UNITED STATES SECURITIES AND EXCHANGE COMMISSION

WASHINGTON, DC 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 6, 2024

YIELD10 BIOSCIENCE, INC.

(Exact name of registrant as specified in its charter)

Delaware	001-33133	04-3158289
(State or other jurisdiction of incorporation)	(Commission File Number)	(IRS Employer Identification No.)
19 Presidential Way, Woburn, Massachusetts		01801
(Address of principal executive offices)		(Zip Code)
Registrant's T	Gelephone Number, Including Area Code: (617) 583-1700
· ·	N/A	•
(Former Na	ame or Former Address, if Changed Since Las	t Report)
Check the appropriate box below if the Form 8-K filing following provisions:	is intended to simultaneously satisfy the filing	obligation of the registrant under any of the
☐ 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 Rul	e 14d-2(b) under the Exchange Act (17 CFR 2	240.14d-2(b))
Pre-commencement communications pursuant to Rul	e 13e-4(c) under the Exchange Act (17 CFR 2	40.13e-4(c))
Securities registered pursuant to Section 12(b) of the Ac	et:	
Title of each class	Trading Symbol(s)	Name of each exchange on which registered
None		
ndicate by check mark whether the registrant is an eme hapter) or Rule 12b-2 of the Securities Exchange Act of		of the Securities Act of 1933 (§230.405 of this
Emerging growth company		
f an emerging growth company, indicate by check mark r revised financial accounting standards provided pursu		ended transition period for complying with any new

Item 1.01 Entry into a Material Definitive Agreement and Item 2.03 - Creation of a Direct Financial Obligation or an Obligation under an Off-Balance Sheet Arrangement of a Registrant.

On September 5, 2024, Yield10 Bioscience, Inc. (the "Company") issued a promissory note (the "Note") in the principal amount of up to \$3 million, secured by all of the Company's assets, to Nuseed Nutritional US Inc. ("Nuseed"). The Company may request advances of up to \$1 million, up to a maximum outstanding principal amount of \$3 million, under the Note. The Company's initial draw under the Note was \$500,000. The Note bears interest at an interest rate of 7% per annum and will mature on December 31, 2024. Events of default under the Note include an agreement to sell all of the Company's assets to any buyer other than Nuseed, failure to make payments under the Note when due, filing of bankruptcy, and incurring any other secured indebtedness without Nuseed's consent. The interest rate under the Note would increase to 9% per annum during any period of default.

The Company and Nuseed continue to negotiate the proposed purchase by Nuseed of all of the Company's assets, pursuant to the Memorandum of Understanding described in the Company's Current Report on Form 8-K dated July 17, 2024.

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.

YIELD10 BIOSCIENCE, INC.

September 9, 2024 By: /s/ Oliver P. Peoples

Oliver P. Peoples

President & Chief Executive Officer