

U.S. Housing Finance Agencies General Obligation Rating Criteria

Sector-Specific Criteria

Scope

This criteria report discusses Fitch Ratings' methodology for assigning ratings to housing finance agency (HFA) general obligations (GOs). It is used to assign Issuer Default Ratings (IDRs) that reflect the issuer's GO creditworthiness, as well as ratings on individual debt instruments (issue ratings). The criteria report is sector-specific criteria under Fitch's master revenue criteria, "Public Sector, Revenue-Supported Entities Rating Criteria." The criteria report is also used in conjunction with the "U.S. Housing Finance Agency Loan Program Rating Criteria" to assess revenue defensibility by evaluating the support provided by the HFA's loan programs to its general fund, or conversely, the reliance of the HFA's loan programs on its general fund. The criteria primarily address state HFAs, but also include larger local HFAs that are similar to state HFAs in terms of portfolio size, debt outstanding and management oversight (herein both referred to as HFAs). The criteria apply to both new and surveillance ratings.

Key Rating Drivers

Fitch focuses on three main factors in assessing the credit quality of an HFA's GO ratings, as described below. The ultimate rating outcome is the result of consideration of issuer-specific qualitative and quantitative factors. There is no standard weighting of factors. However, operating risk, including programmatic oversight, may take on more weight when the other two drivers are weaker.

Revenue Defensibility: The risks associated with an HFA's bond programs create potential volatility to the agency's revenue stream. Fitch evaluates the asset quality of the bond programs as well as the agency's loan program's exposure to single-family and multifamily mortgage defaults and losses. Fitch assesses the impact that those risks may have on the overall financial health of the HFA and the impact, if any, on the HFA's ability to honor its GO pledge commitments. Fitch also assesses whether there are factors that mitigate any risks related to the asset quality of the HFA's bond programs.

Operating Risk: Fitch evaluates an HFA's exposure to contingent liabilities and nonhousing activities and the potential monetary commitment that may come from these activities compared with the amount of unencumbered general funds of the HFA. Fitch also assesses the overall HFA profitability metrics and debt structure risks. As part of the operating risk analysis, Fitch considers the level of programmatic oversight provided by the HFA. The strength of oversight capabilities may affect the degree to which an HFA identifies and corrects programmatic, financial or economic problems to protect the agency's long-term credit quality. Strong management will result in more consistent financial performance.

Financial Profile: Fitch assesses an agency's level of financial flexibility and the quality and stability of an HFA's financial resources. Financial metrics are used to evaluate the agency's leverage, capital base and liquidity position. The financial ratios facilitate comparison of an HFA's financial performance and position with those of its peers in the public finance housing industry.

Asymmetric Risk Factors: An HFA's ongoing relationship with the state's executive and legislative branches is considered when assessing the agency's ability to maintain excess funds in its general fund. State governments have periodically requested various amounts from the

Table of Contents

Scope	1
Key Rating Drivers	1
IDR Reflects General Credit Quality	2
Methodology	2
Revenue Defensibility	4
Operating Risk	4
Financial Profile	6
Asymmetric Risk Factors	8
Surveillance	8
Rating Assumption Sensitivity	8
Data Sources	8
Variations from Criteria	8
Limitations	9
Appendix	10

This report updates and replaces "U.S. Housing Finance Agencies: General Obligation Rating Criteria," dated Jan. 13, 2021.

Related Criteria

[Public Sector, Revenue-Supported Entities Rating Criteria \(September 2021\)](#)

[U.S. Housing Finance Agency Loan Program Rating Criteria \(May 2022\)](#)

[U.S. Public Finance Variable-Rate Demand Obligations and Commercial Paper Issued with External Liquidity Support Rating Criteria \(September 2022\)](#)

[U.S. State Housing Finance Agencies: Mortgage Insurance or Guarantee Fund Program Criteria \(May 2020\)](#)

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respective HFA's excess funds. These transfers, depending on the amount and timing, may have an immediate and negative effect on an agency's overall creditworthiness.

IDR Reflects General Credit Quality

Fitch will assign an IDR to each individual HFA, which then informs an issue-specific rating for each Fitch-rated security backed by the HFA's GO. Assigning IDRs aligns default risk ratings in this sector to those assigned by other groups across Fitch's global rating platform.

An IDR reflects Fitch's assessment of an entity's relative vulnerability to default on its financial obligations. In general, all of an issuer's individual GO securities will be assigned the same rating as the IDR. IDR and issue ratings in this sector do not incorporate any assessment of recovery prospects. For more information on IDRs, see Fitch's master criteria "Public Sector, Revenue-Supported Entities Rating Criteria."

Methodology

The sector-specific criteria described in this report are used by Fitch analysts to assess indicative metrics, rating benchmarks and attribute expectations in line with the master revenue criteria, "Public Sector, Revenue-Supported Entities Rating Criteria." The Key Rating Factors in this report represent Fitch's analytical view on a range of HFA GO characteristics. The Key Ratings Factors are not a checklist but, rather, qualitative guidance in assessing an HFA's GO attributes relative to its peers in relation to other GO ratings.

In assessing the creditworthiness relating to an HFA GO rating, Fitch focuses on several core factors, as outlined below. Not all rating factors outlined in this report may apply to an individual rating or rating action. Each specific rating action commentary or rating report will discuss the factors most relevant to the individual rating action.

The criteria report is used in conjunction with the "U.S. Housing Finance Agency Loan Program Rating Criteria" to assess the support provided by excess resources in the HFA loan programs, or conversely, the reliance of the HFA loan programs on the agency's GO funds. This is determined by a forward-looking analysis of potential single-family and multifamily loan losses in the programs, and the resulting impact on program overcollateralization levels, as described in the Loan Program criteria. The degree to which the loan programs affect the GO resources in either a positive or negative way, and the GO reliance on those funds, is then considered in the Revenue Defensibility assessment.

When considering the Key Rating Factors, HFAs that demonstrate characteristics primarily described with 'aa' attributes are typically assigned ratings in the 'AA' rating category. HFAs that demonstrate a combination of characteristics described in the 'aa' to 'a' attributes are typically assigned ratings in the 'A' rating category. A majority of the 'bbb' attributes represents characteristics typically present in HFAs rated 'BBB' and lower. Given the characteristics of issuers in this market, Fitch anticipates most ratings will be in the 'A' to 'AA' rating category range.

Key Rating Factors – HFA General Obligation Ratings

Revenue Defensibility	Relevant Indicators	aa	a	bbb
Asset Quality				
Fitch assesses an HFA's exposure to revenue disruption by evaluating the strength of the asset quality of the single-family and multifamily loan programs.	Asset quality is primarily measured by the mortgage insurance/guarantee provisions on the loans in the underlying bond programs. The approach for evaluating asset quality and performance of individual bond programs is detailed in the 'U.S. Housing Finance Agency Loan Program Rating Criteria.'	The HFA's single-family and/or multifamily loan portfolios are primarily composed of MBS pass-through certificates and/or government insured or guaranteed loans.	The HFA's single-family loan portfolios have a mix of FHA, VA, privately insured and uninsured loans, with perhaps a small percentage of MBS. The multifamily loan portfolios have a mix of guaranteed, insured and subsidized/uninsured, unsubsidized loans	The HFA's single-family loan portfolios are mainly composed of non-MBS or nongovernment insured loans. The pooled multifamily loan portfolios are an uninsured, unseasoned portfolio with no government guarantees and little historical data for benchmarking.
Loan Programs' Impact on GO Funds				
Fitch considers mortgage loss expectations for the underlying bond programs, the level of overcollateralization in the programs, and the potential positive or negative impact on the HFA's GO resources.	The approach for evaluating forward-looking performance of individual bond programs is detailed in the "U.S. Housing Finance Agency Loan Program Rating Criteria."	Potential single-family or multifamily losses are sufficiently covered by excess indenture assets. The HFA's financial strength does not depend on the performance of its bond programs.	Potential single-family or multifamily losses are narrowly covered by excess indenture assets. The HFA's financial strength may depend on the performance of its bond programs; however, the HFA has over time demonstrated profitability in the individual bond indentures.	Potential single-family or multifamily losses may rely on excess GO funds or, conversely, the HFA's financial strength may depend on the performance of its bond programs.
Mitigating Factors				
Fitch assesses whether there are factors that mitigate any risk related to asset quality of the HFA's bond programs.		Factors are in place to mitigate asset quality portfolio risk, for example, risk sharing agreements and excess reserves are available for construction loans.	Some mitigating factors in place for asset quality portfolio risk.	No mitigating factors in place for asset quality portfolio risk.
Operating Risk				
Operating Profitability				
Assessment of the operating stability of an HFA.	Analysis of existing and contingent liabilities as well as profitability margins.	Operating history demonstrating a stable profile with minimal exposure to contingent liabilities relative to the amount of unencumbered general funds of the HFA. Improving profitability margins compared with historical trends and ratios about the median when compared with performance of other HFA peers.	Operating history demonstrating modest variability with moderate exposure to contingent liabilities relative to the amount of unencumbered general funds of the HFA. Stable profitability margins compared with historical trends and ratios similar to the median when compared with the performance of other HFA peers.	Operating history demonstrating significant variability. Exposure to contingent liabilities that is significant relative to the amount of unencumbered general funds of the HFA. Declining profitability margins compared with historical trends and below the HFA median compared with the performance of other HFA peers.
Programmatic Oversight				
Assessment of the strength of HFA management oversight.	Assessment of management's operating history.	Long-standing HFA with a successful track record of providing and maintaining affordable housing, underwriting loans and providing strong in-house servicing expertise or strong oversight of outsourced servicing. Maintains written board-approved investment policy. Provides monthly financial disclosure.	Long-standing HFA with a successful track record of providing and maintaining affordable housing and underwriting loans. In-house servicing experience or oversight of outsourced servicing. Maintains written board investment policy. Provides monthly or quarterly financial disclosure.	HFAs without a track record of providing and maintaining affordable housing or specific staff dedicated to single-family and multifamily housing. Limited in-house servicing experience or outsourced servicing without oversight. No investment policy in place. Provides annual financial disclosure.
Debt Structure				
Review of the risks present within the debt structure of the bond programs.	Review of debt structure of bond programs.	All outstanding debt fully amortizing and relatively level debt service payments with respective cash-funded debt service reserve funds (DSRFs) typically sized at MADS. Majority of debt limited to housing purposes. Limited or no provisions for the release of excess funds from the bond programs and/or requirement that the programs maintain a certain asset parity ratio. Limited amounts of variable-rate debt outstanding, or, if present, variable-rate debt is efficiently managed.	All outstanding debt fully amortizing and adequate DSRFs. Some debt for other economic development purposes. Restrictions on the release of excess funds from the bond programs. Absent strong liquidity buffers or other mitigating factors, moderate to high amount of variable-rate debt outstanding at no more than 75% of total debt outstanding.	All outstanding debt fully amortizing with a debt service reserve fund sized at less than maximum semiannual debt service. Large percentage of debt for nonhousing-related purposes. No restrictions on the release of excess funds from the bond programs. Absent strong liquidity buffers or other mitigating factors, large percentage of variable-rate debt outstanding that exceeds 75% of total debt outstanding.

Key Rating Factors – HFA General Obligation Ratings

Financial Profile	Relevant Indicators	aa	a	bbb
An assessment of an agency's level of financial flexibility and the quality and stability of an HFA's financial resources.	Financial flexibility evaluated through leverage, capital base, and liquidity position.	HFA with a very low adjusted debt to equity ratio (DTE), from 0.0–4.0x, a consolidated parity ratio exceeding 102% and a leading position in its industry in other capital measures. Demonstrated high levels of reserves and liquidity relative to its loan profile.	HFA with an adjusted DTE from 4.0x–7.0x, a sound position in its industry in other capital measures. Adequate reserve levels relative to its loan profile.	HFA with a high adjusted DTE that is above 7.0x, low capital ratios that are below the industry median. Low reserve amounts relative to loan profile.
Asymmetric Risk Factors		Neutral		Negative
State Transfers		No history of state or other transfer requests from the HFA GO funds, or a transparent, predictable transfer amount that allows for management to prepare and measure available resources.		History of unpredictable (in terms of the amount and timing) state or other transfer requests from the HFA GO funds.

Source: Fitch Ratings

Revenue Defensibility

In the assessment of revenue defensibility, Fitch evaluates an HFA's relative ability to defend and maintain its revenue profile despite challenges in its operating environment. As such, Fitch analyzes the asset quality of an HFA's loan portfolio to determine any potential interruptions to the revenue stream of the HFA.

Asset Quality

Fitch takes a comprehensive approach when determining how an agency's portfolio risks can affect the overall financial health of the HFA and the impact, if any, they have on the HFA's ability to honor its GO pledge commitments. An agency's portfolio risks are measured by analyzing asset quality as well as the agency's loan program's exposure to single-family and multifamily mortgage defaults and losses. Fitch's approach to evaluating asset quality and performance of individual bond programs is detailed in its "U.S. Housing Finance Agency Loan Program Rating Criteria."

Reliance on GO Funds and Mitigating Factors

For bond programs supported by the agency's GO pledge, Fitch evaluates the extent to which potential single-family or multifamily losses would be sufficiently covered by excess indenture assets or would require the use of GO funds. Fitch also considers, even if losses are covered by the individual bond programs, the degree to which the agency's financial strength may depend on the performance of its bond programs. In some cases, the strength of the GO creditworthiness may be tied to the availability of surplus bond program funds for the general operating funds of the agency and could be affected over time by a lack of profitability in the individual bond indentures. Fitch also evaluates factors that mitigate portfolio risk. For example, an HFA with sizable exposure to new construction multifamily projects can mitigate the typical risks associated with the construction cycle by participating in risk-sharing agreements on the construction portion of a project or establishing reserves to cover any delays and subsequent costs that may arise.

Operating Risk

Fitch measures the operational risk of an HFA by analyzing the following: existing and/or expected contingent liabilities; amount and nature of U.S. Department of Housing and Urban Development (HUD) risk-sharing agreements; other types of security arrangements or pledges offered; and the amount and type of non-housing activities supported by the agency. Fitch's approach attempts to quantify the potential monetary commitment that may come from these activities and compares that exposure amount with both the amount of unencumbered

general funds of the HFA and the quality and liquidity of those funds (*for further information, see the Liquidity and Investments section on pages 3–4*).

Fitch also considers the HFA's profitability metrics and ability to manage through housing market downturns (for example, the HFA resources available to maintain loan originations and profitability in a low interest rate environment). Fitch also considers the HFA's ability to manage potential changing government regulations, which may unexpectedly put a class of assets at a higher risk level.

For risk-sharing agreements with HUD, Fitch reviews the HFA's exposure, which is generally 10%–50% of the loss on a loan in the event of default. Fitch reviews the amount of loss exposure the HFA may be responsible for under a worst-case scenario compared with the amount of unencumbered general funds to cover the potential risk. Fitch also reviews the extent to which an HFA is involved in other nonhousing activities. Typically, these programs are related to economic development activities. Some examples of non-housing programs that are part of HFA operations are wastewater and transportation programs. Such nonhousing programs, when performing well, could have a neutral to positive impact on HFA GO resources. However, when experiencing financial stress, these programs could potentially drain the HFA's GO resources. Therefore, Fitch views as a credit positive HFAs that limit involvement in programs not related to their housing mission.

Profitability Margins

The key measures of profitability include net interest spread (NIS; or net interest income as a percentage of total interest income); net operating revenue as a percentage of total revenue; and return on assets or equity. These financial ratios are used to evaluate historical trends for an HFA over time and to compare performance with that of other HFA peers. Because investments and mortgages constitute nearly all of an agency's assets, NIS has a significant influence over profitability. The NIS will be influenced in the short run by the relative amount of short-term assets held as liquid reserves or acquisition funds, as these investments are likely to have lower yields relative to the corresponding debt structure outstanding. NIS is further influenced by the difference among the yield on the program's mortgage portfolio, the cost of its outstanding debt and the relative size of the program's equity base.

Debt Structure Risk

Fitch considers the risks associated with hedged and unhedged variable-rate debt structures when assigning HFA GO ratings. The use of variable-rate debt in bond programs may put more risk on the assets of the agency, depending on interest rate fluctuations, hedging activities, counterparties involved in the transactions and the degree to which the debt is supported by the agency's GO pledge.

Fitch reviews any potential stresses on the individual bond programs related to the variable-rate debt, including increased interest costs, accelerated amortization schedules and/or increased fees related to swap terminations and collateral posting stipulations. Fitch assesses whether those costs would be sufficiently covered by the resources in a bond program and at what point they would start to affect the agency's profitability if the accelerated payments are HFA GOs.

Since HFA issuers are typically higher rated credits in the 'A' to 'AA' range, Fitch believes they should have opportunities to obtain bank liquidity on favorable terms and/or terminate swaps and refinance their VRDBs with fixed-rate obligations. However, these options come at a cost, given the potential impact on the spread between the existing rates on the revenue-generating mortgage assets and the bond interest rates paid within bond programs. Fitch evaluates the extent to which these additional costs could be covered by program resources or, rather, would fall to the agency's GO if the bonds are supported by the GO pledge. Fitch also considers the potential impact on the agency's profitability over time.

Programmatic Oversight

As part of the Operating Risk assessment, Fitch evaluates the level of programmatic oversight the agency provides. An agency with strong oversight often can identify and provide a timely response to programmatic, financial or economic problems before they diminish credit quality or threaten an agency's overall financial position.

In evaluating an HFA's programmatic oversight, Fitch conducts a qualitative assessment of several factors. These include the HFA's board participation and review; personnel experience, continuity and track record; program design, execution and oversight related to single-family loan servicing; management information systems; and financial operations. Additionally, monthly, or at least quarterly, financial disclosure to a website allowing investors to review portfolio and bond performance is a positive credit attribute.

Some of the HFAs provide internal servicing for all or a portion of the loans in their single-family portfolios. Through internal servicing, HFAs have the ability to maintain a greater degree of control over their loan portfolios. An oversight entity with a history of early intervention to manage potentially troubled loans and experience providing workout solutions to avoid delinquencies and foreclosures is regarded as a credit strength.

On the multifamily side, Fitch looks to the HFA to monitor multifamily developments' compliance with HUD or other insurance provider requirements so that insurance and/or subsidies are not interrupted in the case of insured and subsidized loans. As part of its review, Fitch will ask the issuer to verify whether any of the properties that are HUD-insured or benefit from HUD subsidies have received notification letters indicating noncompliance. Additionally, if the property ownership changes, Fitch looks to the oversight entity to have procedures in place to ensure that any subsidy is not interrupted throughout the transfer process. Fitch views the presence of these HFA procedures as a credit positive and their absence as an attribute of a weaker HFA.

Given the use of variable-rate debt issued by HFAs and the varying degrees of complexity evident in these instruments, a management team that has demonstrated success working with variable-rate debt in the past and is aware of the risks inherent in such instruments and the potential impact they can have on their programs and profitability levels is viewed as a credit strength. Fitch also views positively HFAs that adhere to a written variable-rate bond and swap policy that sets limits regarding these items.

Fitch meets regularly with all rated HFAs to review the agencies' future financial and programmatic plans. Fitch evaluates each HFA's ability to adapt to challenges and remain forward-looking as reflected in its outlined strategies and discusses the financial aspects of those plans. These discussions may influence Fitch's oversight evaluation and when an HFA takes a proactive approach, it may be viewed as a credit positive.

Financial Profile

HFAs have a long history as frequent issuers of debt and manage generally large (billion-dollar) asset and liability portfolios, over which they can usually exercise some control regarding financial resources or excess funds. As a result, most agencies have developed at least a moderate degree of net worth and can allocate resources across individual indentures and programs, should the need arise. The key ratios that Fitch uses for assessing HFA financial resources focus on three main areas: leverage, capital, and liquidity. Fitch's financial review involves three specific items: the HFA's audited financial statements, reserve funds and investment portfolio.

The quantitative measures used in Fitch's analysis of an HFA are used as relative measures rather than absolute determinants of credit quality. Moreover, financial statement presentations differ among agencies, making some comparisons among HFAs subject to a slight degree of distortion. Additionally, adjustments are needed to eliminate functions included in the financial statements for which an agency is serving only in a custodial capacity for the state government or that are independent from the agency's ongoing programs. Typically, these are state or federal grant programs administered by the HFA solely as a fiscal agent or, in some cases, as a mortgage insurance provider for the agency's loan programs (see "U.S. State Housing Finance Agencies: Mortgage Insurance or Guarantee Fund Program Criteria," available on Fitch's website).

HFAs that use bond proceeds to purchase mortgage-backed securities, rather than whole loans, and/or invest reserves in long-term obligations can have operating results that vary widely from year to year as interest rates fluctuate. The Governmental Accounting Standards Board (GASB) statement 31 stipulates that the accounting and financial reporting for certain investments and for external investment pools be reported at fair value. For this reason, Fitch reviews an HFA's

financial results both as reported and after eliminating the GASB 31 adjustment so that historical operational trends and peer analysis can be consistently compared.

Leverage

Fitch reviews an HFA's leverage by assessing its debt to equity ratio (DER) on a reported and adjusted basis. The HFA's reported DER is a measure of the total bonds and notes payable, commercial paper (CP) outstanding and obligations under repurchase agreements, as well as other debt arrangements, divided by total equity (or the net assets of the HFA). The lower an HFA's DER, the stronger its financial position. On an adjusted basis, equity is assessed, excluding material non-earning assets such as deferred issuance costs. Deferred issuance costs are sunk costs that are amortized and result in reduced capital accumulation. For Fitch's analysis, these costs are treated as an immediate capital charge. Most other nonfinancial assets are not material enough to warrant consideration. Equity may also be reduced for any custodial programs and, if relevant, for significant independent mortgage insurance functions.

Capital Base

Fitch reviews an HFA's capital base by calculating the ratio of revenue-producing assets (cash, investments, receivables and mortgages) to total debt outstanding. This ratio serves as a proxy for a consolidated parity ratio and typically exceeds 102% for the assignment of high investment-grade ratings to an HFA GO pledge. Fitch uses this ratio as a relative measure among similar agencies and in conjunction with the net spread between the return or yield on the included assets and the agency's overall cost of debt. Generally, the wider the spread between these two items, the less need for excess assets or overcollateralization. Alternatively, in the case when an HFA uses its equity to reduce single-family mortgage rates to help qualify lower income households, spreads may be narrower, creating the need for overcollateralization.

While the majority of HFA assets are largely held within an HFA's individual bond programs, the remainder often resides in an HFA's general fund. Fitch reviews the general fund of the HFA for its amount relative to the amount of GO debt outstanding and for the composition of the investments with a specific focus on liquidity. Fitch also reviews the mechanisms in place for accessing excess funds within each individual bond program to verify that these funds can be made available if needed.

Liquidity and Investments

As part of the financial profile review, Fitch analyzes overall liquidity needs for HFAs. For the general fund and all funds combined, an HFA's liquidity is measured primarily in terms of total investments as a percentage of assets and net available investments (total investments less payables, notes, CP and other short-term debt outstanding). The investments' weighted average maturity, as well as market and credit risks, is also considered, as discussed below.

Often, an HFA will create its own CP program to fund the warehousing of single-family mortgage loans and will seek a short-term GO rating, which can be assigned in conjunction with a long-term GO rating or on a stand-alone basis. Fitch assesses the internal liquidity position of an HFA in accordance with the "Public Sector, Revenue-Supported Entities Rating Criteria" as specified in Appendix B – Short Term Debt Rating Criteria. For more information on how Fitch assesses external liquidity support, see "U.S. Public Finance Variable-Rate Demand Obligations and Commercial Paper Issued with External Liquidity Support Rating Criteria." When Fitch reviews the liquidity position of an HFA that employs a CP program, Fitch nets out the outstanding amount of CP from the total assets securing the GO pledge.

Funds held within specific bond programs' debt service reserve funds, acquisition accounts and float funds are typically invested by HFAs until such funds are needed. Since the preservation of these funds is important to bondholder security, Fitch reviews the investments within rated bond programs using the guidelines in its "U.S. Housing Finance Agency Loan Program Rating Criteria," as specified in Appendix A: HFA Single-Family Loan Programs and Appendix C: HFA Pooled Multifamily Loan Programs. HFAs also invest general funds that are set aside to secure the GO pledges and back any potential contingent liabilities. Unencumbered general funds are reviewed for quality, and investments are subject to the aforementioned Fitch criteria. HFAs that receive high investment-grade ratings on their GO pledge typically maintain a written, board-approved investment policy.

Financial Profile Assessment

	Debt-to-Equity Ratio (Five-Year Average)
aa	0–4.0x
a	4.0x–7.0x
bbb	7.0x+

Source: Fitch Ratings

Asymmetric Risk Factors

An HFA's ongoing relationship with the state's executive and legislative branches is considered when assessing the agency's ability to maintain excess funds in its general fund. State governments have periodically requested various amounts from their respective HFA's excess funds. That risk is assessed by reviewing historical evidence of any state funding transfers from the HFA, which, if deemed material in limiting their public purpose mandate, may constrain the rating. These transfers, depending on the amount and timing, may have an immediate and negative effect on an agency's overall creditworthiness. The risk of transfer may be partially mitigated if the transfer amount is tied to an agency's profitability metric, thereby providing a transparent means for the HFA to measure its available resources over time.

Surveillance

This criteria report is used both to assign new ratings as well as for surveillance of HFAs' IDRs and GO-backed ratings. Fitch generally reviews HFA information on an annual basis.

Changes potentially warranting a more frequent Fitch review include:

- new GO debt issued or adoption of a new bond program;
- new program inherited from the state or state mandate to fund and/or manage a new program; and
- request from the state for excess agency funds.

Rating Assumption Sensitivity

HFA GO bond ratings are subject to positive or negative movement based on financial performance, risk profile and state transfer obligations. Below are primary sensitivities that can influence GO creditworthiness:

- **Financial Performance:** Deterioration in financial performance of an HFA's general fund and/or bond programs can, over time, potentially erode the agency's available equity and put negative pressure on the GO rating.
- **Risk Profile Changes:** Significant long-term changes in the risk profile of an HFA's bond programs, including to the portfolio composition of assets, to operational risk and/or to debt structure, could put negative/positive pressure on the GO rating.
- **State Transfers:** Loss of GO equity through state transfers may weaken or restrict growth in reserve accounts, which could negatively weigh on an HFA's GO rating.

Data Sources

Fitch's key rating assumptions described in this report are based on analysis of documents from HFAs; publicly available information and data; financial information received from issuers, arrangers, underwriters, consultants and other third parties; and Fitch's analytical judgement.

In addition, the data sources Fitch uses in assigning ratings include audited financial statements of the HFA and program data provided by the issuer, including program reserve funds and investments.

Variations from Criteria

Fitch's criteria are designed to be used in conjunction with experienced analytical judgment exercised through a committee process. The combination of transparent criteria, analytical judgment applied on a transaction-by-transaction or issuer-by-issuer basis and full disclosure via rating commentary strengthens Fitch's rating process while assisting market participants in understanding the analysis behind our ratings.

A rating committee may adjust the application of these criteria to reflect the risks of a specific transaction or entity. Such adjustments are called variations. All variations will be disclosed in the respective rating action commentaries, including their impact on the rating where appropriate.

A variation can be approved by a ratings committee where the risk, feature or other factor relevant to the assignment of a rating and the methodology applied to it are included within the scope of the criteria, but where the analysis described in the criteria requires modification to address factors specific to the particular transaction or entity.

Limitations

Ratings, including Rating Watches and Outlooks, assigned by Fitch are subject to the limitations specified in Fitch's Ratings Definitions page of its website at www.fitchratings.com/esg.

Appendix

Definitions of Financial Measures for HFAs

Strength	Description
Adjusted Debt to Equity	Short- and long-term debt divided by total equity (equity defined as the net assets of the SHFA) less any material non-earning assets (for example, deferred debt-financing costs).
Debt to Equity	Short- and long-term debt divided by total equity.
Net Income	Total revenue less total expenses and any additional dividends/transfers and/extraordinary loss/gain.
Net Interest Income	Investment and mortgage interest revenue less interest expense.
Net Interest Spread	Net interest income as a percentage of total interest income.
Net Operating Revenue	Total operating revenue less total operating expenses before extraordinary items.
Net Operating Revenue as % of Total Revenue	Net operating revenue divided by total revenue.
Operating Expenses	General and administrative, mortgage loan servicing fees, amortization of debt issuance and all other (non-interest) expenses.
Return of Average Assets	Net income (exclusive of any extraordinary gain/loss) as a percentage of average assets.
Return on Average Equity	Net income (exclusive of any extraordinary gain/loss) as a percentage of average total fund equity.
Revenue-Producing Assets to Debt	Cash, investments and total loans divided by total debt.

Source: Fitch Ratings

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