AEYE, INC.

Up to 25,000,000 Shares of Common Stock

This prospectus supplement (this "Supplement") supplements the prospectus dated August 21, 2024 (as may be supplemented from time to time, the "Prospectus"), which is part of a registration statement on Form S-1 (File No. 333-281235) relating to the offer and resale of up to 25,000,000 shares of common stock of AEye, Inc. (the "Common Stock") by New Circle Principal Investments LLC, a Delaware limited liability company (the "Selling Stockholder" or "New Circle"). The shares of Common Stock being offered by New Circle have been and may be issued pursuant to the share purchase agreement dated July 25, 2024 that we entered into with New Circle (the "Purchase Agreement"). The shares registered for resale also include 225,563 shares of Common Stock that we issued to New Circle as consideration for its commitment to purchase our Common Stock pursuant to the Purchase Agreement (the "Commitment Shares"). We are not selling any securities under the Prospectus and will not receive any of the proceeds from the sale of our Common Stock to New Circle that we may make under the Purchase Agreement from time to time after the date of the Prospectus. See the sections entitled "*The New Circle Transaction*" in the Prospectus for a description of the transaction contemplated by the Purchase Agreement and "*Selling Stockholder*" in the Prospectus for additional information regarding New Circle.

This Supplement is being filed to update and supplement the information in the Prospectus with the information contained in the Form 8-K filed with the Securities and Exchange Commission on September 13, 2024.

This Supplement is not complete without, and may not be delivered or utilized except in connection with, the Prospectus. This Supplement should be read in conjunction with the Prospectus, and if there is any inconsistency between the information in the Prospectus and this Supplement, you should rely on the information in this Supplement.

Our registration of the securities covered by this prospectus does not mean that New Circle will offer or sell any of the Common Stock. Subject to the terms of the Purchase Agreement, New Circle may sell the shares of our Common Stock included in the Prospectus in a number of different ways and at varying prices. We provide more information about how New Circle may sell the shares in the section in the Prospectus entitled "*Plan of Distribution*." New Circle is an "underwriter" within the meaning of Section 2(a)(11) of the Securities Act of 1933, as amended (the "Securities Act"). Any profits on the sales of our Common Stock by New Circle and any discounts, commissions or concessions received by New Circle may be deemed to be underwriting discounts and commissions under the Securities Act.

New Circle will pay all sales and brokerage commissions and similar expenses in connection with the offer and resale of the Common Stock by New Circle pursuant to the Prospectus. We will pay the expenses (except sales and brokerage commissions and similar expenses) incurred in registering under the Securities Act the offer and resale of the shares included in the Prospectus by New Circle, including legal and accounting fees. See "*Plan of Distribution*" in the Prospectus.

We are an "emerging growth company" as defined in Section 2(a) of the Securities Act, and are subject to reduced public company reporting requirements. The Prospectus complies with the requirements that apply to an issuer that is an emerging growth company.

Our Common Stock is listed on The Nasdaq Stock Market LLC ("Nasdaq") under the symbols "LIDR". On September 12, 2024, the closing price of our Common Stock was \$1.06 per share.

Our business and investment in our Common Stock involve significant risks. These risks are described in the section titled "*Risk Factors*" beginning on page 9 of the Prospectus.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or passed upon the accuracy or adequacy of the Prospectus. Any representation to the contrary is a criminal offense.

The date of this Supplement is September 13, 2024.

UNITED STATES SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

FORM 8-K

CURRENT REPORT

Pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934

Date of Report (Date of earliest event reported): September 12, 2024

AEYE, INC.

Delaware	001-39699	37-1827430
(State or other jurisdiction of incorporation)	(Commission File Number)	(IRS Employer Identification No.
4670 Willow Road, Suite 125, Pleasanton, California		94588
(Address of principal executive offices)		(Zip Code)
Registra	ant's telephone number, including area code: (925)	400-4366

Check the appropriate box below if the Form 8-K filing is intended to simultaneously satisfy the filing obligations of the registrant under any of the following provisions:

□ Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)

□ Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)

Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))

Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

Securities registered pursuant to Section 12(b) of the Act:

Title of each class	Trading Symbol(s)	Name of each exchange on which registered
Common Stock, par value \$0.0001 per share	LIDR	The Nasdaq Stock Market LLC
Warrants to receive one share of Common Stock	LIDRW	The Nasdaq Stock Market LLC

Indicate by check mark whether the registrant is an emerging growth company as defined in Rule 405 of the Securities Act of 1933 (§230.405 of this chapter) or Rule 12b-2 of the Securities Exchange Act of 1934 (§240.12b-2 of this chapter).

Emerging growth company \boxtimes

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 13(a) of the Exchange Act. \Box

Item 1.01. Entry into a Material Definitive Agreement.

On September 12, 2024, AEye, Inc. (the "<u>Company</u>") entered into an At Market Issuance Sales Agreement (the "<u>Sales Agreement</u>") with A.G.P./Alliance Global Partners ("<u>A.G.P.</u>"). In accordance with the terms of the Sales Agreement, the Company may offer and sell from time to time through A.G.P., acting as sales agent, the Company's common stock having an aggregate offering price of up to \$2,600,000 (the "<u>Placement Shares</u>"). The Placement Shares will be issued pursuant to the Company's shelf registration statement on Form S-3 (Registration No. 333-274546). The Company filed a prospectus supplement dated September 13, 2024, with the Securities and Exchange Commission in connection with the offer and sale of the Placement Shares.

The Company expects that any proceeds received from the facility will be used for working capital and general corporate purposes to support its future growth, including further go-to-market enhancements of the Apollo product and further penetration into the Chinese lidar market.

Under the terms and subject to the conditions of the Sales Agreement, the Company will set the parameters for the sale of shares, including the number or dollar amount of Placement Shares to be issued, the time period during which sales are requested to be made, any limitation on the number or dollar amount of Placement Shares that may be sold in any one Trading Day and any minimum price below which sales may not be made. Sales of Placement Shares, if any, will be made by any method permitted by law deemed to be an "at-the-market offering" as defined in Rule 415 promulgated under the Securities Act of 1933, as amended, including sales made directly on or through The Nasdaq Capital Market, the trading market for the Company's common stock, sales made to or through a market maker other than on an exchange or otherwise, in negotiated transactions at market prices, and/or any other method permitted by law. The Sales Agreement also contains customary representations and warranties and conditions to the sale of the Placement Shares pursuant thereto.

The Company will pay A.G.P. a cash commission rate up to 3.0% of the gross proceeds from the sale of Placement Shares sold pursuant to the Sales Agreement. The Company will also reimburse A.G.P. for certain specified expenses in connection with this offering, including reasonable out-of-pocket costs and expenses, including legal fees and related expenses, in an amount not to exceed (a) \$50,000 in connection with the execution and implementation of the Sales Agreement and (b) up to \$5,000 per calendar quarter thereafter pursuant to the terms of the Sales Agreement, not to exceed \$15,000 per fiscal year, in connection with any periodic due diligence review conducted by A.G.P. or its representatives in connection with the offering. In connection with the offering, WestPark Capital, Inc. ("WestPark") is acting as a financial advisor, for which the Company will pay WestPark advisory fees up to 1.0% of the gross proceeds from each sale of Placement Shares pursuant to the Sales Agreement.

The offering of the Placement Shares pursuant to the Sales Agreement will terminate upon the earliest of (i) the 36-month anniversary of the filing of the prospectus supplement registering the Placement Shares, (ii) the sale of all of the Placement Shares or (iii) termination of the Sales Agreement as provided therein. The Company and A.G.P. may each terminate the Sales Agreement at any time upon 30 days' prior notice.

The foregoing description of the Sales Agreement is qualified in its entirety by reference to the full text of the Sales Agreement, a copy of which is attached hereto as Exhibit 1.1, and is incorporated herein in its entirety by reference. The representations, warranties, and covenants contained in the Sales Agreement are made only for purposes of such agreement and as of the specific date, is solely for the benefit of the parties to such agreement and may be subject to limitations agreed upon by the contracting parties. The legal opinion relating to the Placement Shares is filed as Exhibit 5.1 hereto.

This Current Report on Form 8-K shall not constitute an offer to sell or a solicitation of an offer to buy any shares of common stock in any state or jurisdiction in which such an offer, solicitation, or sale would be unlawful prior to registration or qualification under the securities laws of any such state or other jurisdiction.

Item 9.01. Financial Statement and Exhibits.

(d) Exhibits.	
Exhibit Number	Description
1.1	At Market Issuance Sales Agreement by and between AEye, Inc. and A.G.P./Alliance Global Partners, dated September 12, 2024.
5.1	Opinion of Allen Overy Shearman Sterling US LLP.
23.1	Consent of Allen Overy Shearman Sterling US LLP (included in Exhibit 5.1)
104	Cover Page Interactive Data File (formatted as Inline XBRL and contained in Exhibit 101).

SIGNATURES

Pursuant to the requirements of the Securities Exchange Act of 1934, the Registrant has duly caused this report to be signed on its behalf by the undersigned hereunto duly authorized.

AEye, Inc.

Dated: September 13, 2024

By: /s/ Andrew S. Hughes

Andrew S. Hughes Senior Vice President, General Counsel & Corporate Secretary