# UNITED STATES SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

# **SCHEDULE 13G**

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

# **TSCAN THERAPEUTICS, INC.**

(Name of Issuer)

Voting Common Stock, \$0.0001 par value per share (Title of Class of Securities)

> 89854M101 (CUSIP Number)

**December 31, 2021** (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)

⊠ 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 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).

CUSIF	CUSIP No. 89854M101						
1.	NAMES OF REPORTING PERSONS						
	Longwood Fund IV GP, LLC						
2.	2. CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP (see instructions)						
3.	SEC USE ONLY						
4.	CITIZENSI	R PLACE OF ORGANIZATION					
	Delaware						
		5.	SOLE VOTING POWER				
N	UMBER OF		0				
	SHARES NEFICIALLY	6.	SHARED VOTING POWER				
	WNED BY		1,278,838 (1)				
R	EACH EPORTING	7.	SOLE DISPOSITIVE POWER				
	PERSON WITH	0					
	****	8.	SHARED DISPOSITIVE POWER				
9.	ACCDECA		1,278,838 (1) MOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON				
9.			WOUNT DENEFICIALLY OWNED BY EACH REPORTING PERSON				
10.	1,278,838 (1) CHECK IF THE AGGREGATE AMOUNT IN ROW (9) EXCLUDES CERTAIN SHARES (see instructions)						
10.							
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (9)						
12.	6.9% (2) TYPE OF REPORTING PERSON (see instructions)						
	00						
	00						

(1) All such shares are held of record by Longwood IV (as defined in Item 2(a) below). Longwood IV GP (as defined in Item 2(a) below) is the general partner of Longwood IV. Voting and dispositive decisions at Longwood IV GP with respect to the shares held by Longwood IV are made by an investment committee comprised of Dr. Westphal (as defined in Item 2(a) below), Richard Aldrich and John Lawrence (the "Investment Committee").

(2) Based on 18,624,902 shares of the Issuer's Voting Common Stock outstanding as of November 5, 2021, as reported by the Issuer in its Form 10-Q for the quarter ended September 30, 2021, filed with the Securities and Exchange Commission on November 10, 2021 (the "Form 10-Q").

CUSIP	CUSIP No. 89854M101						
1.	NAMES OF REPORTING PERSONS						
	Longwood Fund IV, L.P.						
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP (see instructions)						
	(a) □ (b) ⊠						
3.	SEC USE ONLY						
4.	CITIZENS						
	Delaware						
		5.	SOLE VOTING POWER				
	UMBER OF	6					
	SHARES NEFICIALLY	6.	SHARED VOTING POWER				
0	WNED BY	7.	1,278,838 (1) SOLE DISPOSITIVE POWER				
	EACH REPORTING		SOLE DISPOSITIVE POWER				
	PERSON WITH	8.	0 SHARED DISPOSITIVE POWER				
		8.	SHARED DISPOSITIVE POWER				
			1,278,838 (1)				
9.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON						
	1,278,838 (2						
10.	CHECK IF	THE	AGGREGATE AMOUNT IN ROW (9) EXCLUDES CERTAIN SHARES (see instructions)				
11.	PERCENT	OF C	LASS REPRESENTED BY AMOUNT IN ROW (9)				
	6.9% (2)						
12.	TYPE OF REPORTING PERSON (see instructions)						
	PN						

All such shares are held of record by Longwood IV. Longwood IV GP is the general partner of Longwood IV. Voting and dispositive decisions at Longwood IV GP with respect to the shares held by Longwood IV are made by the Investment Committee. Based on 18,624,902 shares of the Issuer's Voting Common Stock outstanding as of November 5, 2021, as reported by the Issuer in the Form 10-(1)

(2) Q.

CUSIP	CUSIP No. 89854M101						
1.	NAMES OF REPORTING PERSONS						
	Christoph H. Westphal						
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP (see instructions)						
3.	SEC USE ONLY						
4.	4. CITIZENSHIP OR PLACE OF ORGANIZATION						
	Delaware						
		5.	SOLE VOTING POWER				
	JMBER OF	6.	1,036,585 (1) SHARED VOTING POWER				
	SHARES BENEFICIALLY						
0	OWNED BY EACH		1,278,838 (2) SOLE DISPOSITIVE POWER				
	REPORTING PERSON WITH						
			1,036,585 (1) SHARED DISPOSITIVE POWER				
			1,278,838 (2)				
9.	AGGREGA	te a	MOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON				
	2,315,423 (1)(2)						
10.	CHECK IF THE AGGREGATE AMOUNT IN ROW (9) EXCLUDES CERTAIN SHARES (see instructions)						
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (9)						
10	12.4% (3)						
12.	TYPE OF REPORTING PERSON (see instructions)						
	IN						

(1) Represents 914,634 shares held of record by Dr. Westphal and 121,951 shares held of record by Dr. Westphal's spouse.

All such shares are held of record by Longwood IV. Longwood IV GP is the general partner of Longwood IV. Voting and dispositive decisions at Longwood IV GP with respect to the shares held by Longwood IV are made by the Investment Committee. Based on 18,624,902 shares of the Issuer's Voting Common Stock outstanding as of November 5, 2021, as reported by the Issuer in the Form 10-(2)

(3) Q.

#### Item 1(a). Name of Issuer:

TScan Therapeutics, Inc. (the "Issuer")

#### Item 1(b). Address of Issuer's Principal Executive Offices:

830 Winter Street Waltham, MA 02451

#### Item 2(a). Name of Person Filing:

This joint statement on Schedule 13G is being filed by Longwood Fund IV, L.P. ("Longwood IV"), Longwood Fund IV GP, LLC ("Longwood IV GP") and Christoph H. Westphal ("Dr. Westphal" and together with Longwood IV and Longwood IV GP, the "Reporting Persons").

### Item 2(b) Address of Principal Business Office, or if None, Residence:

The address of the principal business office of each Reporting Person is 800 Boylston Street, Suite 1555, Boston, MA 02199.

#### Item 2(c). Citizenship:

Longwood IV GP is a limited liability company organized under the laws of the State of Delaware. Longwood IV is a limited partnership organized under the laws of the State of Delaware. Dr. Westphal is a citizen of the United States of America.

## Item 2(d). Title of Class of Securities:

Voting Common Stock, \$0.0001 par value per share ("Voting Common Stock").

#### Item 2(e). CUSIP Number:

89854M101

# 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.

#### (a) Amount beneficially owned:

See Row 9 of the cover page for each Reporting Person. Longwood IV is the record owner of 1,278,838 shares of Voting Common Stock (the "Longwood Shares"). As the general partner of Longwood IV, Longwood IV GP may be deemed to beneficially own the Longwood Shares. Dr. Westphal is the record owner of 914,634 shares of Voting Common Stock and his spouse is the record owner of 121,951 shares of Voting Common Stock.

#### (b) Percent of class:

See Row 11 of the cover page for each Reporting Person and the corresponding footnotes.\*

- (c) Number of shares as to which the person has:
  - (i) Sole power to vote or to direct the vote

See Row 5 of the cover page for each Reporting Person and the corresponding footnotes.\*

(ii) Shared power to vote or to direct the vote

See Row 6 of the cover page for each Reporting Person and the corresponding footnotes.\*

(iii) Sole power to dispose or to direct the disposition of

See Row 7 of the cover page for each Reporting Person and the corresponding footnotes.\*

(iv) Shared power to dispose or to direct the disposition of

See Row 8 of the cover page for each Reporting Person and the corresponding footnotes.\*

\* Except to the extent of its pecuniary interest therein, each Reporting Person disclaims beneficial ownership of such shares of Voting Common Stock, except for the shares, if any, such Reporting Person holds of record.

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

Not applicable.

#### Item 6. Ownership of More Than Five Percent on Behalf of Another Person.

Under certain circumstances set forth in the limited partnership agreement of Longwood IV and the limited liability company agreement of Longwood IV GP, the general and limited partners or members, as the case may be, of each of such entities may be deemed to have the right to receive dividends from, or the proceeds from, the sale of securities of the Issuer owned by each such entity of which they are a partner or member, as the case may be.

# 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 the Group.

Not applicable.

#### Item 10. Certifications.

By signing below I certify that, to the best of my knowledge and belief, the securities referred to above were not acquired and are not held for the purpose of or with the effect of changing or influencing the control of the issuer of the securities and were not acquired and are not held in connection with or as a participant in any transaction having that purpose or effect, other than activities solely in connection with a nomination under §240.14a-11.

Material to be Filed as Exhibits.

E

Exhibit 1 – Joint Filing Agreement.

## SIGNATURE

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 10, 2022

### LONGWOOD FUND IV, L.P.

By: Longwood Fund IV GP, LLC Its: General Partner

By: /s/ Robert Hadfield Robert Hadfield Its: General Counsel

# LONGWOOD FUND IV GP, LLC

By: /s/ Robert Hadfield Robert Hadfield

Its: General Counsel

/s/ Christoph H. Westphal Christoph H. Westphal

#### JOINT FILING AGREEMENT

The undersigned hereby agree that the foregoing statement on Schedule 13G is filed on behalf of each of the undersigned, and any amendments thereto executed by the undersigned shall be filed on behalf of each of the undersigned without the necessity of filing any additional joint filing agreement. The undersigned acknowledge that each is responsible for the timely filing of such statement on Schedule 13G and any amendments thereto, and for the completeness and accuracy of the information concerning him, her or it contained therein, but shall not be responsible for the completeness or accuracy of the information concerning the others of the undersigned, except to the extent that he, she or it knows or has reason to believe that such information is inaccurate or incomplete. This Joint Filing Agreement may be executed in any number of counterparts, all of which taken together shall constitute one and the same instrument.

Dated: February 10, 2022

LONGWOOD FUND IV, L.P.

By: Longwood Fund IV GP, LLC Its: General Partner

By: /s/ Robert Hadfield Robert Hadfield

Its: General Counsel

LONGWOOD FUND IV GP, LLC

By: /s/ Robert Hadfield

Robert Hadfield Its: General Counsel

/s/ Christoph H. Westphal

Christoph H. Westphal