Deutsche Lufthansa AG
Federal republic of Germany, Airlines

SCOPE BBB- STABLE

Key metrics

			Scope estimates	
Scope credit ratios	**2020**	**2021**	**2022E**	**2023E**
Scope-adjusted EBITDA/interest cover	neg	0.1x	5.9x	11.1x
Scope-adjusted debt (SaD)/Scope-adjusted EBITDA	neg	>10x	4.7x	2.5x
Funds from operations/SaD	-22%	-3%	17%	34%
Free operating cash flow/SaD	-29%	-8%	-11%	4%

Rating rationale

Scope Ratings has today affirmed the issuer rating of Deutsche Lufthansa AG at BBB-. The rating Outlook is changed to Stable from Negative. Scope has also affirmed the BBB- senior unsecured debt rating and the BB subordinated (hybrid) debt rating. The short-term rating has also been upgraded to S-2 from S-3.

The Outlook change reflects Scope's expectation of improving credit metrics over the next two years, driven by the pace of recovery in air traffic and deleveraging efforts. Scope takes the EUR 2.1bn capital increase and repayment of state loans as signs that Lufthansa is regaining its financial independence, with an improved ability to generate cash flow supported by rising passenger travel revenue, its resilient cargo business and recovery in its other businesses.

Outlook and rating-change drivers

The Stable Outlook reflects the expectation that credit metrics will improve over the next two years, driven by the recovery in air traffic and deleveraging. It also assumes that parent support will gradually fade with the termination of stabilisation measures and the disposal of the WSF stake (by October 2023).

A positive rating action is currently remote, but could be warranted if industry and business conditions continued to improve, resulting in significantly higher operating cash flow and an improved financial risk profile, exemplified by Scope-adjusted debt/EBITDA leverage moving towards 2.0x or below on a sustained basis.

A negative rating action is possible if Lufthansa's financial metrics remained constrained beyond 2022 with no medium-term recovery expectation, exemplified by Scope adjusted debt/EBITDA staying above 3.5x. This could be the result of a slower-than-expected recovery of operating cash flow amid a sluggish revival of international air travel. A negative rating action could also occur if state support abruptly diminished while results fell short of expectations.

Rating history

Date	Rating action/monitoring review	Issuer rating & Outlook
11 July 2022	Outlook change	BBB-/Stable
8 July 2021	Affirmation	BBB-/Negative
14 July 2020	Resolution of under Review and Outlook change	BBB-/Negative
31 March 2020	Downgrade and placement under Review	BBB-/under review for possible downgrade

Ratings & Outlook

Issuer	BBB-/Stable
Short-term debt	S-2
Senior unsecured debt	BBB-
Subordinated hybrid debt	BB

Analyst

Azza Chammem
+49 30 27891 240
a.chammem@scoperatings.com

Related Methodology and Related Research

Corporate Rating Methodology; July 2021

Credit Talk: Europe's airline sector faces tough financing, operating conditions; May 2022

Europe's airlines brace for yet more pain on rising fuel prices, no-fly zones amid war in Ukraine; March 2022

Scope Ratings GmbH

Lennéstraße 5
10785 Berlin

Phone +49 30 27891 0
Fax +49 30 27891 100

info@scoperatings.com
www.scoperatings.com

Bloomberg: RESP SCOP

Positive rating drivers	Negative rating drivers
• Globally Diversified operations with strong market positions mitigating cyclicality risks in passenger and cargo traffic • Scale of operations, including diversified worldwide route network and geographical reach, with strong positions at hubs in Frankfurt, Munich, Zurich and Vienna • Broad fleet of aircraft • Co-founder of customer loyalty programme Star Alliance, supporting increased flight frequencies • Operational rebound and recovery following restructuring • States support to flag carriers	• Exposure to cyclical changes in discretionary travel (business and leisure) and event risks such as natural disasters, contagious diseases and labour strikes, which negatively affect passenger volumes • Multi-hub strategy with low flexibility to adjust capacity without repercussions on the overall system • Fierce competition, including yield pressure from low-cost and network airlines • Relatively weak profitability as a result of high fuel costs and employees costs • Relatively weak credit metrics after the pandemic

Positive rating-change drivers	Negative rating-change drivers
• Industry and business conditions continuing improvement • SaD/EBITDA moving sustainably towards 2.0x	• Further travel restrictions leading to deterioration of air traffic while state support abruptly diminished • SaD/EBITDA of persistently above 3.5x beyond 2022

Corporate profile

Deutsche Lufthansa AG (Lufthansa or Lufthansa Group) is a global aviation group organised into the following business segments: Network Airlines, Eurowings, and Aviation Services. Aviation Services comprises the segments Logistics (Lufthansa Technik), maintenance, repair and overhaul (MRO), Catering (LSG) and Additional Businesses and Group Functions. The latter also include Lufthansa AirPlus, Lufthansa Aviation Training, and the IT companies. All segments occupy a leading position in their respective markets.

Financial overview

				Scope estimates		
Scope credit ratios	**2019**	**2020**	**2021**	**2022E**	**2023E**	**2024E**
Scope-adjusted EBITDA/interest cover	14.8x	neg	0.1x	5.9x	11.1x	14.0x
SaD/Scope-adjusted EBITDA	1.9x	neg	>10x	4.7x	2.5x	1.9x
Funds from operations/SaD	41%	-22%	-3%	17%	34%	45%
Free operating cash flow/SaD	2%	-29%	-8%	-11%	4%	9%
Scope-adjusted EBITDA in EUR m						
EBITDA	4,465	-2,700	33	2,306	4,131	4,788
Other items	0	0	0	0	0	0
Scope-adjusted EBITDA	**4,465**	**-2,700**	**33**	**2,306**	**4,131**	**4,788**
Funds from operations in EUR m						
Scope-adjusted EBITDA	4,465	-2,700	33	2,306	4,131	4,788
less: (net) cash interest paid	-108	-157	-275	-328	-307	-278
less: cash tax paid per cash flow statement	-1,009	81	-101	0	-269	-366
less: pension interest	-119	-97	-78	-78	-78	-78
add: dividends from associates	243	57	27	0	0	0
Change in provisions	0	0	0	0	0	0
Funds from operations	**3,472**	**-2,816**	**-394**	**1,900**	**3,477**	**4,066**
Free operating cash flow in EUR m						
Operating cash flow	4,129	-2,437	340	1,681	3,462	4,096
less: capital expenditure (net)	-3,585	-807	-1,107	-2,500	-2,600	-2,800
less: operating lease payments	-379	-379	-354	-369	-502	-472
Free operating cash flow	**165**	**-3,623**	**-1,121**	**-1,189**	**360**	**823**
Net cash interest paid in EUR m						
Net cash interest per cash flow statement	275	237	363	328	307	278
add: interest expense pension	119	97	78	78	78	78
less: interest hybrid debt	-13	-13	-13	-13	-13	-13
Net cash interest paid	**302**	**321**	**428**	**394**	**372**	**343**
Scope-adjusted debt in EUR m						
Reported gross financial debt	10,030	15,368	16,670	15,837	14,941	13,539
less: subordinated (hybrid) debt	-250	-250	-250	-250	-250	-250
less: cash and cash equivalents	-3,385	-5,460	-4,666	-6,014	-5,980	-5,874
add: non-accessible cash	61	61	100	100	100	100
add: pension adjustment	2,167	3,034	1,759	1,296	1,546	1,546
add: other bank borrowing	17	14	19	0	0	0
Less: fair value hedges	-178	-112	-154	-100	-100	-100
Scope-adjusted debt	**8,462**	**12,655**	**13,478**	**10,869**	**10,257**	**8,961**

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Environmental, social and governance (ESG) profile[1]

Environment		Social		Governance	
Resource management (e.g. raw materials consumption, carbon emissions, fuel efficiency)		Labour management		Management and supervision (supervisory boards and key person risk)	
Efficiencies (e.g. in production)		Health and safety (e.g. staff and customers)		Clarity and transparency (clarity, quality and timeliness of financial disclosures, ability to communicate)	
Product innovation (e.g. transition costs, substitution of products and services, green buildings, clean technology, renewables)		Clients and supply chain (geographical/product diversification)		Corporate structure (complexity)	
Physical risks (e.g. business/asset vulnerability, diversification)		Regulatory and reputational risks		Stakeholder management (shareholder payouts and respect for creditor interests)	

Legend

Green leaf (ESG factor: credit positive)

Red leaf (ESG factor: credit negative)

Grey leaf (ESG factor: credit neutral)

Two ESG factors affecting the airlines industry

Lufthansa Group like many airlines has an ESG strategy addressing different challenges. Scope highlights two key risks for the overall airline industry:

i) CO2 emissions: The EU is targeting net zero emissions by 2050 and airlines need to reduce their carbon footprint accordingly. Available means are fleet renewal (new technologies emit less), route optimisation with the help of airport operators and air traffic control, and the use of sustainable aviation fuel (similar to conventional jet fuel but smaller carbon footprint).

ii) Labour management: Deteriorating labour relations with an increasing risk of strikes. These have been compounded by:

- Negotiations being complicated by the different labour laws that airlines operating in multiple countries have to navigate.
- Labour taking up a large proportion of the total cost. The low-margin airline industry will always seek to lower these costs and unions will always resist.
- The tightening supply of pilots that has strengthened union bargaining power.
- The aftermath of the pandemic and the rising inflation causing labour unrest

[1] These evaluations are not mutually exclusive or exhaustive as ESG factors may overlap and evolve over time. We only consider ESG factors that are credit-relevant, i.e. those that have a discernible, material impact on the rated entity's cash flow and, by extension, its credit quality.

Business risk profile: BBB-

Industry risk profile: B

We classify the cyclicality for the airline industry as high due to its susceptibility to adverse economic changes and event risks. Market entry barriers are low with a lot of market entrants despite the fact that airlines are subject to complex regulatory and legal standards. Substitution risk is low as technological progress is unlikely to change air travel.

Global leader in different aviation services

Lufthansa is among the largest network carriers worldwide as measured by revenue passenger kilometres. Its Aviation Services segment has several companies that are global leaders in their respective sectors. To secure and build on its successful positioning, Aviation Services has been adapting its business models to the changing markets and competitive environments.

Business segments

Network Airlines (multi-hub segment)

Leading position at major hubs

Lufthansa's passenger business is split into the business segments Network Airlines and Eurowings (point-to-point operations, detailed in next section). Network Airlines is focused on the hub and long-haul carrier business, which includes all domestic and European routes from and to Frankfurt, Munich, Zurich, Vienna and Brussels.

The airlines operating under this segment are Lufthansa German Airlines, SWISS, Austrian Airlines and Brussels Airlines. Their market positions are supported by their strong presence in their respective home markets of Germany, Switzerland, Austria and Belgium, providing customers with a broad range of travel options covering more than 100 countries. The broad fleet of aircraft and good position in long-haul premium traffic further bolster Lufthansa's competitive position. Lufthansa's high-density network of routes is complemented by its long-standing partnerships, alliances, collaborations and code-sharing connections with international airlines.

Intense pricing competition is a key threat for Network Airlines; yield pressure even exists for premium traffic. Low-cost carriers (LCCs) in the short and medium-haul segments are providing fierce competition but have so far failed to dent Lufthansa's position in key domestic markets. LCCs do not always target the same passengers as Lufthansa as they serve secondary airports and mostly leisure travellers. Recently, however, LCCs have started operations at major airports, such as easyJet in Vienna. This could force Lufthansa to cater to the typically price sensitive LCC customer. At the same time, certain long-haul routes are seeing a competitive squeeze from full-service carriers including the three largest American airlines, Air France-KLM, IAG and the Middle Eastern carriers.

Eurowings (point-to-point segment)

The point-to-point segment is part of the strategy to create a low-cost brand for point-to-point connections under the umbrella of the Eurowings brand. To this end, Eurowings focuses on a different cost structure, including the harmonisation of its fleet with A320 aircraft and A330-200 aircraft for long-haul traffic. Along with aircraft costs, Eurowings aims to keep crew-related, maintenance and other operating costs low. Eurowings is a traditional LCC both to and from primary and secondary airports.

Eurowings in a stronger position than pre-crisis due to a structurally reduced cost base

Eurowings benefits from structurally higher revenues per available seat kilometre. This is because it has more business travellers than other LCCs and has slot constraints at certain airports. However, Eurowings could still improve in lowering operating costs (CASK) compared to the other LCCs. Before the Covid-19 crisis, Eurowings further expanded its fleet and undertook passive consolidation. Eurowings is in a stronger competitive position than pre-crisis since it structurally reduced its cost base.

Lufthansa Group has never been better placed to benefit from the early recovery phase of short-haul and leisure travel. Both its capacity and the number of tourist destinations it serves have increased. Airlines Eurowings, Edelweiss and Sun Express serve this growing segment and are well established. In the German market, Eurowings Discover was established to offer a dedicated leisure product with competitive unit costs.

The restructuring and modernisation plan has given Lufthansa the flexibility to meet increasing demand and take advantage of growth opportunities. However, the pace of a recovery in aviation depends heavily on the easing of restrictions and no new disruptions caused by new Covid-19 variants. Management still expects to retain its position in strategic markets in the post-pandemic environment and will try to take part of strategic and opportunistic M&A. The post-pandemic recovery will be led by the demand for intra-European and transatlantic traffic. Through the joint venture and network provided by Star Alliance carriers on both sides of the Atlantic, Lufthansa Group offers a vast network and product range. The group assumes a recovery in 2022 of 75% of the 2019 capacity and 90% or more in 2024.

Aviation Services

The segment is divided into logistics; maintenance, repair and overhaul (MRO); catering; and other, service and financial companies.

Logistics (including Lufthansa Cargo)

Lufthansa Cargo is among the top cargo airlines worldwide as measured by revenue tonne kilometres. Air freight is a traditionally very volatile industry and any reduction in input costs (e.g. lower oil prices) is immediately reflected in pricing – unlike passenger fares. Visibility in the segment is limited to a few weeks and demand can change quickly. Global air freight traffic declined much less during the pandemic than passenger traffic back in 2020.

Cargo was a vital revenue source when passenger flights were grounded

The global air freight market continued to grow in 2021. However, demand for freight services rose much faster than capacity could expand, as passenger aircraft also carried freight and many of those flights were grounded. In 2021, overall capacity was 30% lower than in 2019, the year before the crisis. However, yields were 100.4% higher. Freighter capacities, in contrast, increased slightly. Importantly, cargo had another stellar year, again achieving record results owing to extraordinarily strong demand for air freight.

Lufthansa Cargo made a positive contribution to group earnings in 2021 alongside Lufthansa Technik and some active cost management.

Maintenance, repair and overhaul

Lufthansa Technik is one of the largest MRO providers for aircraft, engines and aircraft components worldwide in a fragmented market. Around 80% of the business relates to external customers. Key competitors in the industry are aircraft manufacturers (notably Airbus and Boeing), engine and engine-component manufacturers (Rolls-Royce, General Electric, MTU), and independent MRO contractors (e.g. ST Aerospace, SR Technics).

Lufthansa Technik: a leading independent MRO provider for civil commercial aircraft

Lufthansa Technik's market position is strong, reflected in the large number of aircraft served under exclusive contracts. We also expect the MRO industry to continue to grow, supported by increases in commercial aircraft deliveries and air traffic.

While the share of earnings contributed by the MRO unit continues to decline (given the substantially growing share of operating profits from the passenger airline business), we view the more stable MRO business as positive for Lufthansa's overall business risk. The coronavirus crisis has had a considerable impact on the MRO business through a major reduction in flight hours and the grounding and retiring of aircraft. Lufthansa Technik was not spared, but adapted well by expanding on products that saw high demand during the crisis such as parking and storage services for aircraft maintenance customers. Lufthansa

Technik therefore performed strongly in 2021 and will increasingly contribute in 2022 as more aircrafts are deployed to meet rising demand.

Catering (LSG Group)

Lufthansa's catering business, LSG Group, was the leader in global airline catering, especially in America and Europe, until its European arm was sold to Gategroup in 2020. The airline catering market is very fragmented, with only one truly global rival to LSG Group (Gategroup with its Gategourmet brand) and many local/regional suppliers. In addition, logistics companies and restaurant chains have entered the market in recent years, creating industry overcapacity and negative effects on pricing. The growth of LCCs has also reduced in-flight catering on short and medium-haul flights, thus decreasing overall demand in transport catering. Despite difficult market conditions, LSG Group has held its good position. Excluding the sold European business, revenue increased by 18% in 2021, mainly due to the positive development of the North American business, which more than compensated for decreases in Asia.

The group postponed the planned disposal of the remaining parts of the LSG business due to the crisis. The LSG Group is preparing to resume sales activities as part of its strategic and organisational realignment as soon as conditions permit.

Other, service and financial services companies

This segment includes the group's service and financial companies, above all AirPlus, Lufthansa Aviation Training and Lufthansa Systems, as well as Lufthansa group functions.

Lufthansa plans to divest non-core assets, which include AirPlus and the remaining part of LSG business, to focus on its main activities. However, disposals of subsidiaries will only take place when the fair value can be realised.

We maintain our stance that Lufthansa has a strong position within the airlines industry. This is based on the company's leading position not only among worldwide airlines but also MRO providers, bolstered by the expectation that Lufthansa will emerge from the crisis even stronger.

Diversification supports competitive position

Lufthansa's diversification supports its business risk profile. The network of destinations in the passenger airline segment (including Eurowings) is broad in addition to the complementary portfolio of companies. Group revenues are naturally more skewed towards Europe, given the major hubs in the region, but business outside Europe adds to geographic diversification. In 2021, Cargo's and Technik's strong performance successfully counteracted that of the airlines under the group.

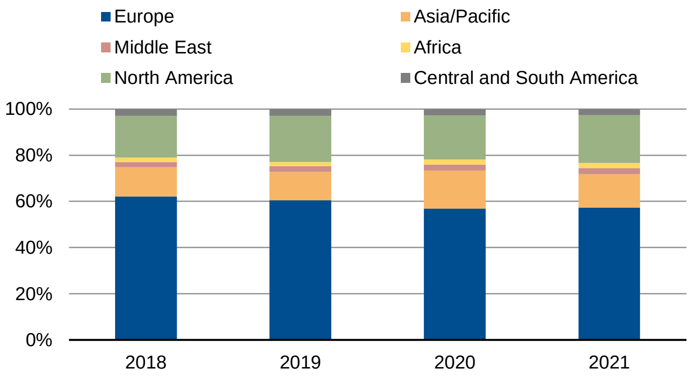
Lufthansa's profitability to recover post pandemic

Lufthansa's profitability remains a weakness in its business risk profile. Lufthansa's EBITDA margin was below that of its peers but this gap narrowed in 2019 following structural cost improvements. In 2020 and 2021, due to the coronavirus outbreak, Lufthansa, along with most other airlines, took a sharp hit in revenues and reported a net loss. The group had to quickly cut costs, specifically fixed costs, and stem the cash drain. Fixed costs were reduced in the short term by over 30% and capital expenditures reduced by around two-thirds compared with the original planning.

Shift of capacity to airlines with lower costs and higher productivity will drive unit cost declines

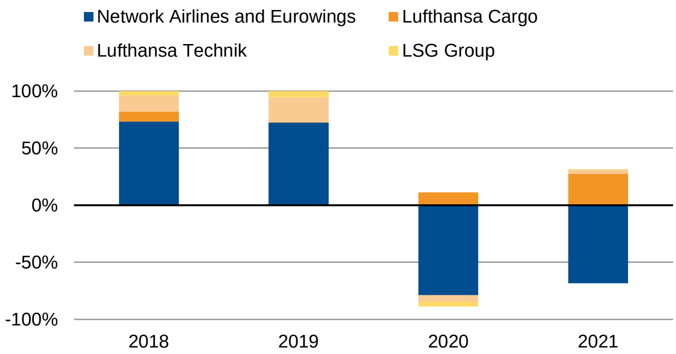
The group's first post-crisis objective is a breakeven EBIT. This will depend on a gradual recovery of air traffic and a simultaneous increase in structural profitability by continuously reducing unit costs, simplifying processes and structures, and improving productivity. The reduction in the cost base affects all group activities. However, controlling labour costs remains challenging given their significant share in the cost structure. The fast rise in fuel prices also cannot be completely offset by measures including hedging. Therefore, ticket prices will have to rise. By 2024, annual costs should structurally be around EUR 3.5bn lower than before the crisis.

Figure 1: Lufthansa geographical split of revenues



Sources: Lufthansa, Scope

Figure 2: Lufthansa share of business segment results (EBIT) over time



Sources: Lufthansa, Scope

Financial risk profile: BB

Credit metrics improving from the pandemic impact

Lufthansa's results have reflected the Covid-19 impact on global aviation traffic. In 2020, group revenue declined by more than 60% and EBITDA fell deep in the red. In 2021, revenue was 24% more than in 2020 however 54% lower than in 2019 while EBITDA was breakeven. When the pandemic broke out, Lufthansa was already restructuring across all operating functions to reduce fixed costs sustainably. With global aviation traffic unlikely to regain pre-Covid-19 levels until 2024, Lufthansa's financial outlook and cash generation will depend strongly on shrinking its overall capacity, including staffing.

Stabilising measures in the wake of the pandemic caused net debt to rise significantly. Quick deleveraging will require strong free cash flows, a higher operating result, strict working capital management, and a focus on investing in projects that add the most value. The group aims to continue reducing costs until 2024.

At the end of 2021, over three-quarters of the measures had been implemented, sustainably reducing annual costs by around EUR 2.7bn. Strict liquidity management and financing measures, particularly the capital increase in October 2021, led to stabilisation measures in Germany being repaid much earlier than planned. Strong free cash flows will be essential to further reducing debt, including the repayment of the additional state-guaranteed loans. The group terminated Swiss stabilization measures in Q2 2022 thanks to increasing bookings and decent cash flow.

The increasing interest rates are prompting Lufthansa towards cheaper financing than bonds such as JOLCO aircrafts financing. The interest rates also resulted in a higher discount rate for pension liabilities, which reduced pension deficit in 2021. The lower pension deficit, combined with strong cash flow, will further strengthen the balance sheet in 2022.

We expect the weak credit metrics since 2020 to improve from 2022 if passenger traffic continues to significantly recover, as it has since Q2. Our financial risk profile assessment places more emphasis on the improved prospects in 2022-23, with SaD/EBITDA expected at below 5x in 2022 and below 3.0x in 2023.

Free operating cash flow may remain low to negative as capital expenditure will go up to around EUR 2.5bn or more due to fleet renewal and operations ramp-up.

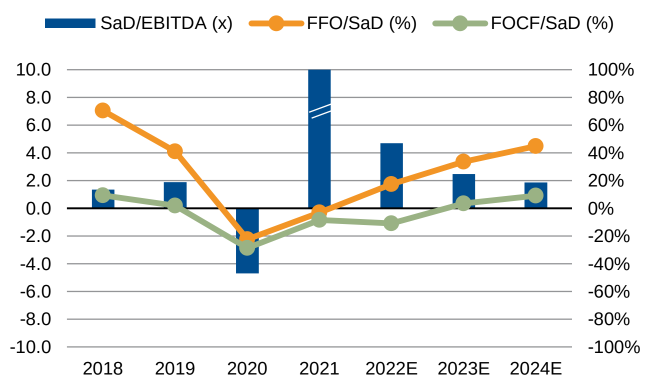
Our analysis of leverage does not account for potential proceeds from non-core divestments (AirPlus and LSG) or the option to sell a minority from Lufthansa Technik. This is because we believe the Lufthansa net debt/EBITDA target of 3.5x can be achieved via strong free cash flow through the traffic recovery, continuing restructuring, cost cuts and possible divestitures.

Adequate liquidity

Lufthansa's liquidity is robust, bolstered by strong efforts to secure and preserve a comfortable cash buffer and reduce cash drain. Liquidity is further strengthened by the undrawn revolving credit lines of EUR 2.1bn as of Q1 2022 and the 84% unencumbered fleet. As of 31 March 2022, Deutsche Lufthansa AG had centrally available balance sheet liquidity of EUR 7.9bn. Altogether, available liquidity can more than cover the EUR 1.69bn in outstanding short-term debt as of Q1 2022 and the negative free operating cash flow forecast for 2022. Starting 2023, we expect free operating cash flow to be positive, supporting the coverage of financial maturities in 2023 in addition to the unrestricted liquidity.

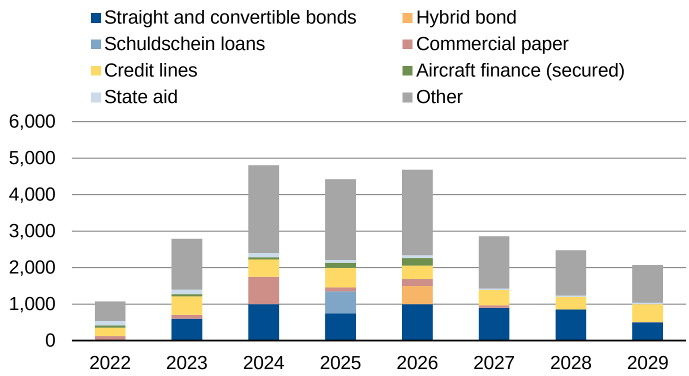
Balance in EUR m	2022E	2023E
Unrestricted cash (t-1)	4,566	5,914
Open committed credit lines (t-1)	2,100	2,100
Free operating cash flow	-1,189	360
Short-term debt (t-1)	1,629	1,396
Coverage	**>200%**	**>200%**

Figure 3: Key credit metrics



Sources: Lufthansa, Scope (estimates)

Figure 4: Debt maturity schedule as of May 2022 in EUR m



Sources: Lufthansa, Scope

Supplementary rating drivers: + 1 notches

In terms of supplementary rating drivers, we decrease by one notch the parent support because the German and Swiss states have lowered their direct exposure. After German and Swiss governments terminated support measures, undrawn commitments were cancelled, limiting available support.

The German government intends to fully divest its stake in Lufthansa by October 2023, currently 14% via its Economic Stabilization Fund. Scope believes visibility on Lufthansa's future level of credit metrics will improve before that happens.

Financial policy continues to be neutral for the rating. The group cannot pay dividends as long as the Economic Stabilization Fund has a stake. The clear aim is to resume paying dividends in the medium to long term once profits return.

Long-term and short-term debt ratings

Senior unsecured debt rating: BBB-

Senior unsecured debt has been rated BBB-, which is in line with the issuer rating.

Subordinated unsecured (hybrid) debt rating: BB

Outstanding subordinated (hybrid) debt remains two notches below the issuer credit rating, at BB. This is due to the features of the hybrid debt placed by the rated entity, primarily its deep contractual subordination (ranking ahead only of ordinary share capital), perpetual tenor and optional deferral (in whole or in part) on every coupon payment date at the discretion of the issuer.

Short-term rating: S-2

The upgrade of short-term rating to S-2 from S-3 is backed by the strong short-term liquidity cover and conservative liquidity management. The rating is further supported by well-established bank relationships and good standing in the capital markets, evidenced by the recently established revolving credit line.

Scope Ratings GmbH

Headquarters Berlin

Lennéstraße 5
D-10785 Berlin

Phone +49 30 27891-0

Frankfurt am Main

Neue Mainzer Straße 66-68
D-60311 Frankfurt am Main

Phone +49 69 66 77 389 0

Paris

10 avenue de Messine
FR-75008 Paris

Phone +33 6 6289 3512

Oslo

Karenslyst allé 53
N-0279 Oslo

Phone +47 21 62 31 42

Madrid

Paseo de la Castellana 141
E-28046 Madrid

Phone +34 91 572 67 11

Milan

Via Nino Bixio, 31
20129 Milano MI

Phone +39 02 30315 814

Scope Ratings UK Limited

London

52 Grosvenor Gardens
London SW1W 0AU

Phone +44 20 7824 5180

info@scoperatings.com
www.scoperatings.com

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