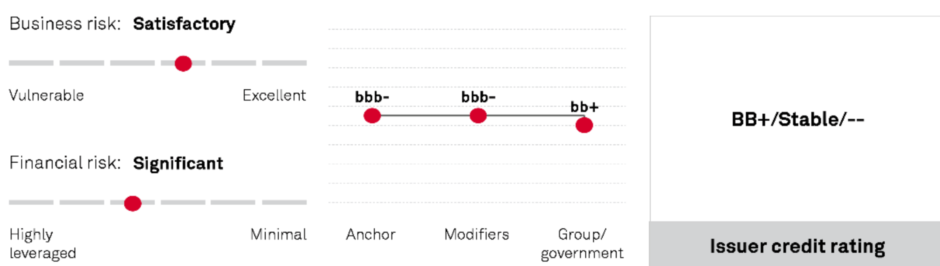
S&P Global
Ratings

Research

ISAGEN S A. E.S.P.

May 18, 2022

Ratings Score Snapshot



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Credit Highlights

Overview

Key strengths	Key risks
Growth strategy based on clean energy--mostly solar and wind--and in line with Brookfield Renewables' investment plan.	Exposure to the risk of Colombia's downgrade because ISAGEN operates only in that country.
Low maintenance investments in existing assets and no exposure to construction risk for newly acquired assets.	Hydrological conditions and spot market prices can affect the company's cash flows.
A diversified client base with a consolidated delinquency rate of only 0.3%.	

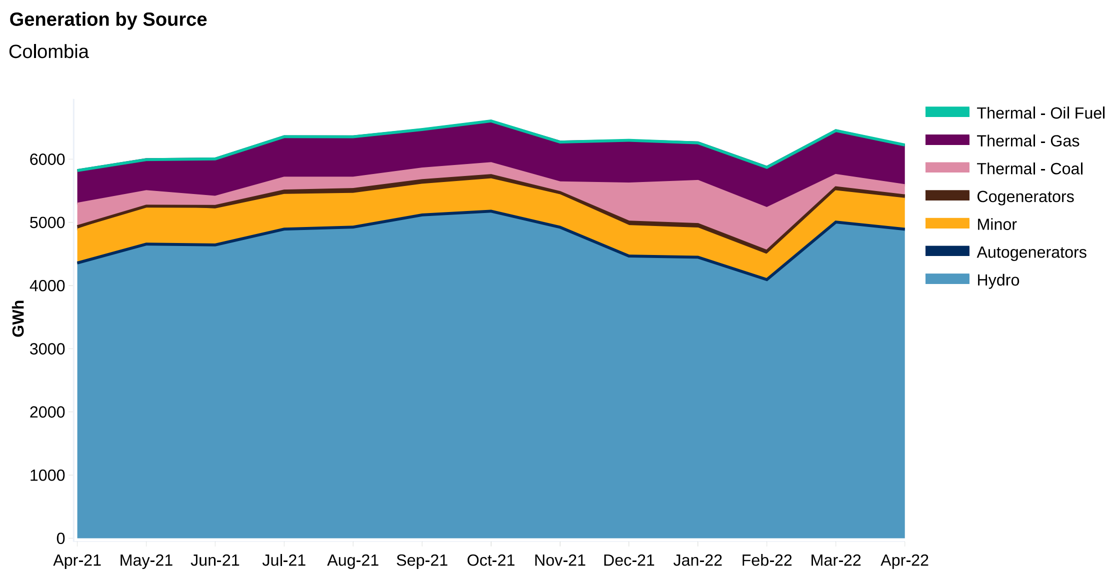
Resilient metrics amid demand recovery in Colombia. In 2021, ISAGEN was the second-largest generator in the country with total output of 16,434 gigawatt hours (GWh), which represented 22% of the nation's demand. At the end of 2021, the company had 16 generating plants with installed capacity of 3,187 megawatts (MW). The company sells 71% of its output through contracts with an average duration of five years or more. ISAGEN's revenue grew 8.4% in 2021, while EBITDA increased 25% and EBITDA margin to 64.5% from 56.1%, mainly reflecting a 32% growth in energy generated that year due to a strong demand recovery and lower spot energy purchases due to better hydrological conditions. According to Colombia's Integrated National System operator, demand grew 4.71% in April 2022 year over year (YoY). That increase consisted of the 2.35% rise among residential and small retail users, and 9.13% among large industrial and commercial ones, given the post-pandemic recovery.

The "La Niña" phenomenon helped. As of May 17, 2022, aggregate reservoir levels stood at 68% (compared with 67% in May 2021) and average water inputs were 99.19%. We expect that better hydrology than in past years will lower the company's spot energy purchases, improving its cash flows and margins. In our view, ISAGEN will continue benefiting from Colombia's strong regulatory framework, low maintenance investments in existing assets, and no exposure to construction risk for acquired assets, because the EPC contractor is responsible for it. Due to these factors, we forecast debt to EBITDA of about 3.0x and funds from operations (FFO) to debt close to 23% in 2022 and 2023.

Conservative commercial strategy has helped the company weather periods of volatile rainfall volumes. About 91% of ISAGEN's operating portfolio consists of hydro based plants, underscoring its heavy reliance on rainfall, which has been more volatile in the past five years. In response, the company's strategy is to sell about 70% of its available electricity through contracts with terms averaging five years and to keep the remainder. This provides a cushion to absorb rainfall volatility, reducing the likelihood of purchasing electricity to honor the existing contracts.

Acquisitions to further diversify into cleaner energy, which is in line with its shareholder's strategy. We expect ISAGEN to expand its output through renewable energy, including unconventional sources (solar and wind). This strategy is consistent with that of its parent, **Brookfield Renewable Partners L.P.** (BBB+/Stable/A-2). ISAGEN has already acquired the 39.8 megawatt (MW) hydro plants Luzma I and Luzma II (19.9 MW each) in the province of Antioquia in Colombia. The plants are fully operational and have been under ISAGEN's management since Feb. 27, 2021. In November 2021, ISAGEN acquired a portfolio of seven run-of-river hydro plants, with a total capacity of 149 MW, located in the Antioquia province. These assets are already operational and should benefit from synergies with the other hydro plants that ISAGEN owns in the region. Additionally, the company expects to add capacity with the finalization of the construction of:

- A 20 MW wind farm Guajira I, expected to start operating by the third quarter of 2022;
- A 12 MW wind farm Wesp 01, expected to start operating by the third quarter of 2022;
- The 37.8 MW solar plants--Llanos 4 (19. MW) and Llanos 5 (17.9 MW)--expected to be operational by the second quarter of 2022; and
- A 100 MW solar portfolio Sabanalarga, expected to start operating in the third quarter of 2023.



Source: XM & S&P Global Ratings

Outlook

The stable outlook on the company for the next 12 months reflects on the one on the sovereign and our expectation that ISAGEN will maintain its conservative commercial strategy, with the majority of its output sold through contracts, while maintaining the remainder for adverse hydrological conditions. We expect debt to EBITDA to remain at 2.5x-3.0x and FFO to debt at 20%-25%, while ISAGEN upstreams excess cash to its shareholders – on average of COP500 million.

Downside scenario

We could take a negative rating action on ISAGEN in the next 12 months in case of a downgrade of Colombia. A downward revision of ISAGEN's stand-alone credit profile (SACP) is unlikely, unless the company adopts a more aggressive commercial strategy, or repays its intercompany loan from its parent at a faster pace, impairing its financial flexibility. This could result in debt to EBITDA consistently above 4.0x or its FFO to debt below 20%.

Upside scenario

We don't believe that a positive rating action is likely in the coming 12 months, given that our rating on Colombia limits the one on ISAGEN. We could revise the SACP upwards if ISAGEN posts debt to EBITDA below 2.5x and FFO to debt above 30% on a consistent basis, if the company is able to sign attractive power contracts, bolstering average sales prices.

Our Base-Case Scenario

Assumptions

- Colombia's GDP to grow 4.6% in 2022, 3.0% in 2023, and 3.2% in 2024, raising the country's electricity demand.
- Inflation to be about 7.1% in 2022, 3.4% in 2023, and 3.1% in 2024, which influences the readjustment of the power purchase agreements (PPAs).
- Electricity sales of about 17,000 GWh annually, the majority of which will be through contracts at an average price of about COP250 per kilowatt hours (kWh).

- Cost management, and selling, general, and administrative expenses (SG&A) to grow below inflation rate in 2022 and 2023.
- Expansionary investments of about COP401 billion in 2022 and COP187 billion in 2023.
- Maintenance investments of about COP69 billion in 2022 and COP67 billion in 2023.
- Dividend distribution of 100% of previous year's net income, which was allocated to investment reserves.

Key metrics

ISAGEN S.A. E.S.P. -- Key Metrics*

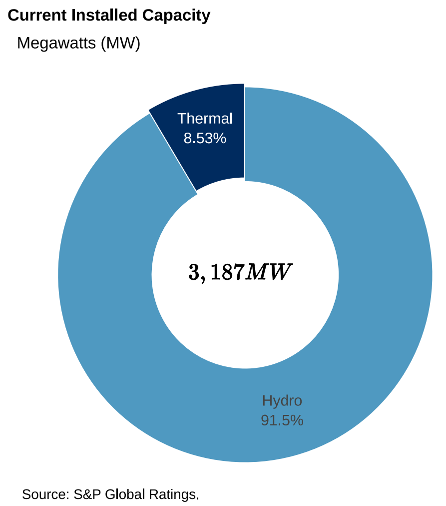
Bil. COP	2021a	2022e	2023e	2024e
Electricity generation (GWh)	16,434	16,500-17,000	16,500-17,000	16,500-17,000
EBITDA	2,245	2,500-2,600	2,600-2,700	2,600-2,700
EBITDA margin	64.5	65-70	65-70	65-70
Capital expenditure	2,281	400-500	200-300	50-100
Debt to EBITDA (x)	3.2	2.8-3.2	2.5-3.0	2.5-3.0
FFO to debt (%)	23.8	20-25	20-25	20-25
EBITDA interest coverage (x)	5.9	3.0-4.0	3.0-4.0	3.0-4.0

*All figures adjusted by S&P Global Ratings. a--Actual. e--Estimate. f--Forecast.

We expect ISAGEN's margins to benefit from lower spot energy purchases due to better hydrology conditions in 2022. Lower fuel and operating costs, and higher contract pricing in the regulated market should also lift the company's margins. We expect its credit metrics to remain in line with our expectations--debt to EBITDA of about 3.0x and EBITDA interest coverage close to 4.0x in 2022 and 2023. We also forecast the company's cash flows to remain resilient because of its strategy to maintain part of its available electricity for sale in order to hedge against rainfall volatility in Colombia.

Company Description

Colombia-based electric power generation company ISAGEN has 16 power plants with a total installed capacity of 3,187 MW (2,915 MW in hydro and 272 MW in thermal). As of Dec. 31, 2021, ISAGEN's revenue was COP3.4 trillion and EBITDA of COP2.2 trillion.



We expect ISAGEN to continue to expand its portfolio by incorporating unconventional renewable sources of electricity as the new projects start operating. However, the company's portfolio will remain mainly highly hydro-based for the next couple of years. Brookfield Renewables is ISAGEN's indirect controlling shareholder with a 99.63% stake. Brookfield Renewables owns and operates a diversified portfolio of assets that produce electricity from renewable resources, primarily hydropower (about 66%). Its portfolio has a total generation capacity of more than 20 gigawatts (GW) with a development pipeline of about 31 GW. The company's long-term average proportionate annual generation is about 30 terawatt hours across 27 power markets in 17 countries.

Peer Comparison

For regional peers, we chose a domestic competitor, Emgesa S.A. E.S.P., two companies in Chile (Engie Energia Chile S.A. and Colbun S.A.), and one company in Brazil, CESP – Companhia Energetica de Sao Paulo. We believe these companies are very similar to ISAGEN in terms of business activities and competitive position in their markets, given their sizes and price competitiveness. In terms of credit metrics, ISAGEN is comparable to Colbun because they're in the same financial risk profile category, while Emgesa has slightly better credit metrics than ISAGEN. Although CESP compares well in terms of credit metrics, our lower rating on it reflects the sovereign ratings cap.

ISAGEN, S.A. E.S.P.--Peer Comparisons

	Isagen S.A. E.S.P.	Enel Colombia S.A E.S.P.	Engie Energia Chile S.A.	Colbun S.A.	CESP-Companhia Energetica de Sao Paulo
Foreign currency issuer credit rating	BB+/Stable/--	BBB-/Stable/--	BBB/Stable/--	BBB/Stable/--	BB-/Stable/--
Local currency issuer credit rating	BB+/Stable/--	BBB-/Stable/--	BBB/Stable/--	BBB/Stable/--	BB-/Stable/--
Period	Annual	Annual	Annual	Annual	Annual
Period ending	2021-12-31	2021-12-31	2021-12-31	2021-12-31	2021-12-31
Bil.	COP	COP	COP	COP	COP
Revenue	3,482	4,727	6,015	5,857	1,674
EBITDA	2,245	2,955	1,274	2,116	615

ISAGEN, S.A. E.S.P.--Peer Comparisons

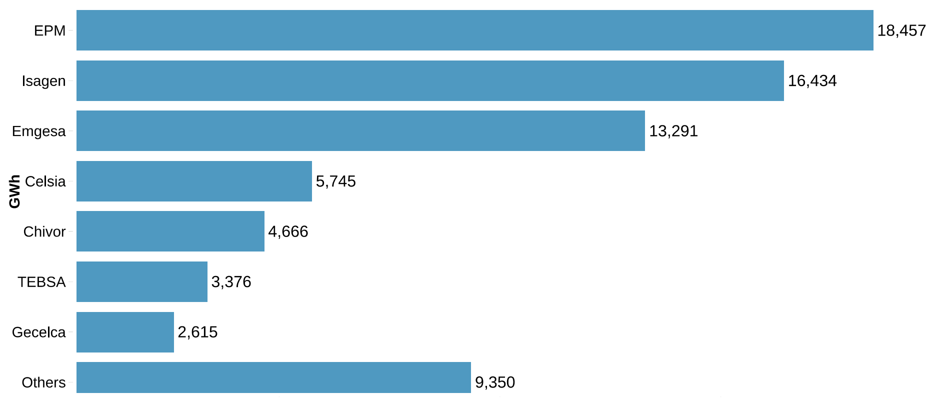
Funds from operations (FFO)	1,710	2,054	963	1,327	534
Interest	383	187	361	320	186
Cash interest paid	413	227	309	311	61
Operating cash flow (OCF)	1,376	2,069	538	1,049	457
Capital expenditure	2,281	302	849	1,032	6
Free operating cash flow (FOCF)	(906)	1,767	(310)	17	451
Discretionary cash flow (DCF)	(1,828)	(228)	(825)	(5,047)	(158)
Cash and short-term investments	173	223	877	5,386	369
Gross available cash	173	223	877	5,386	369
Debt	7,192	2,956	4,025	5,519	2,396
Equity	5,679	5,102	8,836	11,559	5,537
EBITDA margin (%)	64.5	62.5	21.2	36.1	36.7
Return on capital (%)	16.3	34.5	4.2	20.9	15.3
EBITDA interest coverage (x)	5.9	15.8	3.5	6.6	3.3
FFO cash interest coverage (x)	5.1	10.0	4.1	5.3	9.7
Debt/EBITDA (x)	3.2	1.0	3.2	2.6	3.9
FFO/debt (%)	23.8	69.5	23.9	24.1	22.3
OCF/debt (%)	19.1	70.0	13.4	19.0	19.1
FOCF/debt (%)	(12.6)	59.8	(7.7)	0.3	18.8
DCF/debt (%)	(25.4)	(7.7)	(20.5)	(91.4)	(6.6)

Business Risk

ISAGEN was the second-largest generator in Colombian. Given favorable hydrology, ISAGEN generated 16,434 GWh in 2021, a 32% growth over 2020, and accounted for 22% of Colombia's electricity demand. The Colombian market is highly dependent on hydroelectricity, and we expect that to remain so for the next several years, even with the incentives for expanding the unconventional renewable capacity.

Market Share

Colombia | Electricity Generation in 2021



Source: S&P Global Ratings.

Operating metrics remain high. In 2021, the availability factor among ISAGEN's plants reached 92% thanks to its efficient operating management. In addition, given that its portfolio is based on hydroelectric plants, the cost structure is light. ISAGEN has a diversified customer base, selling electricity to distribution companies in Colombia and large clients, mostly in the metals and mining, manufacturing and agribusiness sectors. Therefore, we don't expect it to have any considerable counterparty exposure in its contracts.

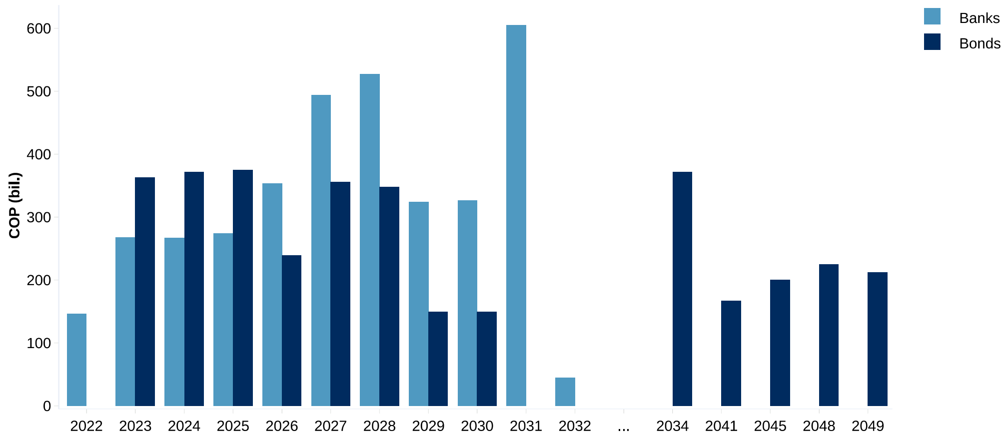
ISAGEN adopted a more conservative commercial strategy to offset the impact of fluctuating hydrology conditions. In Colombia, the rainfall season is between May and November, replenishing the country's reservoirs. In 2021, the average spot prices in Colombia were 41% lower than in 2020, due to better hydrology. We expect ISAGEN's margins to benefit from lower spot energy purchases due to favorable hydrology conditions in 2022. Furthermore, to prevent hydrology volatility from denting its cash flows, ISAGEN hasn’t been selling its entire electricity output through contracts, keeping some for sale. This provides a cushion and therefore reduces the likelihood of having to buy energy in the spot market at higher prices than those in its contracts.

Financial Risk

We expect ISAGEN to maintain its resilient cash flows and its delinquency levels below 0.5%, which will be in line with historical averages. Therefore, we continue expecting ISAGEN to post debt to EBITDA of about 3.0x and EBITDA interest coverage of about 4.0x in 2022 and 2023.

Debt maturities

Debt Maturity Profile
As of Dec. 31, 2021



Source: S&P Global Ratings.

ISAGEN, S.A. E.S.P.--Financial Summary

Period ending	Dec-31-2016	Dec-31-2017	Dec-31-2018	Dec-31-2019	Dec-31-2020	Dec-31-2021
Reporting period	2016a	2017a	2018a	2019a	2020a	2021a
Display currency (bil.)	COP	COP	COP	COP	COP	COP
Revenues	2,747	2,351	2,650	3,183	3,211	3,482
EBITDA	863	1,111	1,490	1,891	1,802	2,245
Funds from operations (FFO)	309	682	1,108	1,421	1,297	1,710
Interest expense	412	352	318	354	360	383
Cash interest paid	440	350	291	368	402	413
Operating cash flow (OCF)	205	816	287	785	774	1,376
Capital expenditure	126	80	71	49	73	2,281
Free operating cash flow (FOCF)	79	736	215	736	701	(906)
Discretionary cash flow (DCF)	79	216	215	(175)	701	(1,828)
Cash and short-term investments	396	158	86	136	84	173
Gross available cash	396	158	86	136	84	173
Debt	3,468	3,424	4,358	5,385	5,936	7,192
Common equity	3,593	5,485	5,912	5,490	5,958	5,679
Adjusted ratios						
EBITDA margin (%)	31.4	47.3	56.2	59.4	56.1	64.5
Return on capital (%)	9.1	12.1	13.6	15.9	13.9	16.3
EBITDA interest coverage (x)	2.1	3.2	4.7	5.3	5.0	5.9

ISAGEN, S.A. E.S.P.--Financial Summary

FFO cash interest coverage (x)	1.7	3.0	4.8	4.9	4.2	5.1
Debt/EBITDA (x)	4.0	3.1	2.9	2.8	3.3	3.2
FFO/debt (%)	8.9	19.9	25.4	26.4	21.8	23.8
OCF/debt (%)	5.9	23.8	6.6	14.6	13.0	19.1
FOCF/debt (%)	2.3	21.5	4.9	13.7	11.8	(12.6)
DCF/debt (%)	2.3	6.3	4.9	(3.3)	11.8	(25.4)

Reconciliation Of ISAGEN, S.A. E.S.P. Reported Amounts With S&P Global Adjusted Amounts (Bil. COP)

	Debt	Shareholder equity	Revenue	EBITDA	Operating income	Interest expense	S&PGR adjusted EBITDA	Operating cash flow	Dividends	Capital expenditure
Financial year	Dec-31-2021									
Company reported amounts	7,365	5,679	3,482	2,245	2,010	666	2,245	1,376	922	2,281
Cash taxes paid	-	-	-	-	-	-	(122)	-	-	-
Cash interest paid	-	-	-	-	-	-	(413)	-	-	-
Accessible cash and liquid investments	(173)	-	-	-	-	-	-	-	-	-
Nonoperating income (expense)	-	-	-	-	5	-	-	-	-	-
Interest: Shareholder loan	-	-	-	-	-	(283)	-	-	-	-
Working capital: Taxes	-	-	-	-	-	-	-	122	-	-
Working capital: other	-	-	-	-	-	-	-	697	-	-
OCF: Taxes	-	-	-	-	-	-	-	(122)	-	-
OCF: other	-	-	-	-	-	-	-	(697)	-	-
Total adjustments	(173)	-	-	-	5	(283)	(536)	-	-	-
S&P Global Ratings adjusted	**Debt**	**Equity**	**Revenue**	**EBITDA**	**EBIT**	**Interest expense**	**Funds from Operations**	**Operating cash flow**	**Dividends**	**Capital expenditure**
	7,192	5,679	3,482	2,245	2,015	383	1,710	1,376	922	2,281

Liquidity

We assess ISAGEN's liquidity as adequate. We expect sources over uses to be about 1.2x in the next 12 months, which provides protection against adverse events. We also expect sources to continue exceeding its uses even if EBITDA were to decline by 15% in the same period.

Principal liquidity sources

- Cash and cash equivalents of COP189 billion, as of Dec. 31, 2021; and
- Expected cash flows of about COP1.6 trillion in the following 12 months.

Principal liquidity uses

- Debt maturities of about COP232 billion in the next 12 months;
- Working capital outflows of COP94 billion during the next 12 months;
- Capital expenditures of COP470 billion during the next 12 months; and
- Dividend payment of CO523 billion during the next 12 months.

Covenant Analysis

Requirements

ISAGEN must comply with the following incurrence financial covenant on its senior debt obligations:

- Net debt to EBITDA of up to 3.75x.

We note that failure to comply with this ratio doesn't trigger an event of default or payment acceleration of the existing debt--it only limits the company's capacity to increase its debt, but not its ability to refinance existing debt.

Compliance expectations

We expect the company to remain in compliance with the financial covenants during the next 12 months even if its EBITDA falls by 15% from our base-case scenario.

Environmental, Social, And Governance

ESG Credit Indicators

E-1	**E-2**	E-3	E-4	E-5	S-1	**S-2**	S-3	S-4	S-5	G-1	**G-2**	G-3	G-4	G-5

ESG credit indicators provide additional disclosure and transparency at the entity level and reflect S&P Global Ratings' opinion of the influence that environmental, social, and governance factors have on our credit rating analysis. They are not a sustainability rating or an S&P Global Ratings ESG Evaluation. The extent of the influence of these factors is reflected on an alphanumerical 1-5 scale where 1 = positive, 2 = neutral, 3 = moderately negative, 4 = negative, and 5 = very negative. For more information, see our commentary "ESG Credit Indicators: Definition And Applications," published Oct. 13, 2021.

ESG factors have an overall neutral influence on our credit rating analysis of ISAGEN, given that we believe it's better positioned regarding energy transition risks than the industry. This is because its electricity generation is mainly hydro based, while climate risk exposure is mitigated by its conservative commercial strategy. ISAGEN maintains part of its unsold electricity to absorb the volatility stemming from the intermittent availability of natural resources, such as rainfall, resulting in resilient cash flows. In addition, the company's growth strategy is based on solar and wind capacity, aiming to maintain a carbon-neutral portfolio.

Group Influence

Brookfield Renewables controls ISAGEN, which represents about 30% of the parent's installed capacity and a significant portion of its EBITDA. Brookfield Renewables has demonstrated its willingness to support ISAGEN's operations through the intercompany loans since acquiring the company in 2016. In our view, ISAGEN would likely receive support from Brookfield Renewables if the subsidiary were to face financial difficulty, but in our view, this support wouldn't be provided in a scenario of a sovereign default in Colombia.

Rating Above The Sovereign

ISAGEN's 'bbb-' SACP is above the 'BB+' foreign currency rating on Colombia. The company sells more than half its energy to distributors, which have their rates set by the regulator. Therefore, we believe ISAGEN's ability to receive payments--in case of regulatory interference in distributors' rates--could worsen. In addition, ISAGEN sells part of its output on the spot market, and we believe spot prices could plummet in a recession. Therefore, we limit our rating on ISAGEN by that on the sovereign.

Rating Component Scores

Foreign currency issuer credit rating	BB+/Stable/--
Local currency issuer credit rating	**BB+/Stable/--**
Business risk	**Satisfactory**
Country risk	Moderately High
Industry risk	Moderately High
Competitive position	Satisfactory
Financial risk	**Significant**
Cash flow/leverage	Significant
Anchor	**bbb-**
Diversification/portfolio effect	Neutral (no impact)
Capital structure	Neutral (no impact)
Financial policy	Neutral (no impact)
Liquidity	Adequate (no impact)
Management and governance	Satisfactory (no impact)
Comparable rating analysis	Neutral (no impact)
Stand-alone credit profile	**bbb-**

Related Criteria

- General Criteria: Group Rating Methodology, July 1, 2019
- Criteria | Corporates | General: Corporate Methodology: Ratios And Adjustments, April 1, 2019
- Criteria | Corporates | General: Reflecting Subordination Risk In Corporate Issue Ratings, March 28, 2018
- General Criteria: Methodology For Companies With Noncontrolling Equity Interests, Jan. 5, 2016
- Criteria | Corporates | Industrials: Methodology: Investment Holding Companies, Dec. 1, 2015
- General Criteria: Rating Government-Related Entities: Methodology And Assumptions, March 25, 2015
- Criteria | Corporates | General: Methodology And Assumptions: Liquidity Descriptors For Global Corporate Issuers, Dec. 16, 2014
- Criteria | Corporates | General: Corporate Methodology, Nov. 19, 2013

- General Criteria: Country Risk Assessment Methodology And Assumptions, Nov. 19, 2013
- General Criteria: Ratings Above The Sovereign--Corporate And Government Ratings: Methodology And Assumptions, Nov. 19, 2013
- General Criteria: Methodology: Industry Risk, Nov. 19, 2013
- General Criteria: Methodology: Management And Governance Credit Factors For Corporate Entities, Nov. 13, 2012
- General Criteria: Principles Of Credit Ratings, Feb. 16, 2011
- General Criteria: Stand-Alone Credit Profiles: One Component Of A Rating, Oct. 1, 2010

Related Research

Ratings Detail (as of May 19, 2022)*

Isagen S.A. E.S.P.	
Issuer Credit Rating	BB+/Stable/--
Issuer Credit Ratings History	
20-May-2021	BB+/Stable/--
27-Mar-2020	BBB-/Negative/--
11-Dec-2017	BBB-/Stable/--
16-Aug-2017	BBB/Negative/--

*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.