

28 February 2023 – Neuss, Germany

Rating Action / Update:

Creditreform Rating has affirmed the unsolicited corporate issuer rating of Repsol S.A., at **BBB+ / stable**

Creditreform Rating (CRA) has affirmed the unsolicited, corporate issuer ratings of Repsol S.A., Repsol Europe Finance S.à.r.l. and Repsol International Finance B.V. – together referred as Repsol or the Company, as well as the unsolicited corporate issue ratings of long-term local currency senior unsecured notes issued by Repsol Europe Finance S.à.r.l. and Repsol International Finance B.V. at **BBB+ / stable**.

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Current relevant factors for the rating

The following considerations were of specific relevance for the rating assessment:

- National leader in its strategic business areas
- Highly diversified business model in terms of geography, hydrocarbon resource base and activities (up- and downstream)
- Good access to financial markets
- Strong operating performance, improving financial figures in 2022 largely as result of soared energy prices
- Significant net debt reduction compared to 2021 and generally further improved solid financials, particularly due to strong cash generation, exceeding pre-pandemic-levels
- New strategic alliances established, enabling technical and financial progress in Repsol's transformation path to a sustainable low-carbon business model
- A 25%-stake sale of Exploration business to the institutional Investor EIG will enable additional financial headroom in 2023 due to a cash inflow of roughly EUR 4.8 billion
- Recognition of impairment charges of approx. EUR 2.7 billion largely due to a lower expected profitability of refinery
- Market conditions are marked by high uncertainty in connection with geopolitical situation, energy price volatility, supply chain disruptions, higher interest rates and overall economic slowdown
- Stricter regulation measures aimed at acceleration of the energy transition also represent a risk factor

ESG-criteria:

CRA generally considers ESG factors (environment, social and governance) within its rating decisions. In the case of Repsol S.A. we have identified ESG factors with significant influence on the following categories, which are described in the sections below.

(E) Environment

(S) Social

(G) Governance

- (E): Current focus on fossil energy sources and production materials
- (E): Risks of impairments in the short to medium-term as a result of changes in the market and regulatory environment (stranded asset risk)
- (E): Mid- to long-term risks for the business model of the oil and gas industry, as well as the financing e.g. related to EU-Taxonomy

We see risks to Repsol's current business model in the medium to long term due to societal and political changes with regard to fossil fuels, based on European and international environmental and climate protection targets. Global efforts towards decarbonization lead us to expect significant shifts in the demand for fossil fuels in the medium to long term, which have a direct material influence on the Company's activities in the form of restrictions, costs for CO₂ certificates and environmental protection measures, recultivation expenses, as well as on its investment behavior in the form of redesigning its product portfolio and investments in technologies with the aim to limit CO₂ emissions. Current trends in automobile registrations imply likely shifts and a general decline in demand for refined products. In addition, these tendencies could have an influence on the behavior of investors, which could lead to difficulties in access to capital markets. Repsol has already recognized impairment charges related to environmental constraints and the accelerated energy transition. In the fiscal year 2022 the Company recorded impairment charges of around EUR 1.8 billion due to a lower expected profitability of refinery assets in the long term largely in connection with the consequences of the energy transition.

We nevertheless assume that oil and gas will continue to play an important role in the energy business and industrial production in the long term, albeit with gradually decreasing relevance. The long-term goal of the Company is to establish a new operating model; a hybrid energy model that combines electrification with low-carbon fuels, advanced biofuels, synthetic fuels and renewable hydrogen fuels, the latter to serve long-distance road transport as well as the maritime and aviation industries. In line with the Paris Agreement, Repsol's strategy is aimed at the fundamental target of complete climate neutrality (Scope 1, 2 and 3) by 2050. By 2030, Repsol is planning to have installed capacity of renewable energy of 20 GW and to produce 2 million of tons of waste-based biofuels and synthetic fuels from water and CO₂ by 2030. To finance its low-carbon projects, the initial investments are planned to be EUR 6.5 billion for the period 2021-2025. In 2022, the Company was able to record further progress. Among others the Company is building its first advanced biofuels plant at its Cartagena refinery, which is planned to supply approx. 250,000 tons of biofuel per year. With the aim of financing its ambitious targets for installed renewable capacity, the Company sold a 25% stake of Repsol Renovables S.L.U to Crédit Agricole Assurance and Energy Infrastructure Partners (EIP) for EUR 986 million.

We consider Repsol's measures to be both positive and plausible; however, market conditions could change significantly in the long-term due to stricter regulatory environment or disruptive technologies, adversely affecting the industry. The oil spill in the province of Callao in Peru last year, which contaminated 21 beaches along the country's coast, further highlights the environmental risks of the oil and gas industry.¹ The Peruvian consumer protection agency Indecopi has filed a civil suit in the Supreme Court in Lima. Peru is demanding USD 4.5 billion as compensation against Repsol S.A., Refinería La Pampilla S.A.A., Repsol Comercial S.A.C, along with the Mapfre insurance company and two shipping companies. Depending on the legal outcome, the resulting consequences for Repsol could have further implications for the rating. It is also conceivable that there might be international consequences in the form of further production

¹ On 15 January 2022, the Hunga Tonga-Hunga Ha'apai volcano in the South Pacific state of Tonga triggered very high tidal waves far from the site of the eruption. As a result, crude oil leaked during the unloading of the tanker Mare Doricum at Repsol's refinery, la Pampilla in the port province Callao in Peru, polluting 21 beaches along the country's coast. Approximately 12,000 barrels of oil spilled into the water, affecting an area of up to 9 million square meters. Seabirds and marine animals have been affected by the oil spill, resulting in heavy losses for fisheries and tourism. The government of Peru declared a state of emergency.

bans due to a high risk of accidents. Several countries have already initiated the end of oil exploration at sea in the fight against climate change. Since offshore production is associated with far-reaching environmental risks, countries such as France and Denmark have already banned the search for oil and gas in their waters.

Overall, we see that Repsol has a strongly integrated ESG culture, as described in our Rating Report from 14 February 2022. Nonetheless, the industry is subject to strict environmental policies as well as technologically disruptive processes that have had already a material impact on Repsol's financials. Due to the specific goals and active measures to improve its sustainability, we currently see the negative effects of ESG factors as limited to one notch with regard to the current business model risk.

A general valid description of Creditreform Rating AG, as well as a valid description of corporate ratings for understanding and assessing ESG factors in the context of the credit rating process, can be found [here](#).

Rating result

The current unsolicited corporate issuer rating of **BBB+** attests Repsol S.A. a highly satisfactory level of creditworthiness, representing a low to medium default risk. The rating result is based on the Company's strong position in its relevant geographical markets, its high level of product and geographical diversification, and on its leading market position in Spain. In line with our expectations, Repsol's operating performance showed a significant improvement in 2022 against the backdrop of global market recovery after the COVID-19 pandemic, and in particular soaring energy prices, benefiting its key financials and exceeding pre-pandemic level. Noteworthy was its strong cash flow generation, enabling a significant debt reduction, as well Repsol's strategic measures to strengthen financial headroom for its decarbonization program. The Company's improved financial figures in 2022, combined with its financial discipline and good capital market access, support our rating assessment. Repsol's strategy is based on building a multi-energy low-carbon model in the long term via own funds and strategic alliances. However, the business model is still fossil fuel-focused and thus vulnerable to regulatory, reputational and technical factors, dampening its profitability. We consider this as an ESG factor, adversely impacting the rating by one notch.

Outlook

The one-year outlook for the unsolicited corporate issuer rating of Repsol S.A. is **stable**. Against the backdrop of still elevated energy prices, we assume further positive performance for Repsol in the short term. Considering Repsol's improved financials and elaborated strategic measures, aimed at strengthening financial headroom, we assume that the Company will be able to continue its transformation process and sustain possible economic slowdowns. Nevertheless, the overall economic environment is still marked by uncertainty in regard to geopolitical tensions and their economic consequences, as well as volatile commodity prices and further possible stringent government and environmental policies, thus constraining the outlook.

Please note:

The scenarios are based on information available at the time of the rating. Within the forecast horizon, circumstances may occur that could lead to a change of the rating out of the indicated range.

Best-case scenario: A-

In our best-case scenario for one year, we assume a rating of A-. In this scenario, Repsol's operating performance benefits further from still-elevated energy prices, enabling the Company to generate solid financial figures exceeding pre-crisis levels. In this scenario we consider the improvement of its financial result as sustainable and the market conditions has stabilized, in particular with regard to geopolitical tensions and their economic consequences, e.g. energy price volatility, disruptions in supply-chains, high interest rates, which could adversely affect the overall economic activities.

Worst-case scenario: BBB

In the worst-case scenario for one year, we assume a rating of BBB. In this scenario, we assume a deterioration of the market conditions in regard of volatile energy prices and/or an economic downturn, without prospects on short term recovery, affecting the Company's earnings. Also stricter regulatory measures could dampen earnings potential and within restricting cash flow potential to sufficiently offset its high investment requirements.

Business development and outlook

2022 was an extraordinary year for the oil and gas industry; characterized by further economic recovery due to the terminated sanitary restrictions and particularly by soaring energy prices as result of lower supply of energy products. Repsol recorded a strong operational performance and made strategic progress on its decarbonization path. The Brent price increased by over 42.2% to an average of 101 EUR/bbl (2021: 71 EUR/bbl against the backdrop of the war in Ukraine and the production management of OPEC+, which decided not to extent the group's production target, leading to lower supplies in oil and gas, particularly in Europe. The Henry Hub price almost doubled, to an average of 6.6 USD/Mbtu (2021: 3.9 USD/Mbtu).

Repsol benefitted from the energy price surge and generated revenues of EUR 75,153 million (2021: EUR 49,745 million) in 2022, showing an increase of 51.1% as compared to 2021. Analytical operating income (EBIT) increased by 49.6%, amounting to EUR 5,426 million (2021: EUR 3,626 million), dampened by higher amortization costs, expenses in connection with the increased commodity prices, exchange rate losses and in particular by net impairment charges of EUR 2,673 million. The Company recognized an impairment of EUR 1,775 million largely due to a lower expected profitability of refinery assets on long-term in connection with the consequences of the energy transition, increase in taxes and rising interest rates, and global risks principally affecting assets in Spain. Provisions due to credit risks in Venezuela, and extraordinary income taxes in the UK and the spill in Peru due in 2023 were recognized, amounting to EUR 731 million. As result of this, the analytical EBIT margin was relatively stable by 7.2% (2021: 7.3%). Excluding analytical non-operating and one-off effects, which also includes gains and losses on disposals, the EBIT margin improved from 8.7% in 2021 to 10.8% in 2022. Net income increased by 71.9% compared to 2021 amounting to EUR 4,345 million (2021: 2,528) also due to positive fair value adj. of financial instruments of EUR 319 million and higher minority interest gains, increased by EUR 688 million.

Table 1: Financials of Repsol S.A. | Source: Repsol S.A. Annual report 2022, standardized by CRA

Repsol S.A. Selected key figures of the financial statement analysis Basis: Annual accounts and report of 31.12. (IAS, Group)	CRA standardized figures ²	
	2021	2022
Sales (million EUR)	49,745	75,153
EBITDA (million EUR)	5,630	7,765
EBIT (million EUR)	3,626	5,426
EAT (million EUR)	2,528	4,345
EAT after transfer (million EUR)	2,499	4,251
Total assets (million EUR)	51,840	56,595
Equity ratio (%)	39,36	43,82
Capital lock-up period (days)	40,71	24,46
Short-term capital lock-up (%)	19,42	13,41
Net total debt / EBITDA adj. (factor)	4,07	2,41
Ratio of interest expenses to total debt (%)	1,29	1,31
Return on Investment (%)	5,40	8,07

In particular, the operating segments Upstream and Industrial benefited from high oil and gas price realization, and to a lesser extent from recovering demand. Upstream more than doubled (2.24x) its net income and Industrial showed increases of 25.7% compared to 2021, while Commercial and Renewables were affected by discounting measures at Spanish gas stations. The high-margin segment Upstream also benefitted from optimization measures of its international portfolio during the COVID-19 pandemic and from appreciation of the dollar, overcompensating operating costs, amortization and tax increase effects. The Industrial segment also benefitted from strong investments in previous years, offsetting higher operating costs. Nevertheless, the improvement was significantly dampened by the impairment effects. Despite higher average daily traffic and improved performance in the Renewables business, the segment Commercial and Renewables recorded a decrease of 32.9% compared to 2021 as a result of discount measures at Spanish gas stations. Repsol introduced more than EUR 500 million in additional fuel discounts at its service stations in Spain.

Table 2: The net income development of Repsol's operating segments (excluding administrative business "Corporate and others") | Source: Repsol Annual Report 2022

Net income in million EUR	2021	2022	Δ
Upstream	1,097	2,459	1,341
Industrial	1,052	1,322	270
Commercial and Renewables	586	393	-193

Driven by the strong operating performance, the operating cash flow improved by 80.9% as compared to 2021, amounting to EUR 7,832 million (2021: EUR 4,677 million), more than offsetting a proportional higher tax burden (2022: 33.4% vs. 2021: 21.3%) and the impact of higher

² For analytical purposes, CRA adjusted the original values in the financial statements in the context of its financial ratio analysis. For example, when calculating the analytical equity ratio, deferred tax assets, goodwill (entirely or partly), and internally-generated intangible assets are subtracted from the original equity, whilst deferred tax liabilities are added. Net total debt takes all balance sheet liabilities into account. Therefore, the key financial figures shown often deviate from the original values of the company.

inventory costs as a result of price increases, higher volume and CO₂ allowances. The strong cash flow was largely used for investments in Upstream assets in the USA and for refining plants in the Industrial segment as well as for debt repayments. Investment payments amounted to EUR 5,096 million (2021: EUR 4,234 million), an increase of 20.4% compared to 2021. Through financial debt repayment and cash increase, net financial debt was reduced by 60.8%, amounting to EUR 2,256 million (2021: EUR 5,762 million), reflected in a solid net debt / EBITDA adj. ratio of 2.41 (2021: 4.07). The other financial key figures also benefited from strong operating performance, enabling greater financial strength of the Company. As of 31 December 2022, liquidity (cash and cash equivalents and undrawn committed credit lines) stood at EUR 11,575 million (2021: EUR 10,283 million), covering short-term financial debt approx. 3.3 times, giving Repsol more than adequate financial headroom.

In order to finance the targets of its Strategic Plan 2021-2025, Repsol plans to use operating cash flows, based on the assumption of an average price of USD 50 / bbl Brent and USD 2.5 / Mbtu Henry Hub prices and to build new strategic partnerships. Favorable market conditions enabled the Company to build up a financial buffer and thus achieve certain targets in advance. Several strategic partners were acquired, further strengthening Repsol's financials and technical expertise, the latter in particular to reinforce Repsol Renewables; for more details see the chapter "ESG factors". With the institutional investor EIG, which will acquire 25% of the Upstream business for around EUR 4.8 billion, it agreed on a possible IPO in the United States from 2026 depending on whether market conditions are favorable. In addition, Repsol completed its share buyback program as of the end of 2022, three years ahead of target. After 200 million shares redeemed, it has planned a new buyback program with a maximum target of 35 million shares. It also advanced an increase of 11% in share remuneration, planned for 2024. Despite progress in the strategic and technical areas along with sound financials, the ambitious decarbonization and multi-energy model plan still entails high technical and financial requirements for the Company.

The current market conditions also entail certain risks, as they are characterized by high volatility and uncertainty; although the Brent price is still favourable, maintaining a price of roughly USD 80 / bbl, the Henry Hub price has decreased significantly since the beginning of February 2023. Regulatory measures as well as economic factors could also have a lasting impact on Repsol's operating performance. High inflation as well as geopolitical tensions, cloud the outlook for the global economy in the current fiscal year and, above all, create significant uncertainty. At this stage, we assume that economic growth will slow markedly, particularly in Europe. We also expect further efforts by European governments to stabilize GDP growth; nonetheless, we assume that the European economy will stagnate with GDP growth of only 0.2% in 2023, following growth of approx. 3.2% in 2022. For Spain, we expect a GDP growth of 0.9% in 2023, following growth of roughly 4.6% in 2022.³

It also remains uncertain whether further relief measures by Spanish government will follow, or if new CO₂-related tightening will take place. In 2023, Repsol expects to pay around EUR 450 million for its activities in Spain during 2022, due to the new temporary energy levy in Spain, introduced in December 2022 based on the European general framework for an extraordinary temporary tax on excessive profits of oil and gas companies in 2022 and/or 2023. The tax amounts to 1.2% of net revenues from activities generated in Spain. However, according to the

³ For more details, see CRA's economic briefs "Heading for recession", published on CRA website on 23-11-2022: www.creditreform-rating.de.

Company, the impact on the annual result would not be significant, as the extraordinary tax charge for the refinery business in Spain has already been taken into account in the impairment test of 2022. In addition, Repsol has taken legal steps against the energy levy, arguing that it runs contrary to the Spanish Constitution and European Union law. In the United Kingdom, too, an energy profit levy was introduced, in effect since May 2022 to March, 2028, which has an impact of approx. EUR 169 million on the joint venture Repsol Sinoec Resources UK, Ltd.

Overall, Repsol showed strong performance due to favorable market conditions aligned with its strategy and a well-diversified portfolio in geographical as well as product terms. Nevertheless, the Company is exposed to a variety of risks, reflected in elevated business risk. In order to maintain its profitability in the long term, the Company needs to invest significantly, in turn increasing investment and financing risks. Volatile prices and lower demand in connection with economic recession could limit the scope for financing in the medium to long term. However, we see the Company as strategically and financially well-positioned to cope with current uncertainties, enabling it to continue its transformation path.

Issue rating

Further issuer ratings

In addition to the rating of Repsol S.A. the following issuers and its issues (see below), have been rated.

- Repsol Europe Finance S.à.r.l.
- Repsol International Finance B.V.

Due to the corporate, strategic, liability, financial, economic and performance-related interdependencies of the aforementioned subsidiaries (all of which are direct or indirect 100% subsidiaries of Repsol S.A. and which have been consolidated into the Group annual accounts) we derive the unsolicited corporate issuer rating of Repsol Europe Finance S.à.r.l. and Repsol International Finance B.V. from the unsolicited issuer rating of Repsol S.A. and set it equal to its rating of **BBB+ / stable**.

Issue rating details

The rating objects of this corporate issue rating are exclusively the long-term senior unsecured issues, denominated in euro, issued by Repsol Europe Finance S.à.r.l. and Repsol International Finance B.V., which are included in the list of ECB-eligible marketable assets. The ECB list of eligible marketable assets can be found on the website of the ECB.

The notes have been issued within the framework of the Euro Medium Term Note (EMTN) programme, of which the latest base prospectus dates from 13 May 2022 and its supplement of 5 December 2022. This EMTN programme amounts to EUR 10 billion and is unconditionally and irrevocably guaranteed by Repsol S.A. The notes under the EMTN programme are senior unsecured, and rank at least pari passu among themselves and with all other present and future unsecured obligations of the issuer. Additionally, the notes benefit from a negative pledge provision and a cross default mechanism. A change of control option is generally possible and has to be mentioned in specific final terms.

We have assigned the long-term local currency senior unsecured issues issued by Repsol Europe Finance S.à.r.l. and Repsol International Finance B.V. a rating of **BBB+ / stable**. The rating is based on the unsolicited corporate rating of Repsol Europe Finance S.à.r.l. and Repsol International

Finance B.V., respectively Repsol S.A. For the issue ratings we have applied our rating methodology for corporate issues. Other types of debt instruments or issues denominated in other currencies of the issuer have not been rated by CRA. For a list of all currently valid ratings and additional information, please consult the website of Creditreform Rating AG.

Overview

Table 3: Overview of CRA Ratings | Source: CRA

Rating objects	Details	
	Date	Rating
Repsol S.A. (Guarantor)	28.02.2023	BBB+ / stable
Repsol Europe Finance S.à.r.l. (Issuer)	28.02.2023	BBB+ / stable
Repsol International Finance B.V. (Issuer)	28.02.2023	BBB+ / stable
Long-term Local Currency (LC) Senior Unsecured Issues of Repsol Europe Finance S.à.r.l.	28.02.2023	BBB+ / stable
Long-term Local Currency (LC) Senior Unsecured Issues Repsol International Finance B.V.	28.02.2023	BBB+ / stable
Other	--	n.r.

Table 4: Overview of 2022 Euro Medium Note Programme | Source: Base Prospectus dated 13.05.2022

Overview of 2022 EMTN Programme			
Volume	EUR 10,000,000,000	Maturity	Depending on respective bond
Issuer / Guarantor	Repsol Europe Finance S.à.r.l. (Issuer) Repsol International Finance B.V. (Issuer) Repsol S.A. (Guarantor)	Coupon	Depending on respective bond
Arranger	BofA Securities	Currency	Depending on respective bond
Credit enhancement	none	ISIN	Depending on respective bond

All future LT LC senior unsecured Notes issued by Repsol Europe Finance S.à.r.l. and Repsol International Finance B.V., which have similar conditions to the current EMTN programme, denominated in Euro and included in the list of ECB-eligible marketable assets will, until further notice, receive the same ratings as the current LT LC senior unsecured Notes issued under the EMTN programme. Notes issued under the programme in any currency other than euro, or other types of debt instruments, have not yet been rated by CRA. For a list of all currently valid ratings and additional information, please consult the website of Creditreform Rating AG. For the time being, other emission classes or programmes (such as the Commercial Paper Programme) and issues that do not denominate in euro will not be assessed.

Appendix

Rating history

The rating history is available under:

<https://www.creditreform-rating.de/en/ratings/published-ratings.html>

Table 5: Corporate issuer rating of Repsol S.A. | Source: CRA

Event	Rating date	Publication date	Monitoring period	Result
Initial Rating	14.02.2022	16.02.2022	27.02.2023	BBB+ / stable

Table 6: Corporate issuer rating of Repsol International Finance B.V. | Source: CRA

Event	Rating date	Publication date	Monitoring period	Result
Initial Rating	14.02.2022	16.02.2022	27.02.2023	BBB+ / stable

Table 7: Corporate issuer rating of Repsol Europe Finance S.à.r.l. | Source: CRA

Event	Rating date	Publication date	Monitoring period	Result
Initial Rating	14.02.2022	16.02.2022	27.02.2023	BBB+ / stable

Table 8: LT LC senior unsecured issues issued by Repsol International Finance B.V. | | Source: CRA

Event	Rating date	Publication date	Monitoring period	Result
Initial Rating	14.02.2022	16.02.2022	22.02.2023	BBB+ / stable

Table 9: LT LC senior unsecured issues issued by Repsol Europe Finance S.à.r.l. | Source: CRA

Event	Rating date	Publication date	Monitoring period	Result
Initial Rating	14.02.2022	16.02.2022	27.02.2023	BBB+ / stable

Regulatory requirements

The rating⁴ was not endorsed by Creditreform Rating AG (Article 4 (3) of the CRA-Regulation).

The present rating is, in the regulatory sense, an unsolicited rating that is public. The analysis was carried out on a voluntary basis by Creditreform Rating AG, which was not commissioned by the Issuer or any other third party to prepare the present rating.

The rating is based on the analysis of published information and on internal evaluation methods for the assessment of companies and issues. The rating object was informed of the intention of creating or updating an unsolicited rating before the rating was determined.

⁴ In these regulatory requirements the term "rating" is used in relation to all ratings issued by Creditreform Rating AG in connection to this report. This may concern several companies and their various issues.

The rating object participated in the creation of the rating as follows:

With Rated Entity or Related Third Party Participation	No
With access to Internal Documents	No
With Access to Management	No

A management meeting did not take place within the framework of the rating process.

The documents and information gathered were sufficient to meet the requirements of Creditreform Rating AG's rating methodologies.

The rating was conducted based on the following rating methodologies and the basic document.

Rating methodology	Version number	Date
Corporate Ratings	2.4	July 2022
Non-financial Corporate Issue Ratings	1.0	October 2016
Rating Criteria and Definitions	1.3	January 2018

The documents contain a description of the rating categories and a definition of default.

The rating was carried out by the following analysts:

Name	Function	Mail-Address
Christina Sauerwein	Lead-analyst	C.Sauerwein@creditreform-rating.de
Tim Winkens	Analyst	T.Winkens@creditreform-rating.de

The rating was approved by the following person (person approving credit ratings, PAC):

Name	Function	Mail-Address
Philip Michaelis	PAC	P.Michaelis@creditreform-rating.de

On 28 February 2023, the analysts presented the rating to the rating committee and the rating was determined. The rating result was communicated to the company on 1 March 2023. There has not been a subsequent change to the rating.

The rating will be monitored until Creditreform Rating AG withdraws the rating. The rating can be adjusted as part of the monitoring, if crucial assessment parameters change.

In 2011, Creditreform Rating AG was registered within the European Union according to EU Regulation 1060/2009 (CRA-Regulation). Based on this registration, Creditreform Rating AG is allowed to issue credit ratings within the EU and is bound to comply with the provisions of the CRA-Regulation.

ESG-factors

You can find out whether ESG factors were relevant to the rating in the upper section of this rating report "Relevant rating factors".

A general valid description for Creditreform Rating AG, as well as a valid description of corporate ratings for understanding and assessing ESG factors in the context of the credit rating process, can be found [here](#).

Conflict of interests

No conflicts of interest were identified during the rating process that might influence the analyses and judgements of the rating analysts involved or any other natural person whose services are placed at the disposal or under the control of Creditreform Rating AG and who are directly involved in credit rating activities or in approving credit ratings and rating outlooks.

In the event of providing ancillary services to the rated entity, Creditreform Rating AG will disclose all ancillary services in the credit rating report at this point:

No ancillary services in the regulatory sense were carried out for this rating object.

Rules on the presentation of credit ratings and rating outlooks

The approval of credit ratings and rating outlooks follows our internal policies and procedures. In line with our "Rating Committee Policy", all credit ratings and rating outlooks are approved by a rating committee based on the principle of unanimity.

To prepare this credit rating, Creditreform Rating AG has used following substantially material sources:

Corporate issuer rating:

1. Annual report
2. Website
3. Internet research

Corporate issue rating:

1. Corporate issuer rating incl. information used for the corporate issuer rating
2. Documents on issues / instruments

There are no other attributes and limitations of the credit rating or rating outlook other than those displayed on the Creditreform Rating AG website. Furthermore, Creditreform Rating AG considers as satisfactory the quality and extent of information available on the rated entity. With respect to the rated entity, Creditreform Rating AG regarded available historical data as sufficient.

Between the time of disclosure of the credit rating to the rated entity and the public disclosure, no amendments were made to the credit rating.

The Basic Data Information Card indicates the principal methodology or version of methodology that was used in determining the rating, with a reference to its comprehensive description.

In cases where the credit rating is based on more than one methodology or where reference only to the principal methodology might cause investors to overlook other important aspects of the credit rating, including any significant adjustments and deviations, Creditreform Rating AG explains this fact in the credit rating report and indicates how the different methodologies or other aspects are taken into account in the credit rating. This information is integrated in the credit rating report.

The meaning of each rating category, the definition of default or recovery and any appropriate risk warning, including a sensitivity analysis of the relevant key rating assumptions such as mathematical or correlation assumptions, accompanied by worst-case scenario credit ratings and best-case scenario credit ratings are explained.

The date at which the credit rating was initially released for distribution and the date when it was last updated, including any rating outlooks, is indicated clearly and prominently in the Basic Data Information Card as a “rating action”; initial release is indicated as “initial rating”, other updates are indicated as an “update”, “upgrade” or “downgrade”, “not rated”, “confirmed”, “selective default” or “default”.

In the case of a rating outlook, the time horizon is provided during which a change in the credit rating is expected. This information is available within the Basic Data Information Card.

In accordance with Article 11 (2) EU-Regulation (EC) No 1060/2009, a registered or certified credit rating agency shall make available, in a central repository established by ESMA, information on its historical performance data including the rating transition frequency and information about credit ratings issued in the past and on their changes. Requested data are available at the [ESMA website](#).

An explanatory statement of the meaning of Creditreform Rating AG’s default rates are available in the credit rating methodologies disclosed on the website.

Disclaimer

Any rating performed by Creditreform Rating AG is subject to the Creditreform Rating AG Code of Conduct, which has been published on the web pages of Creditreform Rating AG. In this Code of Conduct, Creditreform Rating AG commits itself – systematically and with due diligence – to establish its independent and objective opinion as to the sustainability, risks and opportunities concerning the enterprise or the issue under review.

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