in Appendix A, were made at or near the time listed on the documents by – or from information transmitted by – an employee at Hughes Aircraft with knowledge of that activity. I have further learned and understand that each of the documents listed in Appendix A was generated and maintained as a practice in the ordinary course of Hughes' business. I, and my predecessors at the Office of Records Management, have been the custodians of the documents listed

in Appendix A and have maintained these materials in the ordinary course of Raytheon's business since the 1997 acquisition of Hughes by Raytheon.

9. My staff provided the original copies of these documents to Mr. William McInnis, Licensing Manager at Raytheon, whom I understand provided copies of these documents to Raytheon's attorneys at Steptoe & Johnson, LLP. I understand that Mr. McInnis presently has custody of the original documents.

I declare under the penalty of perjury under the laws of the United States of America that the foregoing is true and correct.

Date: March 11, 2016



Arthur J. Medrano

APPENDIX A

Exhibit	Description
2008	Hughes Aircraft Invention Disclosure: <i>Thermal Expansion Material (TEM) Readout Chips</i> , dated Aug. 8, 1990 “1990 Invention Disclosure” – [Bates numbered RAY00000176-184] [PROTECTIVE ORDER MATERIAL - SEALED]
2009	Hughes Aircraft Invention Disclosure: <i>One step method of transferring thin film devices onto alternate substrates</i> , dated Nov. 11, 1992, “1992 Invention Disclosure” – [Bates numbered RAY00000185-88] [PROTECTIVE ORDER MATERIAL - SEALED]
2010	Hughes Aircraft Independent Research and Development Technical Plan 1991, Vol. 3 “1991 IRAD” (excerpts) – [Bates numbered RAY00004572-5004] [PROTECTIVE ORDER MATERIAL (ITAR)- SEALED]
2011	Hughes Aircraft Independent Research and Development Technical Plan 1991, Vol. 3 “1992 IRAD” (excerpts) – [Bates numbered RAY00005005-5424] [PROTECTIVE ORDER MATERIAL (ITAR) - SEALED]
2012	Hughes Aircraft 1991 IR&D Technical Plan, “1991 IRAD Appendices (Distribution List)” (excerpts) – RAY00007358-7651] [PROTECTIVE ORDER MATERIAL – (ITAR) - SEALED]
2013	Hughes Aircraft 1992 IR&D Technical Plan, “1992 IRAD Appendices (Distribution List)” (excerpts) – [Bates numbered RAY00007652-7941] [PROTECTIVE ORDER MATERIAL (ITAR) - SEALED]
2014	Lab Notebook No. LN1260 of Joe Bendik, dated Jan. 15, 1992 [PROTECTIVE ORDER MATERIAL (ITAR) SEALED]
2036	Hughes Aircraft Technology Center, <i>Monolithic 3-D Packaging Approach Applied to WSI Associative String Processor (WASP)</i> , “1990 Research Proposal and White Paper” [PROTECTIVE ORDER MATERIAL (ITAR) - SEALED]