National Rural Utilities Cooperative Finance Corporation

Key Rating Drivers

Strong Franchise and Unique Structure: National Rural Utilities Cooperative Finance Corporation's (CFC) ratings reflect its unique competitive position within the electric cooperative lending space, strong asset quality, sufficient liquidity, funding diversity and adequate coverage of interest expenses. The ratings are constrained by CFC's higher leverage relative to similarly rated peers, its unique capital structure, a business model that results in modest earnings performance relative to peers and an inability to access the public equity capital markets.

Demonstrated Track Record: CFC has a demonstrated track record in credit risk management, having recorded very low credit losses over time. Over the firm's 53-year operating history, CFC has experienced only 18 defaults in its electric cooperative loan portfolio, which includes the default of Brazos Power Cooperative, Inc. (Brazos) and Brazos Sandy Creek Electric Cooperative Inc. (Brazos Sandy Creek), respectively, resulting from the bankruptcy filings following their exposure to elevated wholesale electric power costs during Winter Storm Uri. Cumulative net write-offs totaled $101 million (0.3% of average loans) since inception, evidencing strong and stable underwriting, as well as solid risk management.

High Leverage: Fitch Ratings calculated leverage (debt to tangible equity) to be 7.0x at Nov. 30, 2022 (2Q23), down from 8.7x a year ago due to growth in GAAP equity from retained earnings and positive derivative fair value changes. While Fitch views CFC's leverage as reasonable given low portfolio credit risk and CFC's ability and willingness to access subordinated deferrable debt markets to support growth, CFC's current leverage metrics are higher than similarly rated non-bank financial institutions and remain a rating constraint.

Modest Earnings: Earnings on a pretax ROAA basis are very low when compared to similarly rated non-bank financial institutions. Fitch places greater emphasis on the company's adjusted times interest earned ratio (TIER), which has been consistent over time. Adjusted TIER amounted to 1.2x for 1H23 relatively consistent with the prior year. Given the company's strong asset quality and ability to adjust loan pricing, Fitch expects adjusted TIER to remain in excess of the firm's 1.1x target over time.

Rating Sensitivities

Factors that could, individually or collectively, lead to negative rating action/downgrade: A perceived drift in focus, evidenced by an increased level of lending to sectors outside of its rural electric member base, a spike in nonperforming loans due to financial stress within the sector indicating an inability to adapt to new legislation or an inability to pass along cost increases to end-users, a sustained increase in Fitch-calculated leverage above 10.0x and/or deterioration in the firm's liquidity profile could yield negative rating actions.

Factors that could, individually or collectively, lead to positive rating action/upgrade: Fitch believes the likelihood of a ratings upgrade over the medium term is limited given CFC's higher than peer average. However, over time, positive momentum could be driven by a decline in leverage approaching 5.0x on a Fitch-calculated basis, which is more consistent with Fitch's investment-grade benchmark ratio for balance sheet intensive finance and leasing companies, and enhanced funding flexibility, as evidenced by the lengthening of CFC's debt maturity profile.

Ratings

Foreign Currency	
Long-Term IDR	A
Short-Term IDR	F1
Commercial Paper	F1
Senior Secured	A+
Senior Unscecured	A
Subordinated	BBB+

Outlooks

Long-Term Foreign-Currency IDR	Stable

Applicable Criteria

Non-Bank Financial Institutions Rating Criteria (January 2022)

Corporate Hybrids Treatment and Notching Criteria (November 2020)

Related Research

Global Economic Outlook (December 2022)

U.S. Public Power and Electric Cooperatives Outlook (December 2022)

North America Finance and Leasing Companies Outlook (December 2022)

Fitch Affirms National Rural Ratings at 'A'/'F1'; Outlook Stable (September 2022)

Rising Fuel Costs and Inflationary Trends Pressure Public Power (August 2022)

U.S. Public Power – Peer Review (June 2022)

Financial Data

National Rural Utilities Cooperative Finance Corporation

($Mil,)	11/30/22	5/31/22
Total Assets	33,188.4	31,251.4
Tangible Equity	4,658.9	4,362.6
Debt/Tangible Equity (x)	7.01	7.24

Source: Fitch Ratings and CFC

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Issuer Ratings

Rating Level	Long-Term IDR	Short-Term IDR	Outlook
National Rural Utilities Cooperative Finance Corporation	A	F1	Stable

Source: Fitch Ratings

According to Fitch's "Non-Bank Financial Institutions Rating Criteria", dated Jan. 31, 2022, a Long-Term Issuer Default Rating (IDR) of 'A' maps to a Short-Term IDR of 'F1' or 'F1+'. To qualify for the higher rating, CFC would need to have a minimum funding, liquidity and coverage (FLC) score of 'aa–'. CFC's score is currently 'bbb'. Accordingly, CFC's Short-Term IDR is 'F1'.

The Short-Term IDR is primarily sensitive to the Long-Term IDR and would be expected to move in tandem. However, a material improvement in CFC's FLC profile, resulting in an upgrade of the subfactor score to 'aa–', could result in the upgrade of the Short-Term IDR to 'F1+'.

Debt Rating Classes

Rating Level	Rating
Commercial Paper	F1
Senior Secured	A+
Senior Unsecured	A
Subordinated	BBB+

Source: Fitch Ratings

The commercial paper (CP) rating is equalized with the Short-Term IDR of 'F1'. CFC's CP rating is sensitive to changes in the firm's Short-Term IDR and would be expected to move in tandem.

The senior secured debt ratings benefit from a one-notch uplift from the Long-Term IDR given the strong collateral coverage backing such notes and the good recovery prospects for debtholders under a stress scenario. CFC's collateral trust bonds are backed by high-performing mortgage notes with strong, stable underlying hard assets from electric distribution cooperatives in the event of collateral underperformance.

The senior unsecured debt ratings are equalized with CFC's Long-Term IDR, reflecting their subordination to secured debt and average recovery prospects for debtholders in a stress scenario. Medium-term notes represent unsecured obligations that may be issued through dealers in the capital markets or directly to CFC's members.

The subordinated deferrable debt (SDD) ratings are two-notches below the Long-Term IDR due to poor recovery prospects for debtholders in a stress scenario given their deep subordination to senior secured and senior unsecured debt.

CFC's senior secured, senior unsecured and subordinated debt ratings are sensitive to changes in the firm's Long-Term IDR, its funding mix and availability of collateral for each class of debt.

Ratings Navigator

Significant Changes

Inflation, Interest Rate Hikes and Recession

In the updated "Global Economic Outlook" (GEO) published Dec. 5, 2022, Fitch revised down the world GDP growth forecast for 2023 from 1.7% in the September GEO to 1.4%, reflecting the prospect of faster than expected monetary policy tightening and a darkening outlook for China's property sector. Fitch expects U.S. growth to slow to just 0.2% in 2023 from 1.9% in 2022, reflecting the lagged effect of monetary tightening on demand, the ongoing drag on real incomes from higher inflation and weakening exports. A relatively short recession is expected in 2Q23 and 3Q23 but the recovery is unlikely to be rapid, with growth still subdued in 2024.

Mounting Cost Pressures Threaten Operating Performance

Fitch's deteriorating outlook for the Public Power and Electric Cooperatives sector reflects our expectation that economic and business conditions will create a more challenging operating environment in 2023 relative to 2022. Strong headwinds related to general inflationary pressures, higher natural gas and slower economic growth are expected to contribute to diminished operating performance. This could lead to a weakening in credit quality across the sector, absent aggressive efforts to reduce or recover operating costs and increase rates to preserve margins.

Fitch expects the rate of capital investment to gradually grow after years of lackluster performance, spurred by the increasing need for new capacity additions and ongoing maintenance, along with higher prices for labor and materials. While near-term capacity additions will remain dominated by new wind and solar generation, the recent approval of direct-pay tax credits should increase direct investment by not-for-profit utilities.

This may reverse the trend where capex by wholesale systems fell below depreciation in six of the past eight years. Spending by retail systems should be more robust, led by initiatives to improve grid resiliency. Overall, Fitch expects higher spending could increase debt and deplete cash reserves but considerable headroom exists to preserve credit quality in the near term.

Bar Chart Legend

Vertical bars – VR range of Rating Factor

Bar Colors – Influence on final VR

- Higher influence
- Moderate influence
- Lower influence

Bar Arrows – Rating Factor Outlook

⇧ Positive ⇩ Negative
⇳ Evolving ▫ Stable

Company Summary and Key Qualitative Assessment Factors

Franchise Strengths; Growth in 100% Borrowers

CFC was formed in 1969 by its members, primarily rural cooperative electric distributors and generation and transmission (G&T) systems. The company was organized to provide its members with a source of financing to supplement the Rural Utilities Service (RUS) lending program. Fitch notes that within the electric cooperative lending space, there are just three primary players: the U.S. government (through the RUS), the Farm Credit System (through CoBank ACB [IDR: 'AA–'/Stable]) and CFC. Fitch believes CFC has meaningful and unique franchise strengths and estimates that CFC garners over 28% of the U.S. electric cooperative lending market, as of Dec. 31, 2022. The company continues to strengthen its franchise, as demonstrated by the number of borrowers that use CFC exclusively for long-term borrowing needs (100% borrowers), which increased to 248 in the fiscal year ended May 31, 2022 (FYE22), up from 243 at FYE21.

Focus on Lending to Members

CFC's strategic objective is to focus on lending to electric utility cooperatives. As of Nov. 30, 2022, core members represented 98% of the total portfolio. Management has significantly reduced the exposure to telecommunication entities in recent years, which had been the cause of most of CFC's historical credit losses. They now represent just 1.5% of the total portfolio as of the same date. If there is a perceived drift in focus, evidenced by an increased level of lending to sectors outside of its rural electric member base, negative rating action would be likely.

Maintain Diversified Funding

Another key focus for CFC is to diversify its funding sources over time, beyond capital market offerings of debt securities. Private funding programs with the Federal Financing Bank, under a guarantee from the RUS, and the Federal Agricultural Mortgage Corporation have become more prominent sources of funding in recent years given their reliability, flexibility and cost. As of 3Q23, capital markets funding (collateral trust bonds, nonmember CP, medium-term notes, subordinated deferrable debt [SDD] and securities sold under repurchase agreements) represented 51% of total funding compared to 86% at FYE03. Fitch views favorably CFC's economic access to diversified funding sources and reduced reliance on the wholesale debt markets.

Solid Risk Control Framework

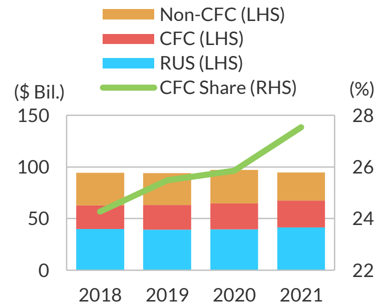
Fitch deems CFC's risk control framework to be solid. CFC maintains an internal credit risk system in which the firm assigns a credit rating to each borrower and credit facility. The internal risk ratings are based on a determination of a borrower's risk of default using quantitative and qualitative measurements. Borrower risk ratings fall into four categories, which align with U.S. federal banking regulatory agencies' definitions of "pass", "special mention", "substandard" and "doubtful". The internal borrower risk ratings serve as primary credit quality indicators for the loan portfolio. Because they provide information on the probability of default, they are a key input in the determination of the allowance for credit losses.

The $67.6 million allowance for credit losses represented 0.2% of total loans outstanding at 2Q23, relatively flat compared to FYE22. The allowance for credit losses reflected an increase in the collective allowance of $2 million due to loan growth, offset by a $2 million net decrease in the asset-specific allowance due to the charge-off of nonperforming loans to Brazos (WD) and its subsidiary, Brazos Sandy Creek.

Exposure to Interest Rate Risk

In order to minimize interest rate risk, CFC utilizes plain vanilla swaps. CFC records all derivatives as either assets or liabilities and measures the fair value of the instruments each quarter-end with cash settlements included in interest expense when adjusted performance ratios are calculated. Changes in interest rates and the shape of the swap curve result in periodic fluctuations in the fair value of derivatives, which may cause volatility in earnings because CFC does not apply hedge accounting for the swaps. As a result, mark to market changes in the interest rate swap are recorded in earnings. To evaluate core earnings performance, management uses non-GAAP measures, which exclude the impact of unrealized fair market gains and losses on swaps.

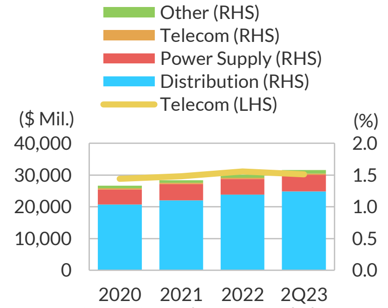
Financing Market Share



Source: Fitch Ratings and CFC

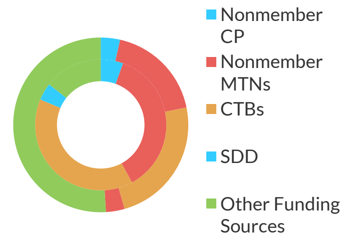
Loan Mix

(Years Ended May 31)



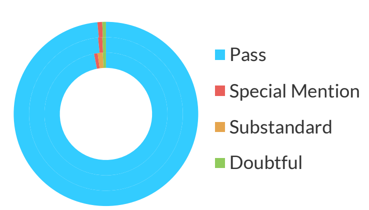
Note: 2Q23 — Second quarter ended Nov. 30, 2022.
Source: Fitch Ratings and CFC

Capital Markets Sources



Note: Inner Ring: 2003, Outer Ring: 2022
Source: Fitch Ratings and CFC

Loan Portfolio by Risk Rating



Note: Inner Ring: 2021, Middle Ring: 2022
Outer Ring: 2Q23
Source: Fitch Ratings and CFC

Key Financial Metrics — Latest Developments

Low Credit Losses Over Time

CFC has a demonstrated track record in credit risk management, having recorded very low credit losses over time. Over CFC's 53-year operating history, the company has experienced only 18 defaults in its electric utility portfolio, including the most recent default of Brazos Sandy Creek in March 2022, which resulted in eight losses in the electric utility portfolio. Cumulative net write-offs in the electric utility portfolio totaled $101 million (0.3% of average loans) since inception, evidencing strong and stable lending, as well as solid credit risk management. As of 2Q23, CFC had loans to three borrowers classified as nonperforming totaling $203 million, or 0.6% of total loans. The $25 million reduction in the nonperforming loan balance in 1H23, was related to the partial chargeoff of $15 million related to Brazos and Brazos Sandy Creek and $10 million of payments received on the remaining nonperforming loan. This resulted in annualized net chargeoffs increasing to 0.1% during 1H23. Prior to Brazos and Brazos Sandy Creek's bankruptcy filings, CFC had not experienced any defaults or chargeoffs in its electric utility and telecommunications loan portfolio since FYE13 and FYE17, respectively.

Mission as a Cooperative Lender; Emphasis on Coverage Metrics for Earnings

Earnings and profitability metrics are low compared to similarly rated non-bank financial institutions, with pretax income as a percentage of average assets averaging 0.7% in fiscal years 2019–2022. Fitch believes earnings have a low influence on the overall ratings as CFC's mission (and members' expectation) is not to generate large profits, but instead to cover its cost of funding, cost of operations and its loan losses.

In 1H23, CFC recorded pretax income of $352.1 million, up 673% compared to a year ago, due to positive derivative fair value changes attributed to increases in interest rates across the entire swap curve. CFC's current ratings reflect an expectation of potential period-to-period volatility in reported earnings given mark-to-market changes on derivatives. In its analysis of earnings, Fitch places a greater emphasis on the company's adjusted net income and TIER. These measures have been adequate and consistent with Fitch's expectations over time. CFC's adjusted TIER excludes from net income the impact of unrealized derivative forward value gains and losses and includes periodic cash derivative settlements in adjusted interest expense and net interest income. Adjusted TIER amounted to 1.2x in 1H23 compared to 1.3x a year prior. Given the company's strong credit quality and ability to adjust loan prices, Fitch expects the adjusted TIER to remain in excess of CFC's 1.1x target over time.

Relatively Stable Leverage

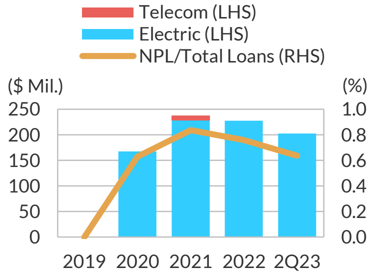
Fitch calculated CFC's leverage (debt to tangible equity) to be 7.0x at 2Q23, down modestly from 7.2x at FYE22. Leverage can be impacted by mark-to-market changes on CFC's derivatives, although this is incorporated into CFC's ratings. While Fitch views CFC's leverage as reasonable given the low portfolio credit risk and CFC's ability and willingness to access subordinated deferrable debt markets to support growth, CFC's leverage metrics are higher than similarly-rated non-bank financial institutions and remains a rating constraint. Fitch notes that the inclusion and treatment of loan and guarantee subordinated certificates (LGSC) as 100% equity in Fitch's leverage calculation is considered a variation to the agency's hybrid criteria because the LGSC have a contractual or implied maturity, more akin to a hybrid instrument, which would typically receive 50% equity credit. For more information, see Discussion of CFC's Equity Base on page 6.

CFC assesses leverage based on an adjusted debt to equity calculation, which strips out derivative fair value changes, and treats all member-held subordinated certificates and subordinated deferrable debt as 100% equity. Based on this treatment, CFC's adjusted leverage metric was 6.5x at 2Q23 compared to 6.2x at FYE22.

Sufficient Liquidity to Address Upcoming Debt Maturities

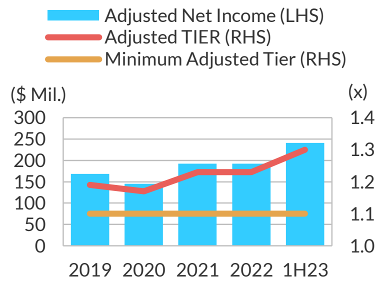
Fitch's analysis is heavily influenced by the firm's ability to maintain adequate liquidity to meet short- and long-term funding needs. At Nov. 30, 2022, CFC had adequate liquidity of $7.2 billion, comprised of $839 million of cash and investments and $6.3 billion of borrowing capacity on various credit facilities. Additionally, CFC had $1.5 billion of anticipated long-term loan repayments over the next 12 months. Fitch believes CFC has sufficient liquidity, providing 1.9x coverage, to address $7.5 billion of debt maturities over the next 12 months, as of 2Q23. Excess liquidity excludes member short-term investments from the $7.5 billion of debt maturities.

Nonperforming Loans



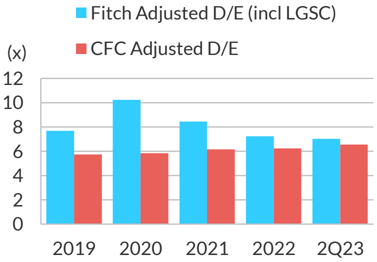
Note: 2Q23 — Second quarter ended Nov. 30, 2022.
Source: Fitch Ratings and CFC

Operating Results



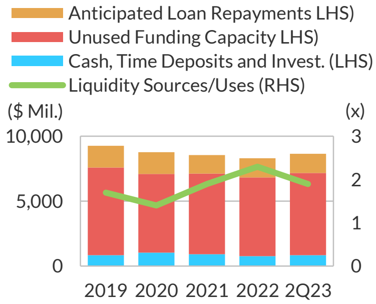
Note: 1H23 — Six months ended Nov. 30, 2022.
Source: Fitch Ratings and CFC

Leverage Trends



Note: 2Q23 — Second quarter ended Nov. 30, 2022.
Source: Fitch Ratings and CFC

Liquidity Management



Note: 2Q23 — Second quarter ended Nov. 30, 2022.
Source: Fitch Ratings and CFC

Discussion of CFC's Equity Base

As a cooperative, CFC's capital generation is primarily derived from its members, through member-owned investment vehicles and retained earnings, which is a rating constraint in Fitch's view. This is especially important given CFC's earnings are low, due to its mission-oriented business model. Still, management and the board have shown the willingness to improve earnings retention in order to improve the quality of CFC's capital and lower its leverage by adjusting the company's patronage capital policy in 2009.

In assessing the equity treatment given CFC's various instruments, and thus determining capital adequacy), Fitch has applied its "Corporate Hybrids Treatment and Notching Criteria." The assessment is presented in the table to the right.

It is important to note that all of CFC's capital instruments are held by system members, except for outstanding SDD. All of these instruments held by system members are subordinated, meaning they would take first loss before all other nonmember instruments.

Subordinated Deferrable Debt

To supplement CFC's capital base, management has made the decision over the years to issue nonmember SDD with the following attributes: subordinated to all senior debt; senior to all member-held subordinated instruments; at least a 30-year maturity from issuance; and ability to defer interest up to 20 quarters (five years), similar to member capital securities (10 consecutive semi-annual payments, or five years). During the deferral, interest continues to accrue on a cumulative basis. Based on Fitch's criteria, these instruments are given 50% equity credit given the deep subordination and the cumulative nature of the interest in the event of a deferral. The weighted-average interest rate of the SDD was 5.1% at FYE22.

Membership Subordinated Certificates

These instruments represent the company's initial capitalization and were required to be purchased as a condition of membership. They are interest-bearing (weighted-average interest rate of 5.0% at FYE22) with an initial maturity of 100 years and are noncumulative. Fitch believes membership subordinated certificates resemble perpetual preferred stock and they are given 100% equity credit in Fitch's analysis.

Member Capital Securities

The member capital securities program is an initiative started at the end of 2008 to raise additional capital from CFC's members and further entrench membership. These are interest-bearing (weighted-average interest rate of 5% at FYE22) with a maturity of 35 years from issuance. Payments, which are cumulative, can be deferred for up to five years. These instruments have full offset rights in the event that a borrower defaults. According to Fitch's criteria, they are given 50% equity credit given the instrument's deep subordination and the cumulative nature of the interest in the event of a deferral.

Loan and Guarantee Subordinated Certificates

Borrowers that receive long-term funding, certain short-term loans, or guarantees from CFC are sometimes required to purchase additional LGSC with CFC based on the member's debt to equity ratio. These instruments are also subordinated to all other debt of CFC. The maturity of the LGSCs match that of the financing of the borrower is receiving but some also amortize annually based on the outstanding balance and paid back as the borrower repays the loan.

LGSC are included in capital without limitation under CFC's covenant calculations for leverage. Given the tenor of the certificates are not publicly disclosed, Fitch believes that it is difficult to assign pure equity credit to them. Instead, Fitch views them as a quasi-loan loss reserve. LGSCs have the ability to offset any losses of loans to members before any other capital instruments, and this feature has been demonstrated over time.

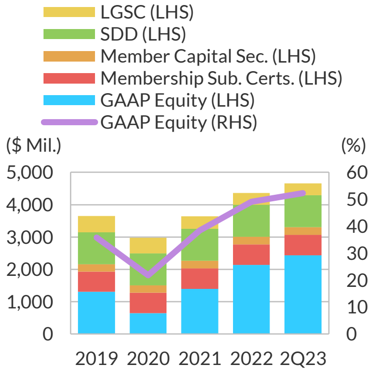
Fitch affords CFC's LGSC 100% equity credit given the instrument's deep subordination and ability to absorb loan losses. However, the treatment of the LGSC as equity is considered a variation to criteria because the LGSC have a contractual or implied maturity, more akin to a hybrid instrument.

CFC's Equity Base

	2Q23	Equity Credit (%)	Fitch Adj. Equity
GAAP Equity	2,434	100	2,434
SSD	987	50	493
Membership Sub. Certs.	629	100	629
Member Capital Sec.	246	50	123
LGSC	364	100	364
Total Fitch Adj. Equity			4,043

Source: Fitch Ratings and CFC

Capitalization Trends
(Years Ended May 31)



Note: 2Q23 — Second quarter ended Nov. 30, 2022.
Source: Fitch Ratings and CFC

Environmental, Social and Governance Considerations

FitchRatings **National Rural Utilities** **Non-Bank FI Ratings Navigator** Finance & Leasing Companies

Credit-Relevant ESG Derivation

National Rural Utilities has 4 ESG potential rating drivers

Governance is minimally relevant to the rating and is not currently a driver.

			Overall ESG Scale
key driver	0	issues	5
driver	0	issues	4
potential driver	4	issues	3
not a rating driver	6	issues	2
	4	issues	1

Environmental (E)

General Issues	E Score	Sector-Specific Issues	Reference	E Scale
GHG Emissions & Air Quality	2	Regulatory risks, emissions fines or compliance costs related to owned equipment, which could impact asset demand, profitability, etc.	Operating Environment	5
Energy Management	2	Investments in or ownership of assets with below-average energy/fuel efficiency which could impact future valuation of these assets	Risk Profile	4
Water & Wastewater Management	1	n.a.	n.a.	3
Waste & Hazardous Materials Management; Ecological Impacts	1	n.a.	n.a.	2
Exposure to Environmental Impacts	2	Impact of extreme weather events on assets and/or operations and corresponding risk profile & management; catastrophe risk; credit concentrations	Business Profile; Asset Quality	1

Social (S)

General Issues	S Score	Sector-Specific Issues	Reference	S Scale
Human Rights, Community Relations, Access & Affordability	1	n.a.	n.a.	5
Customer Welfare - Fair Messaging, Privacy & Data Security	2	Fair lending practices; pricing transparency; repossession/foreclosure/collection practices; consumer data protection; legal/regulatory fines stemming from any of the above	Operating Environment; Risk Profile; Asset Quality	4
Labor Relations & Practices	2	Impact of labor negotiations, including board/employee compensation and composition	Business Profile; Management & Strategy; Earnings & Profitability; Capitalization & Leverage; Funding, Liquidity & Coverage	3
Employee Wellbeing	1	n.a.	n.a.	2
Exposure to Social Impacts	2	Shift in social or consumer preferences as a result of an institution's social positions, or social and/or political disapproval of core activities	Business Profile; Earnings & Profitability	1

Governance (G)

General Issues	G Score	Sector-Specific Issues	Reference	G Scale
Management Strategy	3	Operational implementation of strategy	Management & Strategy	5
Governance Structure	3	Board independence and effectiveness; ownership concentration; protection of creditor/stakeholder rights; legal /compliance risks; business continuity; key person risk; related party transactions	Management & Strategy	4
Group Structure	3	Organizational structure; appropriateness relative to business model; opacity; intra-group dynamics; ownership	Business Profile	3
Financial Transparency	3	Quality and timing of financial reporting and auditing processes	Management & Strategy	2
				1

How to Read This Page
ESG scores range from 1 to 5 based on a 15-level color gradation. Red (5) is most relevant and green (1) is least relevant.

The Environmental (E), Social (S) and Governance (G) tables break out the individual components of the scale. The right-hand box shows the aggregate E, S, or G score. General Issues are relevant across all markets with Sector-Specific Issues unique to a particular industry group. Scores are assigned to each sector-specific issue. These scores signify the credit-relevance of the sector-specific issues to the issuing entity's overall credit rating. The Reference box highlights the factor(s) within which the corresponding ESG issues are captured in Fitch's credit analysis.

The Credit-Relevant ESG Derivation table shows the overall ESG score. This score signifies the credit relevance of combined E, S and G issues to the entity's credit rating. The three columns to the left of the overall ESG score summarize the issuing entity's sub-component ESG scores. The box on the far left identifies some of the main ESG issues that are drivers or potential drivers of the issuing entity's credit rating (corresponding with scores of 3, 4 or 5) and provides a brief explanation for the score.

Classification of ESG issues has been developed from Fitch's sector ratings criteria. The General Issues and Sector-Specific Issues draw on the classification standards published by the United Nations Principles for Responsible Investing (PRI) and the Sustainability Accounting Standards Board (SASB).

Sector references in the scale definitions below refer to Sector as displayed in the Sector Details box on page 1 of the navigator.

CREDIT-RELEVANT ESG SCALE

How relevant are E, S and G issues to the overall credit rating?

5	Highly relevant, a key rating driver that has a significant impact on the rating on an individual basis. Equivalent to "higher" relative importance within Navigator.
4	Relevant to rating, not a key rating driver but has an impact on the rating in combination with other factors. Equivalent to "moderate" relative importance within Navigator.
3	Minimally relevant to rating, either very low impact or actively managed in a way that results in no impact on the entity rating. Equivalent to "lower" relative importance within Navigator.
2	Irrelevant to the entity rating but relevant to the sector.
1	Irrelevant to the entity rating and irrelevant to the sector.

Unless otherwise disclosed in this section, the highest level of ESG credit relevance is a score of ‘3’. This means ESG issues are credit-neutral or have only a minimal credit impact on the entity, either due to their nature or the way in which they are being managed by the entity. For more information on Fitch's ESG Relevance Scores, visit www.fitchratings.com/esg.

Income Statement

($Mil., Years Ended May 31)	1H23 — Unaudited	2022 Audited — Unqualified	2021 Audited — Unqualified	2020 Audited — Unqualified
Interest income	631.2	1,141.2	1,116.6	1,151.3
Interest expense	-454.9	-705.5	-702.1	-821.1
Net interest income	**176.3**	**435.7**	**414.5**	**330.2**
Benefit (provision) for loan losses	-15.1	18.0	-28.5	-35.6
Net interest income after benefit for loan losses	161.2	453.7	386.0	294.6
Fee and other income	8.2	17.2	18.9	23.0
Derivative gains (losses)	240.4	456.5	506.3	-790.2
Investment securities gains (losses)	-4.2	-30.2	1.5	9.4
Total non-interest income	**244.4**	**443.5**	**526.7**	**-757.8**
Salaries and employee benefits	-28.0	-51.9	-55.2	-54.5
Other general and administrative expenses	-24.8	-43.3	-39.4	-46.6
Gains (Losses) on early extinguishment of debt	—	-0.8	-1.5	-0.7
Other non-interest expense	-0.7	-1.6	-1.6	-25.6
Total non-interest expense	**-53.5**	**-97.5**	**-97.7**	**-127.4**
Income (Loss) before taxes	**352.1**	**799.7**	**815.0**	**-590.6**
Income tax expense (provision)	-0.5	-1.1	-1.0	1.2
Net income (loss)	**351.6**	**798.5**	**814.0**	**-589.4**
Net (income) loss attributable to noncontrolling interests	-0.2	-2.7	-2.3	4.2
Net income (loss) attributable to CFC	**351.4**	**795.9**	**811.7**	**-585.2**

Note: 1H23 — First half ended Nov. 30, 2022.
Source: Fitch Ratings, Fitch Solutions, CFC

Balance Sheet

($Mil., Years Ended May 31)	2Q23	2022	2021	2020
Cash, cash equivalents and restricted cash	281.7	161.1	303.4	680.0
Investment securities	607.7	599.9	611.3	370.1
Loans to members, net of allowance	31,509.8	29,995.8	28,341.4	26,649.3
Accrued interest receivable	146.9	111.4	107.9	117.1
Other receivables	33.2	35.5	37.1	41.1
Fixed assets, net of accumulated depreciation	110.2	101.8	91.9	89.1
Derivative assets	473.3	222.0	121.3	173.2
Other assets	25.6	23.9	24.1	37.6
Total assets	**33,188.4**	**31,251.4**	**29,638.4**	**28,157.6**
Accrued interest payable	169.2	132.0	123.7	139.6
Short-term debt borrowings	5,594.2	4,981.2	4,582.1	3,962.0
Long-term debt borrowings	22,537.4	21,545.4	20,603.1	19,712.0
Subordinate deferrable debt	986.6	986.4	986.3	986.1
Membership subordinated certificates	628.6	628.6	628.6	630.5
Loan and guarantee subordinated certificates	363.8	365.4	386.9	483.0
Member capital securities	246.2	240.2	239.2	226.2
Patronage capital retirement payable	2.7	—	—	—
Deferred income	41.1	44.3	51.2	59.3
Derivative liabilities	133.4	128.3	585.0	1,258.5
Other liabilities	51.5	57.6	52.4	51.7
Total liabilities	**30,754.7**	**29,109.4**	**28,238.5**	**27,508.8**
Retained equity	2,404.3	2,114.6	1,375.0	628.0
Accumulated other comprehensive income (loss)	2.1	2.3	-0.0	-1.9
Noncontrolling interest	27.3	27.4	24.9	22.7
Total equity	**2,433.7**	**2,142.0**	**1,399.9**	**648.8**
Total liabilities and equity	**33,188.4**	**31,251.4**	**29,638.4**	**28,157.6**

Note: 2Q23 – Second quarter ended Nov. 30, 2022.
Source: Fitch Ratings, Fitch Solutions, CFC

Summary Analytics

(%, Years Ended May 31)	2Q23	2022	2021	2020
Non-Performing Loans Ratio	0.6	0.8	0.8	0.6
ALLL Coverage	0.2	0.2	0.3	0.2
Pre-Tax ROAA	2.3	2.6	2.8	-2.1
Adjusted TIER	1.2	1.3	1.2	1.2
Operating Expense Ratio	0.3	0.3	0.3	0.4
Fitch-Calculated Tangible Leverage (x)	7.0	7.2	8.5	10.2
CFC Adjusted Leverage (x)	6.5	6.2	6.2	5.9
Unsecured Debt/Total Debt	43.0	44.0	39.3	36.0
Liquidity to Total Assets	20.9	21.4	23.9	22.6
Liquidity Sources to Uses	1.9	2.3	1.9	1.4
Fixed-Charge Coverage	1.8	2.1	2.2	0.3
Unencumbered Loans/Total Loans	36.7	36.6	32.6	26.4

ALLL – Allowance for loan and lease losses. Note: 2Q23 – Second quarter ended Nov. 30, 2022.
Source: Fitch Ratings, Fitch Solutions, CFC

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