

UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, DC 20549

FORM S-8
REGISTRATION STATEMENT UNDER THE SECURITIES ACT OF 1933

Ekso Bionics Holdings, Inc.

(Exact name of registrant as specified in its charter)

Nevada

(State or other jurisdiction of incorporation or organization)

99-0367049

(I.R.S. Employer Identification No.)

**1414 Harbour Way, Suite 1201
Richmond, California**

(Address of Principal Executive Offices)

94804

(Zip Code)

Amended and Restated 2014 Equity Incentive Plan
(Full Title of the Plan)

**Thomas Looby, CEO
Ekso Bionics Holdings, Inc.
1414 Harbour Way, Suite 1201
Richmond, CA 94804
(510) 984-1761**

(Name, address and telephone number, including area code, of agent for service)

Copy to:

Erin M. Anderman, Esq.
Nutter, McClennen & Fish, LLP
155 Seaport Boulevard
Boston, MA 02210
(617) 439-2000

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, a smaller reporting company, or an emerging growth company. See the definitions of "large accelerated filer," "accelerated filer," "smaller reporting company" and "emerging growth company" in Rule 12b-2 of the Exchange Act.

Large accelerated filer
Non-accelerated filer (Do not check if a smaller reporting company)

Accelerated filer
Smaller reporting company
Emerging growth company

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 7(a)(2)(B) of Securities Act.

CALCULATION OF REGISTRATION FEE

Title of securities to be registered	Amount to be registered	Proposed maximum offering price per share	Proposed maximum aggregate offering price	Amount of registration fee
Common Stock, par value \$0.001 per share	1,000,000(1)	\$ 1.25(2)	\$ 1,250,000.00(2)	\$ 155.63(2)

- (1) This registrant is filing this Registration Statement to register the issuance of an additional 1,000,000 shares of Common Stock that may be issued under the registrant's Amended and Restated 2014 Equity Incentive Plan (the "Plan"), which shares are in addition to 1,655,714 shares (taking into account a 1-for-7 reverse stock split on May 4, 2016) of Common Stock previously registered pursuant to a Registration Statement on Form S-8 (Registration No. 333-207131) and 2,058,571 shares (taking into account a 1-for-7 reverse stock split on May 4, 2016) of Common Stock previously registered pursuant to a Registration Statement on Form S-8 (Registration No. 333-198357), both of which were filed with the Securities and Exchange Commission. This Registration Statement also covers an indeterminate number of shares that may become issuable under the Plan as a result of a stock dividend, stock split, or other recapitalization.

- (2) Estimated solely for the purpose of calculating the registration fee pursuant to Rules 457(c) and (h) under the Securities Act of 1933, as amended, based on the price at which options may be exercised and where such price is not known, the average of the high and low prices of the registrant's common stock as quoted on the Nasdaq Capital Market on September 28, 2017.
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**EXPLANATORY NOTE; INCORPORATION BY REFERENCE OF CONTENTS OF REGISTRATION STATEMENTS ON
FORMS S-8 (NO. 333-207131; NO. 333-198357)**

This Registration Statement registers additional securities of the same class as other securities for which registration statements filed on Forms S-8 relating to Ekso Bionics Holdings, Inc.'s Amended and Restated 2014 Equity Incentive Plan (the "Plan") are already effective. Pursuant to Instruction E to Form S-8, we incorporate by reference into this Registration Statement the contents of (a) the registration statement on Form S-8 (File No. 333-198357) that we filed with the Securities and Exchange Commission on August 25, 2014 relating to the registration of 2,058,571 shares (taking into account a 1-for-7 reverse stock split on May 4, 2016) of our common stock authorized for issuance under the Plan, and (b) the registration statement on Form S-8 (File No. 333-207131) that we filed with the Securities and Exchange Commission on September 25, 2015, relating to the registration of 1,655,714 shares (taking into account a 1-for-7 reverse stock split on May 4, 2016) of our common stock authorized for issuance under the Plan, in each case, in their entirety and including exhibits thereto. This Registration Statement provides for the registration of an additional 1,000,000 shares of common stock to be issued under the Plan. These 1,000,000 shares represent an increase in the number of shares of common stock reserved for issuance under the Plan, which increase was approved by the stockholders on June 20, 2017 at the 2017 Annual Meeting of Stockholders of Ekso Bionics Holdings, Inc. As a result of the foregoing, the number of shares of common stock reserved under the Plan is now 4,714,285.

Item 8. Exhibits

Exhibit No.	Description of Exhibit
<u>4.1</u>	<u>Articles of Incorporation of the Registrant (incorporated by reference from Exhibit 3.1 to the Registrant's Annual Report on Form 10-K filed March 19, 2015)</u>
<u>4.2</u>	<u>By-Laws of the Registrant (incorporated by reference from Exhibit 3.4 to the Registrant's Current Report on Form 8-K filed on January 23, 2014)</u>
<u>4.3</u>	<u>Certificate of Designation of Preferences, Rights and Limitations of Series A Convertible Preferred Stock, filed on December 23, 2015 (incorporated by reference from Exhibit 3.1 to the Registrant's Current Report on Form 8-K filed on December 24, 2015)</u>
<u>4.4</u>	<u>Certificate of Amendment to Certificate of Designation of Series A Convertible Preferred Stock, filed on April 4, 2016 (incorporated by reference from Exhibit 3.1 to the Registrant's Current Report on Form 8-K filed on April 7, 2016)</u>
<u>4.5</u>	<u>Certificate of Change of Ekso Bionics Holdings, Inc. effective May 4, 2016 (incorporated by reference from Exhibit 3.1 to the Registrant's Current Report on Form 8-K filed on May 5, 2016)</u>
<u>4.6</u>	<u>Form of specimen certificate (incorporated by reference from Exhibit 4.4 to the Registrant's Registration Statement on Form S-3 filed on June 23, 2015)</u>
<u>4.7</u>	<u>Registration Rights Agreement, dated as of January 15, 2014, by and among the Registrant and the investors named therein (incorporated by reference from Exhibit 10.10 of the Registrant's Current Report on Form 8-K filed on January 23, 2014)</u>
<u>4.8</u>	<u>Registration Rights Agreement, dated as of July 19, 2017, by and among the Registrant and the purchasers named therein (incorporated by reference from Exhibit 10.2 of the Registrant's Current Report on Form 8-K filed on July 25, 2017)</u>
<u>5.1*</u>	<u>Opinion of Nutter, McClennen & Fish, LLP</u>
<u>23.1*</u>	<u>Consent of Nutter, McClennen & Fish, LLP (included in Exhibit 5.1)</u>
<u>23.2*</u>	<u>Consent of OUM & Co., LLP</u>
<u>24.1*</u>	<u>Power of Attorney (included in the signature page to this Registration Statement)</u>
<u>99.1</u>	<u>The Registrant's Amended and Restated 2014 Equity Incentive Plan (incorporated by reference from Appendix B to Registrant's Proxy Statement on Schedule 14 filed on April 28, 2017)</u>

*Filed herewith.

SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, the registrant certifies that it has reasonable grounds to believe that it meets all of the requirements for filing on Form S-8 and has duly caused this registration statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of Richmond, State of California, on October 4, 2017.

EKSO BIONICS HOLDINGS, INC.

By: /s/ Thomas Looby
Thomas Looby
Chief Executive Officer
(principal executive officer)

SIGNATURES AND POWER OF ATTORNEY

KNOW ALL PERSONS BY THESE PRESENTS, that each person whose signature appears below hereby constitutes and appoints Thomas Looby and Maximilian Scheder-Bieschin, or either one of them, his or her true and lawful attorney-in-fact and agent, with full power of substitution and resubstitution, for such person and in his or her name, place and stead, in any and all capacities, to sign any or all further amendments or supplements (including post-effective amendments filed pursuant to Rule 462(b) of the Securities Act of 1933, as amended) to this registration statement and to file the same, with all exhibits thereto, and other documents in connection therewith, with the SEC, granting unto said attorney-in-fact and agent or either one of them full power and authority to do and perform each and every act and thing requisite and necessary to be done in and about the premises, as fully as to all intents and purposes as she might or could do in person, hereby ratifying and confirming all that each of said attorneys-in-fact and agents, or any of them, or his substitutes, may lawfully do or cause to be done by virtue hereof.

Pursuant to the requirements of the Securities Act of 1933, as amended, this Registration Statement has been signed by the following persons in the capacities and on the dates indicated.

<u>Signatures</u>	<u>Title</u>	<u>Date</u>
<u>/s/ Thomas Looby</u> Thomas Looby	Director and Chief Executive Officer (principal executive officer)	October 4, 2017
<u>/s/ Maximilian Scheder-Bieschin</u> Maximilian Scheder-Bieschin	Chief Financial Officer (principal financial and accounting officer)	October 4, 2017
<u>/s/ Steven Sherman</u> Steven Sherman	Director and Chairman of the Board	October 4, 2017
<u>/s/ Marilyn Hamilton</u> Marilyn Hamilton	Director	October 4, 2017
<u>/s/ Howard Palefsky</u> Howard Palefsky	Director	October 4, 2017
<u>/s/ Jack Peurach</u> Jack Peurach	Director	October 4, 2017
<u>/s/ Stanley Stern</u> Stanley Stern	Director	October 4, 2017
<u>/s/ Theodore Wang</u> Theodore Wang	Director	October 4, 2017
<u>/s/ Amy Wendell</u> Amy Wendell	Director	October 4, 2017



October 4, 2017
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Ekso Bionics Holdings, Inc.
1414 Harbour Way South
Suite 1201
Richmond, California 94804

Re: Registration Statement on Form S-8

Ladies and Gentlemen:

We have acted as counsel to Ekso Bionics Holdings, Inc., a Nevada corporation (the "**Company**"), in connection with the preparation and filing of a Registration Statement on Form S-8 (as the same may be amended, the "**Registration Statement**"), filed by the Company under the Securities Act of 1933, as amended (the "**Securities Act**"), relating to up to 1,000,000 shares (the "**Shares**") of the Company's common stock, par value \$0.001 per share, that may be issued under the Company's Amended and Restated 2014 Equity Incentive Plan (the "**Plan**").

We have examined such documents and made such other investigation as we have deemed appropriate to render the opinions set forth below. As to matters of fact material to our opinions, we have relied, without independent verification, on certificates and other inquiries of officers of the Company. We have also relied on certificates of public officials.

Based upon and subject to the foregoing, we are of the opinion that the Shares have been duly authorized and, when issued, delivered, and paid for in accordance with the Plan, the Registration Statement and the related prospectus, will be validly issued, fully paid and nonassessable.

We express no opinion as to the laws of any other jurisdiction, other than the Federal laws of the United States of America, the internal laws of the Commonwealth of Massachusetts, and the general corporate law of the State of Nevada as set forth in Chapter 78 of the Nevada Revised Statutes.

This opinion letter shall be interpreted in accordance with the Legal Opinion Principles issued by the Committee on Legal Opinions of the American Bar Association's Business Law Section as published in 53 Bus. Law. 831 (May 1998).

We hereby consent to the filing of this opinion with the Securities and Exchange as an exhibit to the Registration Statement and to the use of our name therein and in the related prospectus under the caption "Legal Matters." In giving such consent, we do not hereby admit that we are in the category of persons whose consent is required under Section 7 of the Securities Act, or the rules and regulations of the Securities and Exchange.

* * *



October 4, 2017
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Very truly yours,

/s/ Nutter, McClennen & Fish, LLP

NUTTER, McCLENNEN & FISH, LLP

EMA/JED/MKK

Nutter McClennen & Fish LLP / 155 Seaport Blvd / Boston, MA 02210 / T: 617.439.2000 / nutter.com

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We consent to the incorporation by reference in this Registration Statement on Form S-8, pertaining to the Amended and Restated 2014 Equity Incentive Plan of Ekso Bionics Holdings, Inc., of our reports dated March 14, 2017 relating to the consolidated financial statements and effectiveness of internal control over financial reporting of Ekso Bionics Holdings, Inc. appearing in the Company's Annual Report on Form 10-K for the year ended December 31, 2016.

/s/ OUM & CO. LLP

San Francisco, California
October 2, 2017
