UNITED STATES SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

SCHEDULE 13G

Under the Securities Exchange Act of 1934 (Amendment No. 1)*

Achilles Therapeutics plc

(Name of Issuer)

American Depositary Shares and Ordinary Shares, nominal value £0.001 per share (Title of Class of Securities)

> 00449L102 ** (CUSIP Number)

December 31, 2023 (Date of Event which Requires Filing of this Statement)

Check the appropriate box to designate the rule pursuant to which this Schedule is filed:

 \Box Rule 13d-1(b)

 \Box Rule 13d-1(c)

 \boxtimes Rule 13d-1(d)

* The remainder of this cover page shall be filled out for a reporting person's initial filing on this form with respect to the subject class of securities, and for any subsequent amendment containing information which would alter the disclosures provided in a prior cover page.

The information required in the remainder of this cover page shall not be deemed to be "filed" for the purpose of Section 18 of the Securities Exchange Act of 1934 ("Act") or otherwise subject to the liabilities of that section of the Act but shall be subject to all other provisions of the Act (however, see the *Notes*).

** There is no CUSIP number assigned to the ordinary shares. CUSIP number 00449L102 has been assigned to the American Depositary Shares of the Issuer, which are quoted on the Nasdaq Global Select Market under the symbol "ACHL." Each American Depositary Share represents the right to receive one ordinary share.

coon	P NO. 004						
1	Names of Reporting Person:						
	Syncona Portfolio Limited						
2	Check the appropriate box if a member of a Group (see instructions) (a) □ (b) ⊠						
3	SEC U	lse (Dnly				
4	Citizenship or Place of Organization						
	Guern	sey					
		5	Sole Voting Power				
Nu	mber of		0				
	hares	6	Shared Voting Power				
	eficially ned by		11,086,909 (1)				
	Each porting	7	Sole Dispositive Power				
Р	erson		0				
	With:	8	Shared Dispositive Power				
			11,086,909 (1)				
9	9 Aggregate Amount Beneficially Owned by Each Reporting Person						
	11,086						
10							
11	Percent of class represented by amount in row (9)						
	27.2% (2)						
12	12 Type of Reporting Person (See Instructions)						
	СО						

(1) Consists of 11,086,909 American Depositary Shares ("ADSs") held directly by Syncona Portfolio Limited. Each ADS represents one ordinary share, nominal value £0.001 per share, of the Issuer. The ordinary shares and the ADSs are collectively referred to as the "Ordinary Shares". Based on 40,782,948 Ordinary Shares outstanding as of September 30, 2023 as reported in the Issuer's Form 6-K filed with the Securities and

(2) Exchange Commission (the "SEC") on November 13, 2023.

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	² INO. 00 ²						
1	Names of Reporting Person:						
	Syncor	oldings Limited					
2	Check the appropriate box if a member of a Group (see instructions) (a) □ (b) ⊠						
3	SEC U	lse C	Dnly				
4	Citizenship or Place of Organization						
	Guern	sey					
		5	Sole Voting Power				
Nur	nber of		0				
Sł	nares	6	Shared Voting Power				
	eficially ned by		11,086,909 (1)				
I	Each	7	Sole Dispositive Power				
	porting erson		0				
	With:	8	Shared Dispositive Power				
			11,086,909 (1)				
9	Aggreg	gate	Amount Beneficially Owned by Each Reporting Person				
	11,086	.909	$\mathcal{O}(1)$				
10							
11	11 Percent of class represented by amount in row (9)						
	27.2% (2)						
12							
	СО						
	0						

(1) Consists of 11,086,909 ADSs held directly by Syncona Portfolio Limited. Each ADS represents one ordinary share, nominal value £0.001 per share, of the Issuer.

(2) Based on 40,782,948 Ordinary Shares outstanding as of September 30, 2023 as reported in the Issuer's Form 6-K filed with the SEC on November 13, 2023.

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	NO. 004					
1	Names of Reporting Person:					
	Synco	na Ir	nvestment Management Limited			
2	Check the appropriate box if a member of a Group (see instructions) (a) □ (b) ⊠					
3	SEC U	lse (Dnly			
4	Citizenship or Place of Organization					
	United	Kir	gdom			
		5	Sole Voting Power			
Nur	nber of		0			
Sł	nares	6	Shared Voting Power			
	eficially ned by		11,086,909 (1)			
I	Each	7	Sole Dispositive Power			
	porting erson		0			
V	With:	8	Shared Dispositive Power			
			11,086,909 (1)			
9	Aggre	gate	Amount Beneficially Owned by Each Reporting Person			
	11,086,909 (1)					
10						
11	11 Percent of class represented by amount in row (9)					
	27.2% (2)					
12						
	СО					

(1) Consists of 11,086,909 ADSs held directly by Syncona Portfolio Limited. Each ADS represents one ordinary share, nominal value £0.001 per share, of the Issuer.

(2) Based on 40,782,948 Ordinary Shares outstanding as of September 30, 2023 as reported in the Issuer's Form 6-K filed with the SEC on November 13, 2023.

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	NO. 004						
1	Names of Reporting Person:						
	imited						
2							
3	SEC Use Only						
4	Citizer	nship	o or Place of Organization				
	Guern	sey					
		5	Sole Voting Power				
Nu	nber of		0				
SI	nares	6	Shared Voting Power				
	eficially ned by		11,086,909 (1)				
	Each porting	7	Sole Dispositive Power				
Р	erson		0				
V	With:	8	Shared Dispositive Power				
			11,086,909 (1)				
9							
	11,086,909 (1)						
10							
11	Percent of class represented by amount in row (9)						
	27.2% (2)						
12	12 Type of Reporting Person (See Instructions)						
	СО						

(1) Consists of 11,086,909 ADSs held directly by Syncona Portfolio Limited. Each ADS represents one ordinary share, nominal value £0.001 per share, of the Issuer.

(2) Based on 40,782,948 Ordinary Shares outstanding as of September 30, 2023 as reported in the Issuer's Form 6-K filed with the SEC on November 13, 2023.

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			102				
1	Names of Reporting Person:						
	Roel Bulthuis						
2	Check the appropriate box if a member of a Group (see instructions) (a) □ (b) ⊠						
3	SEC U	Jse C	Dnly				
4	Citizei	nship	o or Place of Organization				
	Nether	land	ls				
		5	Sole Voting Power				
Nur	nber of		0				
Sł	nares	6	Shared Voting Power				
	eficially		11.007.000.71				
	ned by Each	7	11,086,909 (1) Sole Dispositive Power				
	porting	'					
	erson		0				
	With:	8	Shared Dispositive Power				
			11,086,909 (1)				
9							
	11,086	5,909	$\mathcal{O}(1)$				
10							
11	1 Percent of class represented by amount in row (9)						
	27.2% (2)						
12							
	D.						
	IN						

(1) Consists of 11,086,909 ADSs held directly by Syncona Portfolio Limited. Each ADS represents one ordinary share, nominal value £0.001 per share, of the Issuer.

(2) Based on 40,782,948 Ordinary Shares outstanding as of September 30, 2023 as reported in the Issuer's Form 6-K filed with the SEC on November 13, 2023.

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			5102				
1	Names of Reporting Person:						
	Christopher Hollowood						
2							
3	SEC U	Jse C	Dnly				
4	Citizei	nship	o or Place of Organization				
	United	l Kir	ngdom				
		5	Sole Voting Power				
Nur	nber of		0				
Sh	nares	6	Shared Voting Power				
	eficially		11.097.000.71				
	ned by Each	7	11,086,909 (1) Sole Dispositive Power				
Rep	porting	,					
	erson		0				
	With:	8	Shared Dispositive Power				
			11,086,909 (1)				
9	Aggre	gate	Amount Beneficially Owned by Each Reporting Person				
	11,086	5,909	$\mathcal{O}(1)$				
10							
11	Percent of class represented by amount in row (9)						
	27.2% (2)						
12							
	IN						

(1) Consists of 11,086,909 ADSs held directly by Syncona Portfolio Limited. Each ADS represents one ordinary share, nominal value £0.001 per share, of the Issuer.

(2) Based on 40,782,948 Ordinary Shares outstanding as of September 30, 2023 as reported in the Issuer's Form 6-K filed with the SEC on November 13, 2023.

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Item 1.

- (a) Name of Issuer: Achilles Therapeutics plc
- (b) Address of Issuer's principal executive offices: 245 Hammersmith Road, London W6 8PW, United Kingdom

Item 2.

(a) Name of reporting persons filing:

- (i) Syncona Portfolio Limited;
- (ii) Syncona Holdings Limited;
- (iii) Syncona Investment Management Limited;
- (iv) Syncona Limited;
- (v) Roel Bulthuis; and
- (vi) Christopher Hollowood

(b) Address of principal business office or, if none, residence:

The address of the principal business office of Syncona Portfolio Limited, Syncona Holdings Limited and Syncona Limited is Frances House, PO Box 273, Sir William Place, St. Peter Port, Guernsey, GY1 3RD, Channel Islands. The address of the principal business office of Syncona Investment Management Limited, Roel Bulthuis and Christopher Hollowood is 2nd Floor, 8 Bloomsbury Street, London WC1B 3SR, United Kingdom.

(c) Citizenship:

Syncona Portfolio Limited, Syncona Holdings Limited and Syncona Limited's citizenship is Guernsey. Syncona Investment Management Limited and Christopher Hollowood's citizenship is United Kingdom. Roel Bulthuis' citizenship is the Netherlands.

(d) Title and class of securities:

Ordinary Shares, nominal value £0.001 per share, and American Depositary Shares ("ADS"). Each ADS represents one ordinary share, nominal value £0.001 per share, of the Issuer.

(e) CUSIP No.:

There is no CUSIP number assigned to the ordinary shares. CUSIP number 00449L102 has been assigned to the ADS, which are quoted on the Nasdaq Global Select Market under the symbol "ACHL."

Item 3. If this statement is filed pursuant to §§ 240.13d-1(b) or 240.13d-2(b) or (c), check whether the person filing is a:

Not applicable.

Item 4. Ownership:

The following information with respect to the ownership of Ordinary Shares of the Issuer by the Reporting Persons filing this statement on Schedule 13G/A is provided as of December 31, 2023:

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Reporting Persons	Ordinary Shares Held Directly (1)	Sole Power to Vote or Direct the Vote (1)	Shared Power to Vote or Direct the Vote (1)	Sole Power to Dispose or Direct the Disposition (1)	Shared Power to Dispose or Direct the Disposition (1)	Amount Beneficially Owned (1)	Percentage of Class (2)
Syncona Portfolio Limited	11,086,909	0	11,086,909	0	11,086,909	11,086,909	27.2%
Syncona Holdings Limited	0	0	11,086,909	0	11,086,909	11,086,909	27.2%
Syncona Investment Management Limited	0	0	11,086,909	0	11,086,909	11,086,909	27.2%
Syncona Limited	0	0	11,086,909	0	11,086,909	11,086,909	27.2%
Roel Bulthuis	0	0	11,086,909	0	11,086,909	11,086,909	27.2%
Christopher Hollowood	0	0	11,086,909	0	11,086,909	11,086,909	27.2%

(1) Consists of 11,086,909 ADSs held directly by Syncona Portfolio Limited. Each ADS represents one ordinary share, nominal value £0.001 per share, of the Issuer. The ordinary shares and the ADS are collectively referred to as the "Ordinary Shares".

(2) The percentage of outstanding Ordinary Shares of the Issuer beneficially owned was calculated based on 40,782,948 Ordinary Shares outstanding as of September 30, 2023 as reported in the Issuer's Form 6-K filed with the Securities and Exchange Commission on November 13, 2023.

The shares are owned directly by Syncona Portfolio Limited ("Syncona Portfolio") and indirectly by Syncona Holdings Limited ("Syncona Holdings"), Syncona Limited ("Syncona Limited"), Roel Bulthuis and Christopher Hollowood. Syncona Portfolio is a wholly owned subsidiary of Syncona Holdings, and Syncona Holdings is a wholly controlled subsidiary of Syncona Limited, a publicly-listed company. Investment and voting decisions with respect to these shares are made by Syncona Portfolio, acting upon the recommendation of Roel Bulthuis and Christopher Hollowood, who comprise the investment committee of Syncona Investment Management Limited, also a subsidiary of Syncona Holdings. On November 16, 2023, Roel Bulthuis replaced Martin Murphy on the investment committee of Syncona Investment Management Limited. Each of these entities disclaims beneficial ownership except to the extent of its pecuniary interest therein, if any.

Item 5. Ownership of Five Percent or Less of a Class.

If this statement is being filed to report the fact that as of the date hereof the reporting person has ceased to be the beneficial owner of more than five percent of the class of securities, check the following \Box .

Item 6. Ownership of more than Five Percent on Behalf of Another Person.

Not applicable.

Item 7. Identification and classification of the subsidiary which acquired the security being reported on by the parent holding company or control person.

Not applicable.

Item 8. Identification and classification of members of the group.

Not applicable.

Item 9. Notice of Dissolution of Group.

Not applicable.

Item 10. Certifications.

Not applicable.

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After reasonable inquiry and to the best of my knowledge and belief, I certify that the information set forth in this statement is true, complete and correct.

Dated: February 13, 2024

SYNCONA PORTFOLIO LIMITED

By:/s/ Robert HutchinsonName:Robert HutchinsonTitle:Director

SYNCONA HOLDINGS LIMITED

By:/s/ Robert HutchinsonName:Robert HutchinsonTitle:Director

SYNCONA INVESTMENT MANAGEMENT LIMITED

By: /s/ Christopher Hollowood Name: Christopher Hollowood Title: CEO

SYNCONA LIMITED

By:/s/ Robert HutchinsonName:Robert HutchinsonTitle:Director

/s/ Roel Bulthuis Roel Bulthuis

/s/ Christopher Hollowood Christopher Hollowood

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Exhibit(s):

Exhibit 99.1: Joint Filing Statement

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AGREEMENT

In accordance with Rule 13d-1(k) under the Securities Exchange Act of 1934, as amended, the persons named below agree to the joint filing on behalf of each of them of a statement on Schedule 13G (including amendments thereto) with respect to the Ordinary Shares (represented by ADS, each of which represents one Ordinary Share) of Achilles Therapeutics plc and further agree that this Joint Filing Agreement be included as an Exhibit to such joint filings. It is understood and agreed that the joint filing of the Schedule 13G shall not be construed as an admission that the persons named herein constitute a group for purposes of Regulation 13D-G of the Securities Exchange Act of 1934, as amended.

Dated: February 13, 2024

SYNCONA PORTFOLIO LIMITED

By:	/s/ Robert Hutchinson
Name:	Robert Hutchinson
Title:	Director

SYNCONA HOLDINGS LIMITED

By:/s/ Robert HutchinsonName:Robert HutchinsonTitle:Director

SYNCONA INVESTMENT MANAGEMENT LIMITED

By:/s/ Christopher HollowoodName:Christopher HollowoodTitle:CEO

SYNCONA LIMITED

By: /s/ Robert Hutchinson Name: Robert Hutchinson Title: Director /s/ Roel Bulthuis

Roel Bulthuis

/s/ Christopher Hollowood Christopher Hollowood

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