

## Currency Exchange Fund N.V. (The)

**Primary Credit Analyst:**

Stanislas De Bazelaire, Paris +33 1 44 20 66 54; stanislas.bazelaire@spglobal.com

**Secondary Contact:**

Philippe Raposo, Paris (33) 1-4420-7377; philippe.raposo@spglobal.com

**Table Of Contents**

---

Major Rating Factors

Rationale

Outlook

Business Profile

Ownership Structure And Legal Status

Performance

Risk Management

Capital Position

Assessment As A Government Related Entity (GRE)

Related Criteria

Related Research

# Currency Exchange Fund N.V. (The)

## Major Rating Factors

### Strengths:

- High likelihood of extraordinary support from 'AAA' rated main shareholders.
- Large enough capital buffer to support growth and potential unexpected losses.
- Comfortable liquidity.

### Counterparty Credit Rating

A-/Stable/A-2

### Weaknesses:

- Volatility in financial performance inherent in its business model.
- Concentrated business focus, centered around unhedgeable long positions in volatile frontier and emerging market currencies.
- Capital is redeemable, though only within certain limits.

## Rationale

The ratings on The Currency Exchange Fund N.V. (TCX) reflect S&P Global Ratings' view of the fund's 'bbb-' stand-alone credit profile (SACP) and a high likelihood of extraordinary support for TCX by its shareholders in the event of financial distress. We reflect the latter by adding three notches of support to the SACP under our approach for rating government-related entities (GREs).

Our 'bbb-' SACP balances our view of TCX's comfortable capitalization, ample liquidity, and robust risk management approach against its market risk exposure to illiquid currencies and related earnings volatility.

Our view of a high likelihood of extraordinary support is based on our assessment of TCX's important role for, and very strong links with, its dominant owners and their related governments, which include Nederlandse Financierings-Maatschappij voor Ontwikkelingslanden N.V. (FMO; AAA/Stable/A-1+) and the government of the Netherlands (AAA/Stable/A-1+), KfW (AAA/Stable/A-1+) and the government of the Federal Republic of Germany (AAA/Stable/A-1+), and the European Bank for Reconstruction and Development (EBRD; AAA/Stable/A-1+).

2017 will have marked the revival of the fund's growth after two years of slower gross production. We expect TCX to grow at a steady pace over the next 18 months. Such a dynamic comforts our view about the fund's relevance and importance for national development banks and multilateral financial institutions globally.

TCX is on-track to record profits for the second year in a row (\$132 million cumulatively from January 2016 to September 2017), nearly recouping the losses made in 2014-2015 (\$154 million). In our view, this illustrates the sustainability of the fund's business model, meaning its ability to generate profits under more stable market circumstances.

The political context for the development of TCX's activities is currently favorable, in our view. In 2017, G20 finance ministers agreed on a Compact with Africa, which aims to promote private investment in African countries that are

committed to implement reforms. Such countries will benefit from an in-depth analysis drawing various participants, including TCX, aiming at identifying impediments to investment at the macro, business, and finance levels. This is a recognition of TCX's expertise, in our view.

## Outlook

The stable outlook reflects our view that TCX's business model will remain sustainable for the next 24 months thanks to adequate risk management, durable links with shareholders--which have strong incentives to provide capital support to ensure the solvency of the fund if needed--and the ability to do new business. These strengths anchor the creditworthiness at 'A-', despite inherently volatile profitability.

We could downgrade the fund should the strength and predictability of its links with shareholders weaken, in particular with respect to capital redemptions. We would also view negatively the fund's failure to maintain a robust risk management framework and serve investors' business needs.

An upgrade is currently unlikely, given the fund's narrow business focus.

## Business Profile

TCX is a public limited liability company incorporated in The Netherlands. It started its commercial operations in January 2008 to assist its shareholders--mostly development banks of highly rated sovereigns or multilateral financial institutions--with their public policy role. It currently has about 20 shareholders. Via its hedging activity, TCX promotes long-term local currency financing in frontier and emerging markets. About 22% of the primary hedging portfolio related to exposures to "least developed" and "other low income countries" (OECD definitions) at the end of September 2017. TCX pools the hedging needs of its investors, primarily cross-currency swaps. Through the fund, shareholders benefit from risk mitigation through diversification, realize economies of scale for administrative expenses relating to specialized back office and valuation services and transaction management, and share the risks inherent in dealing in markets for which regular quotations are not available.

Typically, the market would not currently provide for swaps with the same currency or tenor as the ones that TCX concludes with individual shareholders. Should commercial banks start offering similar products, TCX would cease to quote derivatives in the corresponding currency.

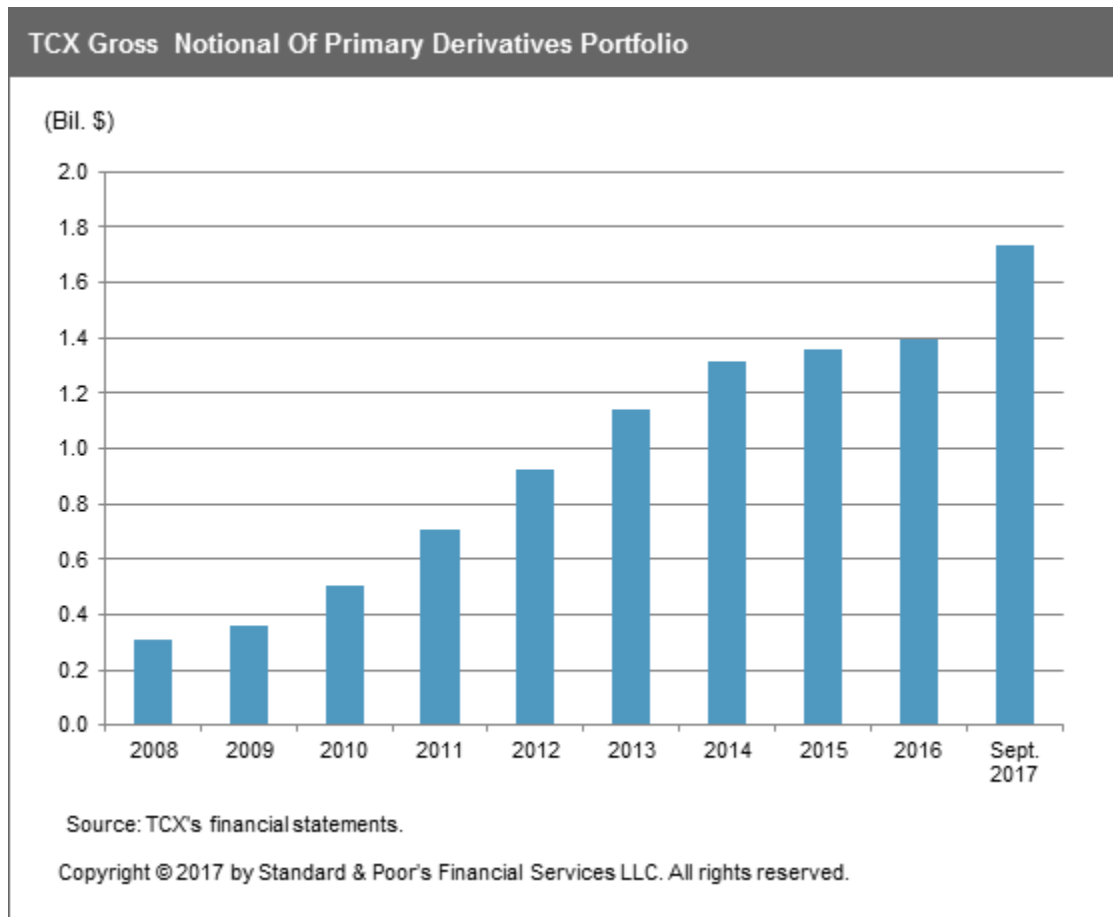
Investors engage in these markets to provide their borrowers with development loans in local currencies to free them from foreign exchange risk, and thus support the development of their local debt markets. Additionally, TCX allows lending expansion for those sponsors that individually may not be allowed to take on direct currency exposure on their lending activities. TCX's shareholders still support some foreign-exchange risk via their participation in TCX but, on average, less than they would individually were their exposures unhedged. This is because of TCX's risk diversification benefit. In this respect, TCX has the potential to continue improving its risk profile by taking on, for instance, currency exposure with expected low correlation to the existing portfolio or by increasing the granularity of its exposures.

TCX's counterparties are its investors when the loans are in local currency or more infrequently its investors'

borrowers when the loans are in U.S. dollars (direct trades).

The fund's portfolio growth is reviving after very slow growth in 2015-2016, which reflected a combination of geopolitical and macroeconomic events unfavorable to emerging markets, including tensions around Russia, tightening monetary conditions in the U.S., and a slowing Chinese economy and decreasing commodity prices. The production of derivatives' notional rebounded in the second half of 2016 with the dynamics continuing into 2017. We expect the fund's portfolio to grow in 2018 at a steady pace, similar to that during the first years of its existence.

**Chart 1**



**Table 1**

**The Currency Exchange Fund N.V.'s Main Shareholders (As Of September 2017)**

Shareholders	Foreign Currency Rating	Number of shares	% of shares
EBRD	AAA/Stable/A-1+	140	14.9
FMO	AAA/Stable/A-1+	140	14.9
KfW	AAA/Stable/A-1+	140	14.9
EIB	AAA/Stable/A-1+	88	9.4
JBIC	A+/Stable/A-1	84	9.0
AFD	AA/Stable/A-1+	80	8.5
IFC	AAA/Stable/A-1+	50	5.3

**Table 1****The Currency Exchange Fund N.V.'s Main Shareholders (As Of September 2017) (cont.)**

Shareholders	Foreign Currency Rating	Number of shares	% of shares
AfDB	AAA/Stable/A-1+	49	5.2
DBSA	BB/Stable/B	40	4.3
OFID	N.R.	40	4.3
Other		87	9.3

Source: TCX's financial statements. N.R.--Not rated.

**Ownership Structure And Legal Status**

TCX's main shareholders are FMO, KfW, and EBRD, which each hold a 14.9% stake (see table 1). The fund welcomed the European Investment Bank as a new shareholder in June 2016 (9.4% stake). Altogether, since TCX's inception, the 20 shareholders have paid more than US\$486 million in cash. In addition, the Dutch government and KfW--on behalf of the German government--have paid US\$172 million in subordinated loans, which provide first-loss protection to the fund's shareholders in case of liquidation. These loans support the fund's capability and incentive to transact in the "least developed countries" and "other low income countries" (OECD).

**Table 2****TCX Financial Statements (Mil. \$)**

Statement of financial position	--Year ended Dec. 31--									
	Sept. 2017	2016	2015	2014	2013	2012	2011	2010	2009	2008
Assets	869.5	863.0	803.2	766.0	781.8	756.3	711.1	670.4	565.1	451.8
Cash and cash equivalents	102.0	36.2	57.7	33.9	31.0	40.9	29.6	24.3	51.5	25.7
Securities	647.6	687.6	599.0	663.1	714.0	669.5	639.7	614.7	500.9	391.9
Cash collateral posted by TCX	49.1	67.2	86.7	39.3	15.6	20.7	24.2	12.1	0.0	31.9
Swap portfolio and other assets	70.8	72.0	59.8	29.6	21.2	25.2	17.6	19.3	12.7	2.3
Liabilities	869.5	863.0	803.2	765.9	781.8	756.3	711.1	670.4	565.1	451.8
Cash collateral received	16.2	20.0	21.5	5.4	7.7	6.5	0.0	2.9	7.5	0.0
Swap portfolio	107.8	145.8	202.7	123.6	47.8	37.7	48.7	27.6	16.8	68.8
Other liabilities	12.0	8.3	12.3	10.1	9.4	9.9	8.9	4.4	3.5	1.2
Capital	733.5	688.8	566.6	626.8	717.0	702.4	653.5	635.6	537.3	381.8
o.w. first-loss loan	10.9	10.9	-	-	-	-	-	-	-	-
o.w. subordinated convertible loans	161.5	161.5	161.5	128.8	128.8	128.8	128.8	128.8	111.1	36.2
o.w. redeemable capital	540.9	496.3	385.1	478.0	568.2	553.6	524.7	506.8	426.2	345.6
o.w. subordinated loans	20.1	20.1	20.0	20.0	20.0	20.0	0.0	0.0	0.0	0.0
<b>Statement of comprehensive income</b>										
Investment result	76.0*	79.9	(75.9)	(43.6)	38.4	67.4	11.2	33.1	82.6	(55.3)
Other result	(3.1)*	(5.0)	(6.9)	(6.9)	0.5	0.6	(3.3)	(2.6)	(1.1)	(2.5)
Total result	73.0	74.9	(82.8)	(50.6)	38.9	68.0	7.9	30.5	81.5	(57.8)
Operational expenses	(6.8)	(9.2)	(10.2)	(10.7)	(10.6)	(10.7)	(9.0)	(7.7)	(8.4)	(7.2)
Net operating income	66.2	65.7	(92.9)	(61.3)	28.3	57.3	(1.1)	22.8	73.0	(65.0)

**Table 2**

**TCX Financial Statements (Mil. \$) (cont.)**

\*Subject to final allocation of exchange-rate translation results. Source: TCX's financial statements.

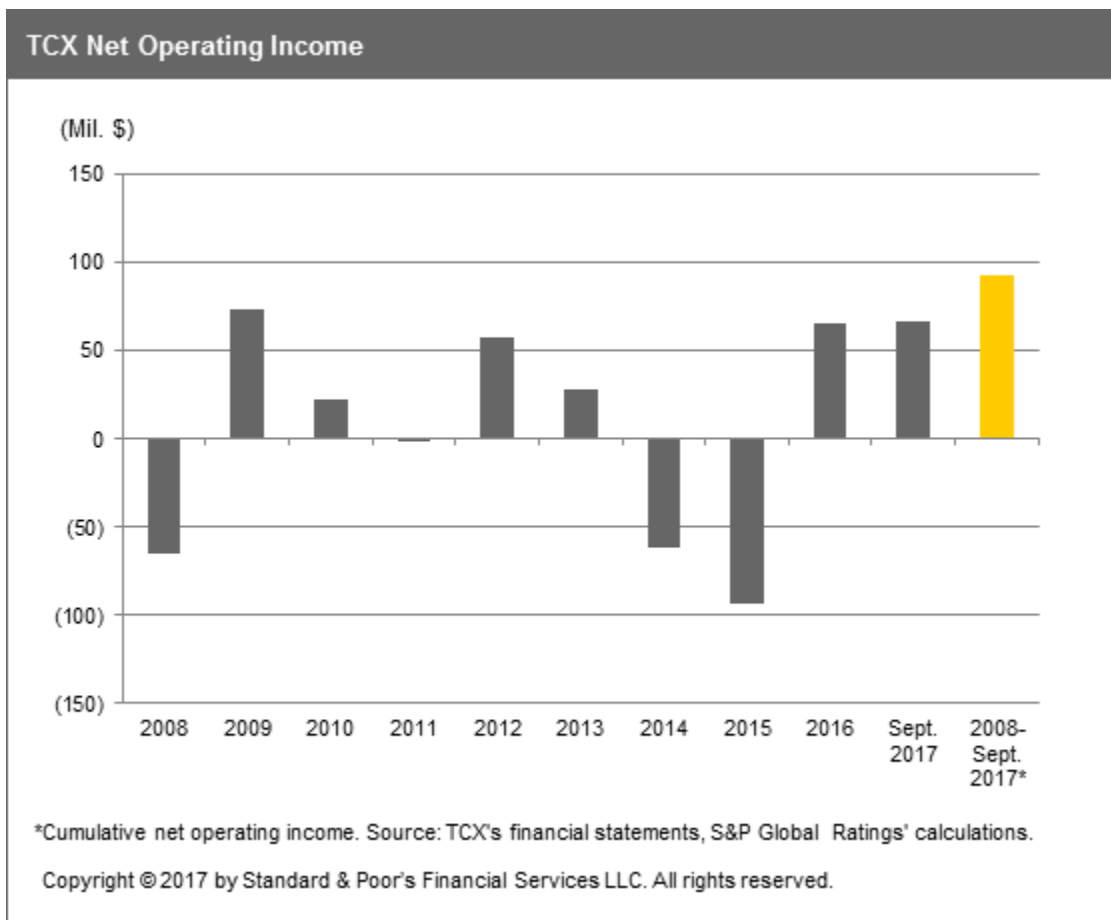
TCX is a tax-exempt public limited liability company registered in The Netherlands, with the fund manager licensed under the Alternative Investment Fund Manager's Directive since March 2016. It is a semi-open-ended investment fund with an indefinite term, but with capital redemption provisions (subject to annual limits).

## Performance

TCX's earnings are structurally highly volatile. They are driven by changes in the mark-to-market of the derivatives portfolio, which depend on the exchange rate between the U.S. dollar and the relevant emerging market currencies as well as interest rates in these markets.

The macroeconomic backdrop for frontier and emerging markets, relatively stable in 2016, continued into 2017. Overall, emerging market currencies appreciated in 2017, on the back of overall stable commodity prices, abating market fears around China, relatively stable U.S. 10-year yields and economic recovery in Russia and Brazil in 2017 after two years of recession. TCX is now on track to record a second consecutive year of profits (\$132 million cumulatively since 2016), nearly recouping losses made in 2014 and 2015 (\$154 million total).

**Chart 2**



Frontier and emerging market currencies could come under renewed pressure due to, in particular, the tightening of monetary policy in some of the main developed economies. That said, we do not consider negative net asset value (NAV) performance to be an issue from a credit perspective as long as the fund's business model remains sustainable, be it in terms of through-the-cycle profit and loss, risk management, and links with shareholders. We do not view TCX's shareholders' confidence as sensitive to short-term negative performance.

The fund clearly does not cover the rate of return a private investor would require, given the volatility of its performance. This is not an issue, in our view, as TCX's shareholders solely expect the fund's business model to be sustainable, which we consider to be the case given the fund's positive internal rate of return since inception (2% as of end September 2017).

TCX's growth will depend mainly on its investors' appetite for local currency lending, as well as on the scope of its shareholder base. In this respect, we believe the fund's capitalization leaves significant room for further growth (see capital position) and we believe its shareholder base could expand in the short term.

## Risk Management

TCX's risk exposure stems predominantly from market risk (93% of the fund's own calculation of total risk-weighted assets as of September 2017, most of which was currency risk, followed by interest rate risk. TCX is also exposed to liquidity risk and counterparty or credit risk, albeit to limited levels. Credit risk arises through the exposure on its swap portfolio or liquidity portfolio. Liquidity risk is primarily related to the potential obligation for TCX to post cash collateral on its swap portfolio or swap termination payments.

TCX's risk appetite and management are governed by a risk charter, which requires approval from the supervisory board and investors to change. Risk measurement and monitoring are outsourced to a well-established external risk-service provider, Netherlands-based Cardano Risk Management B.V. (Cardano). The fund manager retains the ultimate responsibility for ensuring that all risks are identified, measured, monitored, and kept within the risk appetite limits agreed by shareholders.

We take a positive view of recent risk-related governance changes. Overall, they allow TCX to achieve a separation between executive and non-executive functions in risk-related matters and to bring in additional risk expertise. An expanded risk committee reports now to the management, rather than to the supervisory board, and a risk oversight committee has been created at the level of the supervisory board.

### Market risk

TCX manages market risk via concentration limits (by currency and regions), and a value at risk (VaR) approach that underpins the fund's internal capital adequacy assessment process (ICAAP). The VaR computed by TCX looks consistent with a 99% VaR based on about 110 monthly profit and loss observations.

Concentration limits are by currency (net notional exposure cannot exceed 25% of total capital or 10% of portfolio) and region (limit of 30%-50% of total net notional exposures). In this respect, offsetting hedges play an important role to maintain the portfolio composition within these limits if production becomes unbalanced. Some of TCX's investors indeed issue local currency linked bonds and notes and swap them with TCX to USD. This provides TCX with opportunities to have short positions on some of the local currencies on which it has a long position via its primary derivatives portfolio, hence allowing it to reduce its net exposure to some of the local currencies and regions.

TCX's main market risks are exchange rate and interest rate risks in U.S. dollar and local currencies. TCX measures exchange rate risk through an expected tail-risk approach, defined as the average of the five worst monthly losses observed for the foreign exchange book since January 1996. TCX measures interest rate risk through stress testing in emerging markets and historical VaR (99%) in developed markets. Stress testing is a combination of historical events, macroeconomic scenarios, and sensitivity analysis.

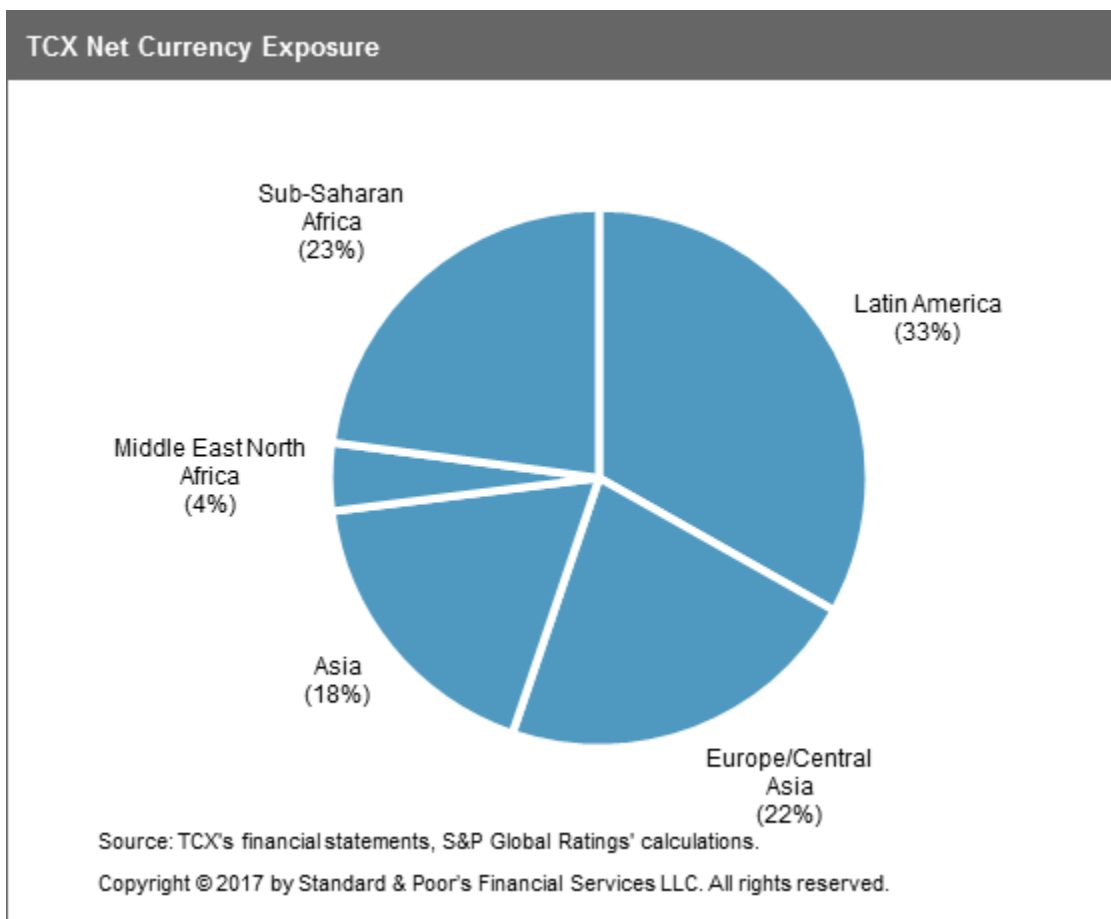
We consider that TCX's market risk monitoring and stress testing have been conceived in an appropriate way. For its VaR approach, TCX uses the assumption of a one-month holding period for a trading position, which is more conservative than the assumption used by most commercial banks but appropriate given the illiquidity of its trades. TCX's losses resulting from the emerging market currency depreciation in October 2008 were significantly above the market risk measure implied by its VaR approach. However, we believe that changes in ICAAP exercises have



improved the robustness of the framework, including through a greater range of stress events captured by the framework and more weight given to stress test analysis.

Although the derivative portfolio covers about 50 different emerging market currencies, we note concentration on certain currencies in the portfolio, with the top five currencies accounting for 29% of net currency exposures at end-September 2017. Large losses in 2014 and 2015 illustrate the risk arising from such concentrations. For example, the fund's negative change in net assets in 2015 was attributable to a large extent to the Azerbaijani manat (about 40% of the total annual loss), the fund's second largest exposure at the time. That said, we note increasing diversification by regions, with Europe/Central Asia accounting for 23% of net currency exposures at end-2016, down from 36% at end-2015.

**Chart 3**



**Credit risk**

We currently consider TCX's credit risk to be extremely low. TCX does not undertake direct lending activities. Credit risk arises from counterparty risk on derivatives and credit risk associated with cash and security investments.

Credit risk exposures at default are 94% to counterparties rated 'A' or above (as of September 2017). Exposures on derivative counterparties are mitigated by collateral posting and/or a guarantee. Counterparty exposures to borrowers of shareholders are small (about less than 5% of the primary portfolio notional). Securities consist of highly rated bills

and bonds (rated in the 'AAA' and 'AA' categories).

TCX strengthened its onboarding process, payment monitoring, and risk mitigation following its first ever credit loss in 2016 (the amount itself was negligible due to the size of the exposure and its collateralization).

## Liquidity

Liquidity risk is very limited, in our view. TCX's balance sheet is very liquid, with 12% of total assets in cash (U.S. dollar and euro) and a further 74% in highly rated liquid securities as of September 2017.

TCX introduced a minimum liquidity ratio of 150%, which takes into account collateral calls under stress and potential shareholder redemptions.

In our view, liquid assets comfortably cover--by about 3x according to our calculation as of September 2017--liquidity needs that would arise in a worst-case case scenario where all liabilities swaps would be terminated and capital would be redeemed up to the annual maximum (20%). As of end September, liquid assets amounted to about \$750 million, which compares with a worst-case 20% capital redemption of about \$135 million and a mark-to-market of derivatives liabilities of about \$110 million.

TCX usually posts collateral when the mark-to-market of the derivative contract favors the counterparty. We consider the risk of TCX not being able to meet such obligations at this point in the cycle to be extremely low.

TCX does not take deposits or issue debt.

## Capital Position

### Statutory capital limits

TCX is not subject to bank regulation. Under its own statutes, agreed upon with the shareholders, TCX has determined minimum capital to risk-weighted assets ratio standards that would trigger obligatory steps to be taken by the risk manager. Risk-weighted assets as calculated by TCX arise in credit, operational, and market risks, the latter of which are by far the main risk drivers.

TCX defines its capital requirement as the sum of the capital required to cover the liquidation trigger event (14% capital ratio) and a Pillar 2 requirement. The Pillar 2 requirement is reviewed every year during the ICAAP process. It covers risks that may be insufficiently captured or not captured under its risk weighting, such as the risk of a currency being unpegged. If capital fell below the own capital requirement (including the Pillar 2 buffer), TCX would be required to reduce its swap exposures until the ratio requirement is met. In our view, this trigger provides some protection for the company's financial profile, although it may not cushion against the effect of abrupt and lasting market movements.

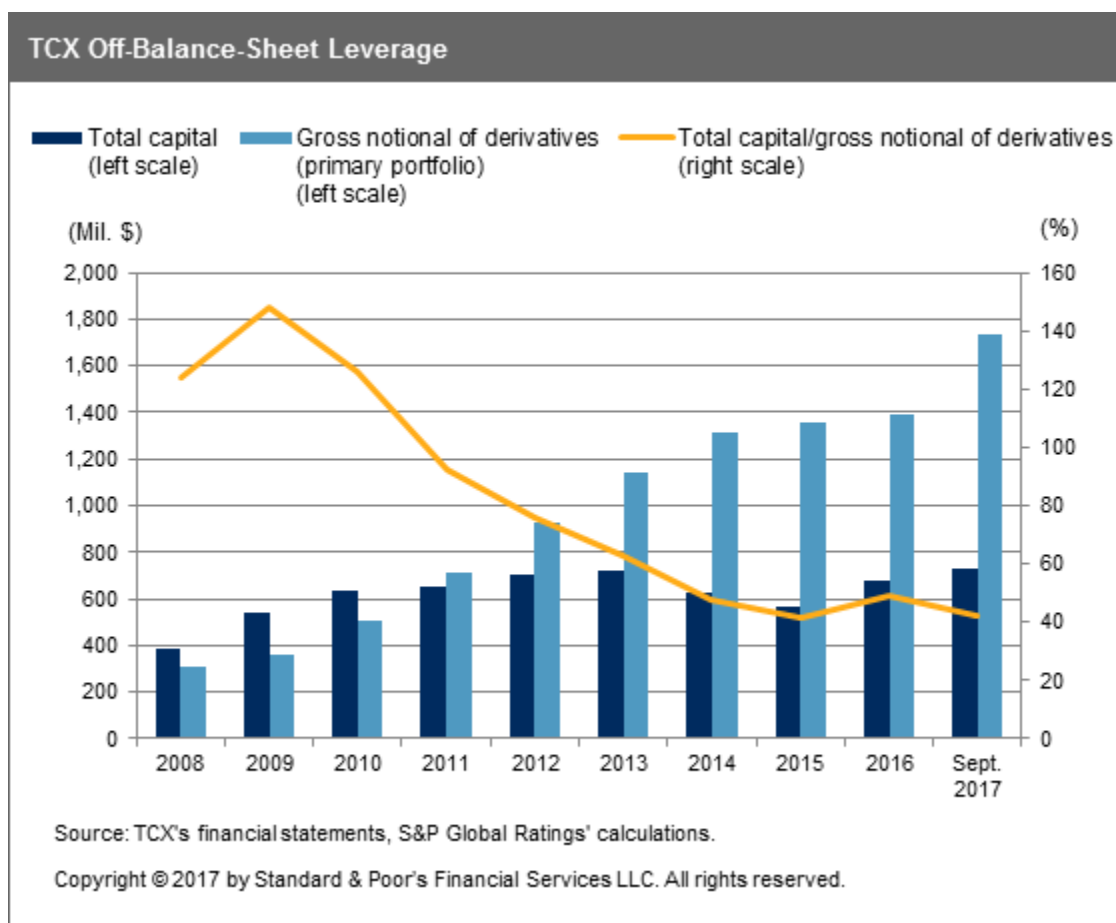
Should the capital ratio fall below 14% of capital over risk-weighted assets ("liquidation trigger event"), we understand that, as per the fund's statutes, all shareholders would have to discuss at short notice a resolution, agreeing to provide additional capital, wait for a recovery, or liquidate the fund within one year by unwinding its positions. Swaps with all counterparties contain clauses, by which TCX and the swap counterparties can unwind existing swap positions after the liquidation event in an orderly manner.

### Capital strength

TCX's capital base is currently comfortable, in our view. The total capital ratio stood at 29% as of September 2017 according to TCX' own calculation, compared with a minimum own capital requirement currently at 18%. All else being equal, breaching the own capital requirement would require capital to decrease by about 50% (about \$270 million) or the portfolio to grow by about 70%, as of end-September 2017. Breaching the LTE would require capital to decrease by about 70% (about \$380 million) or the portfolio to grow by about 120%. Such capital buffers compare with the current portfolio's worst yearly performance over the past 20 years (stress testing) of -\$102 million, a period that includes the 1997 Asian Financial Crisis.

This capital base translates into very reasonable leverage. The total capital over the gross notional of the primary portfolio stood at 42% as of September 2017. This is very reasonable considering a VaR/notional amount of about 3%.

**Chart 4**



The capital base comprises shareholders' redeemable capital (\$541 million), subordinated convertible loans (\$162 million), subordinated loans (\$20 million), and a first loss loan (\$11 million). The convertible loans are subordinated to all junior and senior obligations. This capital structure allows the conciliation of the different risk profiles of exposures that TCX exposes the various shareholders to.

## Assessment As A Government Related Entity (GRE)

Our view of a high likelihood of extraordinary support is based on our assessment of TCX's important role for, and its very strong link to, its dominant owners and their related governments.

We assess TCX's role as important, because it operates as an independent entity that contributes to the provision of an important public policy mandate by its shareholders and their related governments. TCX, via its shareholders, supports official development assistance. The Netherlands, Germany, France, and Japan are all members of the OECD Development Assistance Committee, an international forum that promotes development co-operation and other policies so as to contribute to sustainable development in developing countries.

Our assessment of TCX's role for its dominant owners also reflects the fact that the focus of TCX's activities is not on the owners' domestic markets, and these activities do not have systemic relevance. By the same token, TCX's role for its owners could decrease if they generate insufficient local currency lending business. At the same time, we expect that under such scenarios, the owners would have TCX run down its operations in an orderly manner and provide support, if necessary, until TCX finishes its operations.

We assess TCX's link to its dominant owners as very strong, because they created it, provided it with capital as an independent entity, and maintain a strong influence on the fund's strategic and business plans. Both the Dutch government--through the Dutch Ministry of Foreign Affairs--and the German government--through KfW--provide subordinated convertible loans to TCX.

Although the shareholders are entitled to start claiming capital redemptions gradually, we expect no major claims for capital redemptions that would threaten TCX's financial strength. Furthermore, if shareholders wish to exercise this option, withdrawal rights would be limited to a maximum of 20% of total capital per year. Also, additional restrictions to redemption have been agreed by shareholders, including a clause preventing capital redemption by a shareholder if it would lead to a fall in TCX's internal capital ratio to below 14% of risk-weighted assets.

## Related Criteria

- General Criteria: Methodology For Linking Long-Term And Short-Term Ratings, April 7, 2017
- General Criteria: Rating Government-Related Entities: Methodology And Assumptions, March 25, 2015
- General Criteria: Use Of CreditWatch And Outlooks, Sept. 14, 2009
- Criteria - Financial Institutions - Fixed-Income Funds: Counterparty And Debt Rating Methodology For Alternative Investment Organizations: Hedge Funds, Sept. 12, 2006

## Related Research

- Nederlandse Financierings-Maatschappij voor Ontwikkelingslanden N.V., Dec. 28, 2016
- KfW, Nov. 11, 2016
- European Bank for Reconstruction and Development, Oct. 7, 2015

**Ratings Detail (As Of December 11, 2017)**

**Currency Exchange Fund N.V. (The)**

Counterparty Credit Rating A-/Stable/A-2

**Counterparty Credit Ratings History**

16-Jan-2017 A-/Stable/A-2

23-Feb-2015 A-/Negative/A-2

02-Nov-2010 A-/Stable/A-2

**Sovereign Rating**

Netherlands (State of The) AAA/Stable/A-1+

\*Unless otherwise noted, all ratings in this report are global scale ratings. S&P Global Ratings' credit ratings on the global scale are comparable across countries. S&P Global Ratings' credit ratings on a national scale are relative to obligors or obligations within that specific country. Issue and debt ratings could include debt guaranteed by another entity, and rated debt that an entity guarantees.

**Additional Contact:**

Financial Institutions Ratings Europe; FIG\_Europe@spglobal.com

Copyright © 2017 by Standard & Poor's Financial Services LLC. All rights reserved.

No content (including ratings, credit-related analyses and data, valuations, model, software or other application or output therefrom) or any part thereof (Content) may be modified, reverse engineered, reproduced or distributed in any form by any means, or stored in a database or retrieval system, without the prior written permission of Standard & Poor's Financial Services LLC or its affiliates (collectively, S&P). The Content shall not be used for any unlawful or unauthorized purposes. S&P and any third-party providers, as well as their directors, officers, shareholders, employees or agents (collectively S&P Parties) do not guarantee the accuracy, completeness, timeliness or availability of the Content. S&P Parties are not responsible for any errors or omissions (negligent or otherwise), regardless of the cause, for the results obtained from the use of the Content, or for the security or maintenance of any data input by the user. The Content is provided on an "as is" basis. S&P PARTIES DISCLAIM ANY AND ALL EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, ANY WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR USE, FREEDOM FROM BUGS, SOFTWARE ERRORS OR DEFECTS, THAT THE CONTENT'S FUNCTIONING WILL BE UNINTERRUPTED OR THAT THE CONTENT WILL OPERATE WITH ANY SOFTWARE OR HARDWARE CONFIGURATION. In no event shall S&P Parties be liable to any party for any direct, indirect, incidental, exemplary, compensatory, punitive, special or consequential damages, costs, expenses, legal fees, or losses (including, without limitation, lost income or lost profits and opportunity costs or losses caused by negligence) in connection with any use of the Content even if advised of the possibility of such damages.

Credit-related and other analyses, including ratings, and statements in the Content are statements of opinion as of the date they are expressed and not statements of fact. S&P's opinions, analyses and rating acknowledgment decisions (described below) are not recommendations to purchase, hold, or sell any securities or to make any investment decisions, and do not address the suitability of any security. S&P assumes no obligation to update the Content following publication in any form or format. The Content should not be relied on and is not a substitute for the skill, judgment and experience of the user, its management, employees, advisors and/or clients when making investment and other business decisions. S&P does not act as a fiduciary or an investment advisor except where registered as such. While S&P has obtained information from sources it believes to be reliable, S&P does not perform an audit and undertakes no duty of due diligence or independent verification of any information it receives.

To the extent that regulatory authorities allow a rating agency to acknowledge in one jurisdiction a rating issued in another jurisdiction for certain regulatory purposes, S&P reserves the right to assign, withdraw or suspend such acknowledgment at any time and in its sole discretion. S&P Parties disclaim any duty whatsoever arising out of the assignment, withdrawal or suspension of an acknowledgment as well as any liability for any damage alleged to have been suffered on account thereof.

S&P keeps certain activities of its business units separate from each other in order to preserve the independence and objectivity of their respective activities. As a result, certain business units of S&P may have information that is not available to other S&P business units. S&P has established policies and procedures to maintain the confidentiality of certain non-public information received in connection with each analytical process.

S&P may receive compensation for its ratings and certain analyses, normally from issuers or underwriters of securities or from obligors. S&P reserves the right to disseminate its opinions and analyses. S&P's public ratings and analyses are made available on its Web sites, [www.standardandpoors.com](http://www.standardandpoors.com) (free of charge), and [www.ratingsdirect.com](http://www.ratingsdirect.com) and [www.globalcreditportal.com](http://www.globalcreditportal.com) (subscription), and may be distributed through other means, including via S&P publications and third-party redistributors. Additional information about our ratings fees is available at [www.standardandpoors.com/usratingsfees](http://www.standardandpoors.com/usratingsfees).

STANDARD & POOR'S, S&P and RATINGSDIRECT are registered trademarks of Standard & Poor's Financial Services LLC.