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): May 5, 2015

HORIZON TECHNOLOGY FINANCE CORPORATION

(Exact name of registrant as specified in its charter)

Delaware (State or other jurisdiction of incorporation)

814-00802 (Commission File Number) 27-2114934 (I.R.S. Employer Identification No.)

312 Farmington Avenue

Farmington, CT 06032

(Address of principal executive offices and zip code)

Registrant's telephone number, including area code: (860) 676-8654

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

Written communications pursuant to Pule 425 under the Securities Act (17 CEP 230 425)

Ц	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))

Section 2 Financial Information

Item 2.02 Results of Operations and Financial Condition

On May 5, 2015, Horizon Technology Finance Corporation (the "Company") issued a press release announcing its financial results for the three months ended March 31, 2015. A copy of this press release is attached hereto as Exhibit 99.1.

The information in Item 2.02 of this Current Report on Form 8-K, including Exhibit 99.1 furnished herewith, is being furnished and shall not be deemed "filed" for any purpose of Section 18 of the Securities Exchange Act of 1934, as amended (the "Exchange Act"), or otherwise subject to liabilities of such Section. The information in this Current Report on Form 8-K shall not be deemed to be incorporated by reference into any filing under the Securities Act of 1933, as amended, or the Exchange Act, except as shall be expressly set forth by specific reference in such filing.

Section 9 Financial Statements and Exhibits Item 9.01 Financial Statements and Exhibits

(d) Exhibits.

99.1 Press release of the Company dated May 5, 2015.

SIGNATURE

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.

Date: May 5, 2015 HORIZON TECHNOLOGY FINANCE CORPORATION

By: /s/ Robert D. Pomeroy, Jr. Robert D. Pomeroy, Jr. Chief Executive Officer



Horizon Technology Finance Announces First Quarter 2015 Financial Results

Maintains Strong Credit Quality; Enhances Liquidity and Pipeline to Grow Portfolio

FARMINGTON, Conn., May 5, 2015 – Horizon Technology Finance Corporation (NASDAQ: HRZN) (the "Company" or "Horizon"), a leading specialty finance company that provides capital in the form of secured loans to venture capital backed companies in the technology, life science, healthcare information and services and cleantech industries, today announced its financial results for the first quarter ended March 31, 2015.

First Ouarter 2015 Highlights

- Earned net investment income of \$2.9 million, or \$0.30 per share
- Achieved an annualized portfolio yield of 15.0% for the quarter
- Increased net assets from operations by \$3.8 million, or \$0.39 per share
- Net asset value equaled \$165.0 million, or \$14.19 per share, as of March 31, 2015
- Experienced liquidity events from four portfolio companies
- Investment portfolio, at fair value, was \$204.3 million as of March 31, 2015
- Total liquidity as of March 31, 2015 was \$70.2 million
- Asset coverage for borrowed amounts of 322% as of March 31, 2015
- Funded \$23.9 million in loans to nine companies
- 74% of the outstanding principal amount of the loan portfolio bore interest at floating rates as of March 31, 2015
- Increased liquidity by completing a public offering of 2,000,000 shares of common stock with net proceeds of \$26.7 million
- Declared distributions of \$0.115 per share payable in each of July, August and September 2015, increasing cumulative declared distributions to \$6.995 per share since going public in October 2010

"During the first quarter, we successfully deployed capital from portfolio liquidity events and achieved solid origination activity in a historically slow period," said Robert D. Pomeroy, Jr., Chairman and Chief Executive Officer of Horizon. "We continued to capitalize on the robust demand for our venture debt products and funded nine portfolio companies with attractive and consistent on-boarding yields."

Mr. Pomeroy continued, "In the first quarter, the credit quality of our portfolio remained strong and we took important steps to enhance our liquidity and financial flexibility. Our recent equity offering has positioned the Company to take advantage of its strong pipeline and achieve quality portfolio growth. We also continue to provide shareholders with a stable distribution and added upside from our growing and maturing warrant portfolio."

Operating Results

Total investment income was \$7.3 million for the three months ended March 31, 2015, as compared to \$7.5 million for the three months ended March 31, 2014. The year-over-year decrease in total investment income is due to a decrease in average investments.

The Company's dollar-weighted annualized portfolio yield on average loans for the three months ended March 31, 2015 and 2014 was 15.0% and 13.6%, respectively.

Total net expenses for the three months ended March 31, 2015 decreased to \$4.3 million, as compared to \$5.0 million for the three months ended March 31, 2014. Interest expense decreased year-over-year primarily due to a decrease in average borrowings. Base management fee expense decreased year-over-year primarily due to a decrease in average gross assets.

Net investment income for the three months ended March 31, 2015 was \$2.9 million, or \$0.30 per share, as compared to \$2.5 million, or \$0.26 per share, for the three months ended March 31, 2014.

For the three months ended March 31, 2015, the net realized loss on investments was \$0.2 million, or \$0.02 per share, as compared to \$5.9 million, or \$0.61 per share, for the three months ended March 31, 2014.

For the three months ended March 31, 2015, the net unrealized appreciation on investments was \$1.1 million, or \$0.11 per share, as compared to \$8.5 million, or \$0.88 per share, for the three months ended March 31, 2014.

Portfolio Summary and Investment Activity

As of March 31, 2015, the Company's debt portfolio consisted of 50 secured loans with an aggregate fair value of \$197.6 million. In addition, the Company's total warrant and equity investments in 82 portfolio companies had an aggregate fair value of \$6.4 million as of March 31, 2015. Total portfolio investment activity as of and for the three months ended March 31, 2015 and 2014 was as follows:

(\$ in thousands)	For the Three Months Ended March 31,				
		2015	2014		
Beginning portfolio	\$	205,101	221,284		
New debt investments		23,933	17,926		
Principal received on investments		(7,754)	(11,773)		
Early pay-offs		(18,036)	_		
Accretion of debt investment fees		340	406		
New debt investment fees		(186)	(180)		
Sales of investments		_	(720)		
Net realized loss on investments		(230)	(6,913)		
Net unrealized appreciation on investments		1,132	8,530		
Ending portfolio	\$	204,300 \$	3 228,560		

Net Asset Value

At March 31, 2015, the Company's net assets were \$165.0 million, or \$14.19 per share, as compared to \$137.8 million, or \$14.32 per share, as of March 31, 2014, and \$138.2 million, or \$14.36 per share, as of December 31, 2014.

For the three months ended March 31, 2015 and 2014, the net increase in net assets resulting from operations was \$3.8 million, or \$0.39 per share, and \$5.1 million, or \$0.53 per share, respectively.

Portfolio Asset Quality

The following table shows the classification of Horizon's loan portfolio at fair value by internal credit rating as of March 31, 2015 and December 31, 2014:

(\$ in thousands)	March 31, 2015 Debt Investment			December 31, 2014				
				Debt				
				Investment				
	Number of Investments		at Fair Value	Percentage of Debt Investment	Number of Investments		at Fair Value	Percentage of Debt Investment
Credit Rating	investments		value	Investment	investments	_	varue	Investment
4	9	\$	50,672	25.6%	9	\$	44,082	22.1%
3	36		126,076	63.8	36		138,109	69.4
2	3		15,815	8.0	3		11,746	5.9
1	2		5,047	2.6	2		5,243	2.6
Total	50	\$	197,610	100.0%	50	\$	199,180	100.0%

As of March 31, 2015 and December 31, 2014, Horizon's loan portfolio had a weighted average credit rating of 3.1, with 4 being the highest credit quality rating and 3 being the rating for a standard level of risk. A rating of 2 represents an increased level of risk and, while no loss is currently anticipated for a 2-rated loan, there is potential for future loss of principal. A rating of 1 represents a deteriorating credit quality and increased risk.

Liquidity Events

Horizon experienced liquidity events from four portfolio companies in the quarter ended March 31, 2015. Liquidity events for Horizon may consist of the sale of warrants or equity in portfolio companies, loan prepayments, sale of owned assets or receipt of success fees.

In January, Radisphere National Radiology Group, Inc., now known as Candescent Health, Inc., prepaid the outstanding principal balance of \$9.1 million on its venture loan, plus interest, end-of-term payment ("ETP") and prepayment fee. Horizon continues to hold warrants in this company.

In February, Courion Corporation prepaid the outstanding principal balance of \$2.1 million on its venture loan, plus interest and prepayment fee.

In February, Inotek Pharmaceuticals Corporation ("Inotek") prepaid the outstanding principal balance of \$2.7 million on its venture loan, plus interest, ETP and prepayment fee. Horizon continues to hold warrants in Inotek.

In March, Kaminario, Inc. ("Kaminario") prepaid the outstanding principal balance of \$4.2 million on its venture loan, plus interest, ETP and prepayment fee. Horizon continues to hold warrants in Kaminario.

Liquidity and Capital Resources

As of March 31, 2015, the Company had \$70.2 million in available liquidity, including cash and investments in money market funds totaling \$30.2 million and \$40.0 million in funds available under existing credit facility commitments.

As of March 31, 2015, there was \$10 million outstanding under the Company's \$50 million revolving credit facility which contains an accordion feature allowing for an increase in the total loan commitment up to an aggregate commitment of \$150 million. As of March 31, 2015, 86.5% of the Company's total borrowings outstanding were at a fixed interest rate, with 42.2% of the Company's total borrowings outstanding fixed at an interest rate of 3.0%.

On March 24, 2015, Horizon increased its liquidity and improved its overall capitalization by completing a follow-on public equity offering of its common stock. Upon completion of the offering, the Company issued 2,000,000 shares of common stock at a public offering price of \$13.95 per share. Net proceeds to Horizon from the offering, after deducting underwriting discounts and offering expenses payable by Horizon, were approximately \$26.7 million.

As of March 31, 2015, the Company's debt to equity leverage ratio was 49%, and the asset coverage ratio for borrowed amounts was 322%.

Monthly Distributions Declared in Second Quarter 2015

On May 1, 2015, the Company's board of directors declared monthly distributions of \$0.115 per share payable in each of July, August and September 2015. The following table shows these monthly distributions, which total \$0.345 per share:

			Amount Per
Record Date	Payment Date		Share
June 18, 2015	July 15, 2015	\$	0.115
July 20, 2015	August 14, 2015	\$	0.115
August 19, 2015	September 15, 2015	\$	0.115
		Total: \$	0.345

After paying first quarter distributions of \$0.345 per share and earning \$0.30 per share for the first quarter, the Company's undistributed spillover income, as of March 31, 2015, was \$0.31 per share. Spillover income includes any ordinary income and net capital gains from the preceding years that were not distributed during such years.

When declaring distributions, the Company's board of directors reviews estimates of taxable income available for distribution, which may differ from consolidated net income under generally accepted accounting principles due to (i) changes in unrealized appreciation and depreciation, (ii) temporary and permanent differences in income and expense recognition and (iii) the amount of spillover income carried over from a given year for distribution in the following year. The final determination of taxable income for each tax year, as well as the tax attributes for dividends in such tax year, will be made after the close of the tax year.

Recent Events

The Company holds warrant positions in two portfolio companies that have filed registration statements in connection with their potential initial public offerings ("IPO"):

- eASIC Corporation filed a Registration Statement on Form S-1 on February 19, 2015; and
- A portfolio company confidentially submitted a Draft Registration Statement on Form S-1 under the JOBS Act.

There can be no assurances that these companies will complete their IPOs in a timely manner or at all.

On February 23, 2015, Inotek (NASDAQ: ITEK), a portfolio company, completed its IPO.

Conference Call

The Company will host a conference call on Wednesday, May 6, 2015 at 9:00 a.m. ET to discuss its latest corporate developments and financial results. The dial-in number for callers in the U.S. is (877) 677-9112, and the dial-in number for international callers is (708) 290-1396. The access code for all callers is 26839624.

A live webcast will be available on the Company's website at www.horizontechnologyfinancecorp.com.

A replay of the call will be available through May 8, 2015. To access the replay, please dial (855) 859-2056 in the United States and (404) 537-3406 outside the United States, and then enter the access code 26839624. An online archive of the webcast will be available on the Company's website for 30 days following the call.

About Horizon Technology Finance

Horizon Technology Finance Corporation is a leading specialty finance company that provides capital in the form of secured loans to companies backed by venture capital firms within the technology, life science, healthcare information and services and cleantech industries. The investment objective of Horizon is to maximize total returns by generating current income from a portfolio of directly originated secured loans as well as capital appreciation from warrants that it receives when making such loans. Headquartered in Farmington, Connecticut, Horizon has regional offices in Walnut Creek, California and Reston, Virginia. Horizon's common stock trades on the NASDAQ Global Select Market under the ticker symbol "HRZN". To learn more, please visit www.horizontechnologyfinancecorp.com.

Forward-Looking Statements

Statements included herein may constitute "forward-looking statements" within the meaning of the Private Securities Litigation Reform Act of 1995. Statements other than statements of historical facts included in this press release may constitute forward-looking statements and are not guarantees of future performance, condition or results and involve a number of risks and uncertainties. Actual results may differ materially from those in the forward-looking statements as a result of a number of factors, including those described from time to time in our filings with the Securities and Exchange Commission. Horizon undertakes no duty to update any forward-looking statement made herein. All forward-looking statements speak only as of the date of this press release.

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Horizon Technology Finance Corporation and Subsidiaries

Consolidated Statements of Assets and Liabilities (In thousands, except share and per share data)

]	March 31, 2015	December 31, 2014		
Assets					
Non-affiliate investments at fair value (cost of \$207,905 and \$209,838, respectively)	\$	204,300	\$	205,101	
Investment in money market funds		399		27	
Cash		29,828		8,417	
Restricted investments in money market funds		2,351		2,906	
Interest receivable		5,057		4,758	
Other assets		3,497		3,987	
Total assets	\$	245,432	\$	225,196	
Liabilities					
Borrowings	\$	74,342	\$	81,753	
Distribution payable		3,783		3,322	
Base management fee payable		354		356	
Incentive fee payable		736		799	
Other accrued expenses		1,204		718	
Total liabilities		80,419		86,948	
Net assets					
Preferred stock, par value \$0.001 per share, 1,000,000 shares authorized, zero shares issued and					
outstanding as of March 31, 2015 and December 31, 2014		_		_	
Common stock, par value \$0.001 per share, 100,000,000 shares authorized, 11,630,617 and 9,628,124					
shares outstanding as of March 31, 2015 and December 31, 2014, respectively		12		10	
Paid-in capital in excess of par		180,970		155,240	
Distributions in excess of net investment income		(1,049)		(1,102)	
Net unrealized depreciation on investments		(3,605)		(4,737)	
Net realized loss on investments		(11,315)		(11,163)	
Total net assets		165,013		138,248	
Total liabilities and net assets	\$	245,432	\$	225,196	
Net asset value per common share	\$	14.19	\$	14.36	

Horizon Technology Finance Corporation and Subsidiaries

Consolidated Statements of Operations (In thousands, except share and per share data)

For the Three Months Ended

	March 31,					
	2015			2014		
Investment income						
Interest income on non-affiliate investments	\$	6,562	\$	7,180		
Prepayment fee income on non-affiliate investments		520		_		
Fee income on non-affiliate investments		184		354		
Total investment income		7,266		7,534		
Expenses						
Interest expense		1,587		2,070		
Base management fee		1,031		1,312		
Performance based incentive fee		736		513		
Administrative fee		268		244		
Professional fees		431		835		
General and administrative		260		250		
Total expenses		4,313		5,224		
Management and performance based incentive fees waived				(214)		
Net expenses		4,313		5,010		
Net investment income before excise tax		2,953		2,524		
Provision for excise tax		(10)		(40)		
Net investment income		2,943		2,484		
Net realized and unrealized (loss) gain on investments						
Net realized loss on investments		(230)		(5,884)		
Net unrealized appreciation on investments		1,132		8,530		
Net realized and unrealized gain on investments		902		2,646		
Net increase in net assets resulting from operations	\$	3,845	\$	5,130		
Net investment income per common share	\$	0.30	\$	0.26		
Net increase in net assets per common share	\$	0.39	\$	0.53		
Distributions declared per share	\$	0.345	\$	0.345		
Weighted average shares outstanding		9,807,198		9,613,829		