

**UNITED STATES INTERNATIONAL TRADE COMMISSION
Washington, DC**

**Before the Honorable Charles E. Bullock
Chief Administrative Law Judge**

In the Matter of

UNMANNED AERIAL VEHICLES AND
COMPONENTS THEREOF

Investigation No. 337-TA-1133

**EXPERT REPORT OF DR. JUAN J. ALONSO
REGARDING INVALIDITY OF U.S. PATENT
NOS. 9,260,184 AND 10,044,013**

I. INTRODUCTION

1. My name is Juan J. Alonso, and I have been engaged as a technical expert by counsel on behalf of Respondents SZ DJI Technology Co. Ltd. (“SZ DJI”); DJI Europe B.V. (“DJI Europe”); DJI Technology Inc. (“DJI Tech.”); iFlight Technology Co. Ltd. (“iFlight”); DJI Baiwang Technology Co. Ltd. (“DJI Baiwang”); DJI Research LLC (“DJI Research”); DJI Service LLC (“DJI Service”); and DJI Creative Studio LLC (“DJI Studio”) (collectively, “DJI”) to address certain issues of validity concerning U.S. Patent Nos. 9,260,184 (“the ’184 patent”) and 10,044,013 (“the ’013 patent”) (collectively, the “asserted patents” or “patents-in-suit”). More specifically, I have been asked to give my opinions about whether claims 1-5 and 11 of the ’184 patent and claims 1, 3-16, 18, 21-24 of the ’013 patent (collectively, the “asserted claims”) that are being asserted by Complainant Autel Robotics USA LLC’s (“Autel”) (“Autel” or “Complainant”) are invalid.

2. In this report, I will set forth my opinions regarding the invalidity of the asserted claims of the patents-in-suit. This report contains a statement of my opinions formed in this case and provides the basis and reasons for those opinions. I make the following statements based on my own personal knowledge and, if called as a witness, I could and would testify to the following.

II. QUALIFICATIONS AND PROFESSIONAL EXPERIENCE

3. My academic and professional pursuits are closely related to the subject matter of the patents-in-suit. A true and accurate copy of my curriculum vitae is attached as Exhibit 1 to this report.

APPENDIX A2

Asserted Claims of the '184 patent	Exemplary Disclosures in the Art
	nut threads. <i>Sokn</i>'s lug/notch style (segmented threading) is easily aligned and does not have a cross-threading issue. One of the issues addressed and claimed by the inventors of the '184 patent is a mechanism for precise and secure connection of two components (propeller and driveshaft). This was not only a problem for multi-rotor copters such as the quadcopter but for any system requiring a precise and secure connection of one component to another component, such as the system described in <i>Sokn</i>. Therefore, given the nature of the problem being addressed, a POSITA would have consulted references describing coupling mechanisms for other systems subject to similar forces and would have been led to <i>Sokn</i> which includes a motor and multiple rotating driveshafts. In general, a POSITA would have understood the need to overcome the limitations of <i>Sasaki</i> to ensure simpler, more reliable, less error prone, and faster ways of attaching and detaching the propellers of a UAV. Moreover, the ability to replace propellers when they (often) break during normal operations is of high value for a typical drone user, for whom it is of paramount importance to maximize convenience, speed of preparations in the field, and the actual time spent performing the mission the drone is designed for, rather than spending the majority of the time in preparations for flight. In addition, the combination of <i>Sasaki</i> and <i>Sokn</i> leads to a simpler locking mechanism that minimizes the possibility of user error in the setup and preparation phase of a drone flight. <u>Combination with <i>Philistine</i></u> <i>Philistine</i> discloses this element. <i>Philistine</i> "relates generally to a mounting system and more specifically to a twist lock mounting system for rapid and secure attachment and detachment of a variety of devices to various surfaces." 1:10-14. "FIGS. 1 and 2 show perspective views from the top and bottom, respectively, of an embodiment of a twist lock mount 100 according to the present invention. The twist lock mount 100 includes two basic components, a mounting member 110 that is secured to or integrated