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CREDIT OPINION
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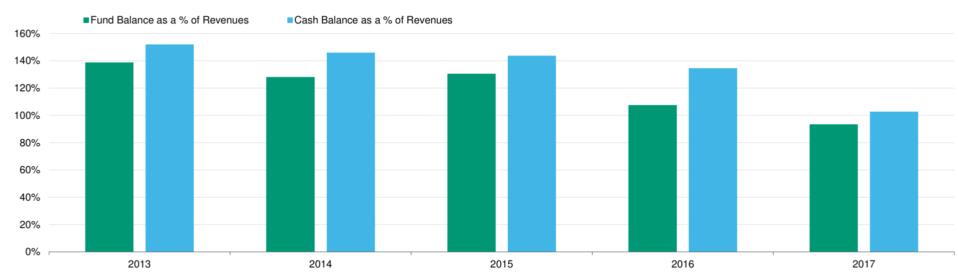
Port of Houston Authority (Harris County), TX

Update to credit analysis

Summary

Port of Houston Authority's, TX (Aaa) credit profile is anchored by its strong market position complemented by a port that enjoys a position as first in the nation for foreign waterborne tonnage, and second in terms of total tonnage. The authority's tax base being coterminous with Harris County (Aaa stable) is expansive, supported by the robust and vibrant Houston (Aa3 stable) economy, and continues to grow at a steady pace. However the pace of growth could be tempered in the next two to three years as the area rebuilds from the impact of Hurricane Harvey which made landfall in August 2017. Operating performance is solid with multiple years of surplus operations in spite of continued reinvestment in the authority's facilities yielding a high level of reserves. The authority's debt and pension profiles are also low, and not expected to be a source of pressure within the next five to 10 years. The authority's capital plan is extensive with a high degree of focus on system reinvestment that could require debt issuance in the next three to five years. High debt issuance if not managed properly, could challenge the credit profile, although we do not expect that given the unlimited tax nature of the pledge and the authority's adept management team.

Exhibit 1
Liquidity has consistently exceeded 80% of revenues over the past five years



Unrestricted net position used as a proxy for fund balance
Cash balances reflect current and noncurrent unrestricted cash and investments
Source: Port of Houston Authority, TX Comprehensive Annual Financial Reports FY 2013 - 2017

Credit strengths

» Large and expansive tax base supported by strong local economy that is nationally important

» History of strong operating performance yielding a high level of reserves

» Low debt and pensions

» Houston is the hub port for the US Gulf Coast and benefits from diverse cargo segments with balanced trade flows

Credit challenges

» Capital needs could require sizeable debt issuance

» Long-term limitations on channel depth could prove a challenge

Rating outlook

Moody's does not generally assign outlooks to local governments with this amount of debt outstanding.

Factors that could lead to an upgrade

» Not applicable

Factors that could lead to a downgrade

» Sizeable tax base contraction

» Material reduction in reserves, restricting the authority's financial flexibility

Key indicators

Exhibit 2

Port of Houston Authority, TX	2013	2014	2015	2016	2017
Economy/Tax Base					
Total Full Value ($000)	$279,467,968	$303,771,932	$337,271,273	$376,944,565	$409,383,647
Population	4,182,285	4,269,608	4,356,362	4,434,257	4,434,257
Full Value Per Capita	$66,822	$71,147	$77,420	$85,007	$92,323
Median Family Income (% of US Median)	93.6%	94.1%	94.2%	93.9%	93.9%
Finances					
Operating Revenue ($000)	$233,673	$263,897	$293,736	$290,226	$332,873
Fund Balance ($000)	$324,466	$338,127	$383,422	$312,363	$311,127
Cash Balance ($000)	$355,232	$385,248	$422,184	$390,790	$341,899
Fund Balance as a % of Revenues	138.9%	128.1%	130.5%	107.6%	93.5%
Cash Balance as a % of Revenues	152.0%	146.0%	143.7%	134.7%	102.7%
Debt/Pensions					
Net Direct Debt ($000)	$717,778	$702,596	$674,562	$658,382	$639,333
3-Year Average of Moody's ANPL ($000)	$51,262	$54,386	$67,059	$100,074	$83,184
Net Direct Debt / Full Value (%)	0.3%	0.2%	0.2%	0.2%	0.2%
Net Direct Debt / Operating Revenues (x)	3.1x	2.7x	2.3x	2.3x	1.9x
Moody's - adjusted Net Pension Liability (3-yr average) to Full Value (%)	0.0%	0.0%	0.0%	0.0%	0.0%
Moody's - adjusted Net Pension Liability (3-yr average) to Revenues (x)	0.2x	0.2x	0.2x	0.3x	0.2x

Unrestricted net position used as a proxy for fund balance
Cash balances reflect current and noncurrent unrestricted cash and investments
Source: Port of Houston Authority, TX Comprehensive Annual Financial Reports FY 2013 - 2017, Moody's Investors Service

Profile

Port of Houston Authority is a navigation district that was originally constituted in 1911. The port has been a deep draft port since 1914 and consists of the authority's publically owned terminals, as well as more than 150 privately owned wharves, docks and other facilities. The port (including facilities not owned by the authority) is ranked first in the nation for foreign waterborne tonnage, and second in terms of total tonnage. As of December 31, 2017, the authority had 620 regular employees.

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Detailed credit considerations

Economy and tax base: expansive tax base supported by vibrant local economy; port continues to maintain strong competitive edge

The authority's tax base, which is coterminous with Harris County, should remain stable in the next five to 10 years, guided by a robust and continually diversifying economy and strong assessed valuation growth. Harris County is anchored by the City of Houston, and the authority's sizeable $425.8 billion tax base as of fiscal 2018 has grown by more than 40% over the past five years. As a regional economy that benefits from a world-leading oil and gas hub, a significantly expanding health care sector, as well as port operations, the local economy continues to enjoy residential and commercial demand, and is poised to continue to grow. In the near term, the authority is vulnerable to weather related events given their location on the gulf coast such as Hurricane Harvey, which made landfall in August 2017. However, the impact is expected to be minimal and temporary, and not alter the long term economic trajectory. Preliminary estimates from the appraisal district reflect a 2.8% increase in assessed values in fiscal 2019. Although positive, the growth is at a smaller pace compared to the prior year which showed a 4% increase. Major taxpayer concentration is minimal with the top 10 taxpayers accounting for 4% of assessed values in fiscal 2018.

The county has enjoyed favorable in-migration trends with population growing by over 6% since 2010 to reach 4.5 million residents. Income indicators at 94.2% of the nation remain weaker than the Aaa median. However, this is predominantly offset by the relatively low cost of living in the region. The county's unemployment rate in March 2018 was 4.7%, higher than the state and nation's 4.1%.

Port of Houston Authority maintains a strong market position complemented by a port (including facilities not owned by the authority) that is ranked first in the nation for foreign waterborne tonnage, and second in terms of total tonnage. The authority operates a large number of authority owned wharves and works in conjunction with a considerable number of privately owned wharves. The bulk of facilities are located on the Houston Ship Channel that extends 52 miles inland and connects the City of Houston with the Gulf of Mexico. Authority operated or leased facilities include terminals handling general cargo, autos, containers, grain, other dry bulk materials, project and heavy lift cargo, and essentially any other type of cargo.

Houston was the seventh-largest US container port in 2017, and is the load center for the US Gulf Coast with more than two thirds of Gulf Coast container volume in 2017. Houston is also one of the fastest growing US container ports, with container volume (twenty-foot equivalent units or “TEUs”) that has grown at a compound annual rate of 6% over the five years from 2013 to 2017. Growth will remain supported by the recent expansion of the Panama Canal, which has allowed ocean carriers to deploy much larger and more efficient vessels on services to Houston. The upsizing of vessels calling the port will continue to result in the authority recapturing or handling new cargo volumes that would have previously moved through Southern California or the Southeast. Regionally the port is very well positioned, with by far the largest local population and comparable or superior infrastructure relative to alternate Gulf Coast ports. Import demand will remain buoyed by the large and growing regional population that Houston serves, while the port is also poised to benefit from the growing petrochemical production in Texas and along the Gulf Coast. The growth of plastics/resins production is just beginning to ramp up and will create large volumes for export in the years ahead, which Houston is well positioned to serve as it has the most vessel service, capacity and available container supply of Gulf Coast ports. Break bulk and bulk cargo volumes also continue to benefit from the growth of US onshore oil and gas production, and the widening of the Panama Canal has opened access to new export markets in Asia and South America. The authority faces a potential long term constraint on growth with its channel depth at 46.5 feet, but we expect the authority's strong market position and robust service area demand will continue to support positive operating performance.

Financial operations and reserves: strong operating performance drives healthy reserve levels

The authority's solid operating performance should remain favorable supported by heavy reinvestment into port facilities that will contribute to its strong competitive edge with a strategic location on the gulf, and expected steady operating performance over the next three to five years. Within the past six years (fiscal 2012 through 2017), the authority's revenue performance has consistently exceeded expenditures, largely due to strong vessel and cargo services, which account for almost 80% of revenues. During that time frame, the net asset position increased 38.8% to $1.4 billion in fiscal 2017. Net current assets at $372.6 million in fiscal 2017 remained relatively stable also during that period, despite reduced cash in some years for capital needs, in line with the authority's plan of reinvesting into its facilities with cash where applicable.

In fiscal 2017, which ended on December 31, 2017, the authority reported a $71.8 million operating surplus, driven by strong gains (15.9%) in vessel and cargo services and excluding property tax revenues. Unrestricted net assets, a proxy for fund balance, of $311.1 million (a solid 79.5% of revenues) at fiscal year end, was relatively stable compared to the prior year. Authority officials report that fiscal 2018 year to date results reflect increases in container and Turning Basin terminals, and steel tonnage, although the gains are tempered by decreased revenues related to auto tonnage. Expenditures are tracking slightly higher than the prior year but the authority's current net income is 11% higher, compared to the prior year. Authority officials anticipate another positive year at fiscal year end.

Hurricane Harvey is expected to have a minimal financial impact on the authority. Damage to the authority's property and facilities (excluding dredging) is estimated to be below its insurance deductible of $250 thousand. The authority has filed a claim with the Federal Emergency Management Association (FEMA) for reimbursements. Costs for additional dredging for shoaling and debris removal are estimated to cost several millions of dollars but accurate figures are not available at the current time. The work is likely to undertaken by the Army Corps of Engineers who routinely performs maintenance dredging for the authority under contract. In any event, FEMA is expected to cover between 75% and 90% of the costs related to Harvey.

LIQUIDITY

The authority maintains a strong cash position with unrestricted cash totaling $341.9 million equal to 103% of operating revenues, excluding property tax revenues.

Debt and pensions: modest debt and pensions ratios

The authority's debt profile is modest and will remain affordable over the long term given continued anticipated growth in assessed values, although debt issuance is possible within the next three to five years. The direct debt burden is a minimal 0.1% and increases slightly to 0.2% overall as of the fiscal 2018 valuation. The current debt service levy is a minimal $0.13 per $1,000 of assessed values. The authority has no authorized unissued debt and does not currently have a plan to call for a bond election within the next 12 months. However the authority maintains a capital improvement plan that projects needs that average $238.1 million over the next three years. Significant projects under the horizon include dredging and expanding facilities to increase the port's capacity. Authority officials anticipate a huge portion of the needs will be funded with cash but may seek debt authorization, depending on the timeline for the projects.

DEBT STRUCTURE

All of the authority's debt is fixed rate. Following the June 2018 refunding, the debt service schedule is relatively flat at approximately $50 million through fiscal 2022, before decreasing to a little over $45 million and remaining steady through fiscal 2026. In fiscal 2027, the debt service increases to $46.3 million and remains relatively flat through 2038, before a $34.6 million final maturity payment in fiscal 2039.

DEBT-RELATED DERIVATIVES

The authority is not party to any derivative agreements.

The authority has established a senior lien note program with Bank of America N. A. (Aa3 stable) that authorized the authority to borrow up to $300 million. There are currently no notes outstanding and the authority has not drawn on the agreement since inception. Under the agreement, the notes are secured by a first lien and pledge on the net revenues of the authority and the funds and accounts pledged under the master resolution and the first supplemental resolution. In the event of a default, the notes can be accelerated. The commitment expires on September 2018.

PENSIONS AND OPEB

The authority sponsors the Port of Houston Authority Restated Retirement Plan, a single employer defined benefit plan covering eligible employees hired prior to August 1, 2012; all employees hired afterwards are on a defined contribution plan. On September 14, 1997, the authority adopted a funding policy that prescribed a contribution equal to 100% of the actuarially determined amount. The funding policy was revised on July 28, 2015 to allow flexibility to fund the plan throughout the year for an aggregate amount not to exceed 105% of the amount calculated by the actuary; this policy also applies to the other post employment benefits (OPEB). For the year ended February 28, 2017 the authority made $9.6 million in pension contributions, which was 231.8% of our "tread water" indicator, the contribution amount at which Moody's has determined there would be no increase in unfunded liability, based on reported assumptions.

In fiscal 2017, the authority reported an unfunded liability of $10.3 million, which increases to $83.2 million based on our adjustments under our pension methodology. The three-year average Moody's adjusted net pension liability (ANPL) was $83.4 million, equal to 0.3 times operating revenues in fiscal 2017 or a minimal 0.02% of full value. Moody's ANPL reflects certain adjustments we make to improve comparability of reported pension liabilities. The adjustments are not intended to replace the authority's reported liability information, but to improve comparability with other rated entities.

The authority offers OPEB to its retirees in the form of health and welfare benefits. The plan has historically been funded on a pay as you go basis. In fiscal year 2017, the authority contributed $9.5 million compared to the annual OPEB cost of $5.3 million. As of January 1, 2017, the actuarial accrued liability was $68.9 million with $53.1 million in accrued assets, resulting in an unfunded actuarial accrued lability of $15.8 million.

The authority's fixed costs (pension, OPEB contributions and annual debt service) were $68.2 million, or a manageable 20.5% of operating revenues, exclusive of property taxes.

Management and governance: legally distinct entity from Harris County

The authority is a legally distinct entity, governed by a 7 member Port Commission. Commissioners are appointed by Harris County and the City of Houston (2 appointees each), City of Pasadena (rated Aa2, 1 appointee) and the Harris County Mayors' and Councils' Association (1 appointee). The City of Houston and Harris County jointly appoint the authority's chairman. Despite the authority's legal autonomy in operational matters, both the authority and the county must approve all authority bond issues. The county sets the authority's tax rate upon consultation with the authority as to debt service requirements and property taxes are collected on behalf of the authority by the Harris County Tax Assessor-Collector. The county's treasurer acts as Treasurer of the Port as well and holds property tax receipts, which can only be used for G.O. debt service.

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