

Appendix C: Traffic forecast

Our NR23 business plan is based on the STATFOR October 2021 forecasts. The underlying assumptions of the high, base and low forecasts are as follows:

- > **High case:** recovery to 2019 levels by end of 2023 (Europe: mid 2023), based on a widely available and effective vaccine worldwide, good levels of passenger confidence and supported by a 'consumer boom' fuelled by pent up demand and savings accumulated over the pandemic
- > **Base case:** recovery to 2019 levels by end of 2025 (Europe: end of 2023), based on an effective international vaccine roll-out, easing of travel constraints boosting passenger confidence
- > **Low case:** recovery to 2019 levels after 2027, based on continued levels of Covid-19 infection, frequent reintroduction of lockdowns, an ineffective vaccine programme, and low passenger confidence

Once traffic has returned to 2019 levels, future growth is projected to be linked to underlying economic performance, constrained by airport capacity, which is likely to remain an ongoing issue throughout NR23. In the STATFOR October 2021 base case, flights are projected to be 2% higher by 2027 than 2019 levels. By way of comparison, in 2024 (ie midway through the NR23 period), the STATFOR October 2021 base case forecast is around 10% lower than the pre pandemic forecast.

STATFOR will issue forecast updates in May 2022 and October 2022. They are already indicating that traffic is now likely to trend towards their pessimistic scenario in the short term¹.

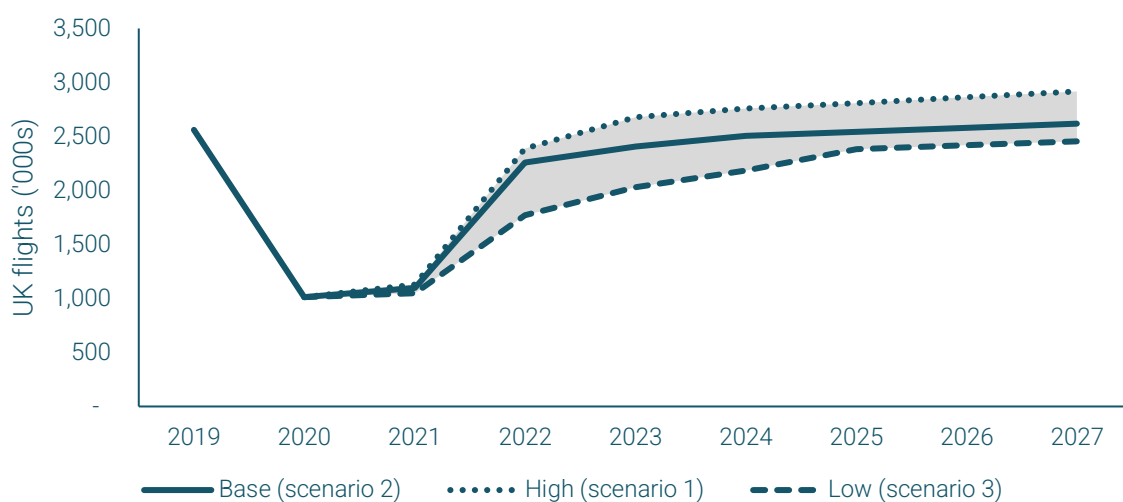
Given this uncertainty, it will be critical for NERL to have the opportunity to reassess our plan in light of these new forecasts to ensure resourcing and service performance outcomes are appropriately calibrated to the projected traffic levels.

¹<https://www.eurocontrol.int/covid19>

En route: flights

The STATFOR October 2021 UK Flight Information Region (FIR) flights forecast presented below has been derived by applying STATFOR's forecast growth rates for the UK to the Network Manager UK FIR flight numbers.

This forecast informs our operational resourcing plans ([Appendix G](#)), our projected service performance outcomes ([Appendix E](#) and [Appendix F](#)) and the expected benefits from the capital programme ([Appendix H](#)).



STATFOR October 2021 UK flights (derived) forecast

UK flights ('000s)	2019	2020	2021	2022	2023	2024	2025	2026	2027
	Actual	Actual	Forecast	Plan	Plan	Plan	Plan	Plan	Plan
High case (scenario 1)			1,128	2,387	2,678	2,757	2,809	2,867	2,917
% vs 2019			44%	93%	105%	108%	110%	112%	114%
Base case (scenario 2)	2,560	1,012	1,100	2,256	2,404	2,507	2,542	2,581	2,618
% vs 2019		40%	43%	88%	94%	98%	99%	101%	102%
Low case (scenario 3)			1,049	1,773	2,029	2,184	2,380	2,418	2,455
% vs 2019			41%	69%	79%	85%	93%	94%	96%

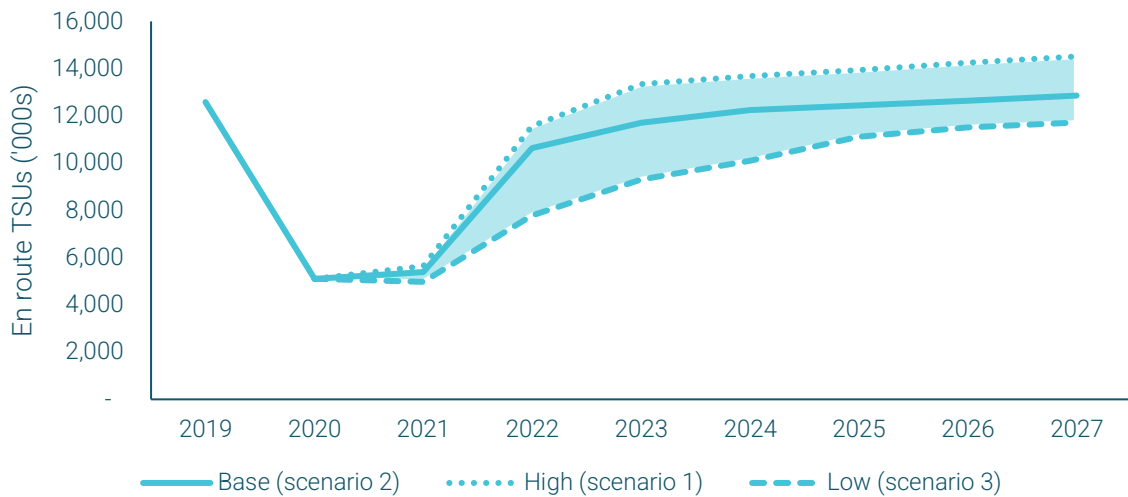
STATFOR October 2021 UK flights (derived) forecast

En route: total service units

En route service units are used to charge airspace users for the cost of air navigation services for each flight. The en route service unit for a specific flight is the product of the distance flown and the square root of the Maximum Take Off Weight for the aircraft. The service units forecast combines the flights forecast and the forecast for distances flown and aircraft weights. Total Service Units (TSUs) forecast represents the sum of service units for all forecast flights in UK en route airspace in NR23.

The STATFOR October 2021 UK TSU forecast is shown below, and has been calculated by applying the STATFOR UK TSU growth rates to the published Eurocontrol Central Route Charging Office UK TSU data, to ensure consistency between the forecast and charges.

This forecast is used to calculate en route Determined Unit Costs and prices ([Appendix I](#)).



STATFOR October 2021 en route TSUs (derived)

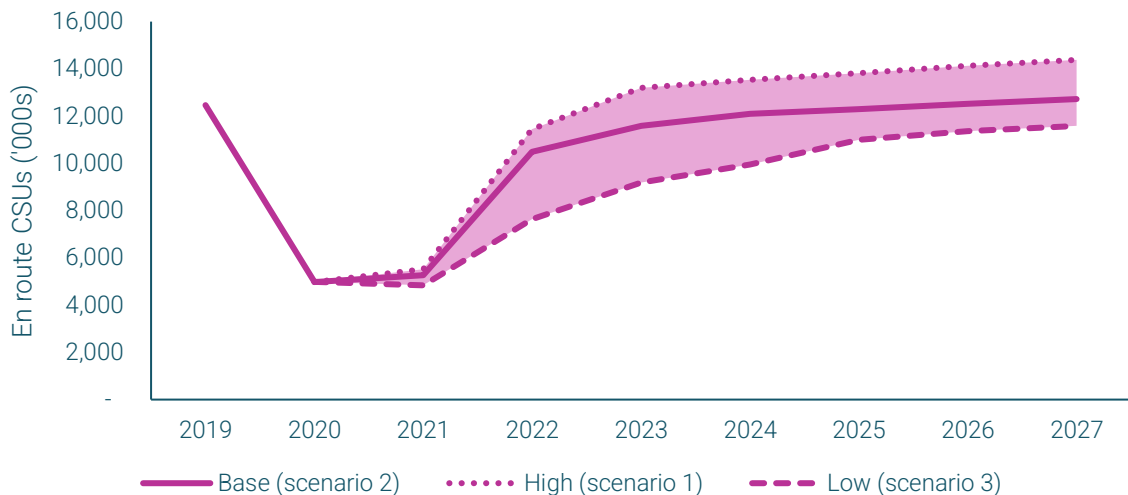
En route TSUs ('000s)	2019	2020	2021	2022	2023	2024	2025	2026	2027
	Actual	Actual	Forecast	Plan	Plan	Plan	Plan	Plan	Plan
High case (scenario 1)			5,654	11,570	13,334	13,673	13,948	14,259	14,516
% vs 2019			45%	92%	106%	109%	111%	113%	115%
Base case (scenario 2)	12,593	5,102	5,399	10,630	11,722	12,235	12,431	12,649	12,858
% vs 2019		41%	43%	84%	93%	97%	99%	100%	102%
Low case (scenario 3)			4,973	7,781	9,313	10,098	11,129	11,502	11,718
% vs 2019			39%	62%	74%	80%	88%	91%	93%

STATFOR October 2021 en route TSUs (derived) forecast

En route: chargeable service units

Chargeable Service Units (CSUs) represent service units relating to the provision of air navigation services in UK airspace for which the user is required to pay. These exclude civil and military exempt flights as defined within the charging regulations and principles applied by the Central Route Charges Office, of which the UK is a member. STATFOR do not produce a CSU forecast, therefore, the CSU forecast shown below is calculated by deducting military and civil exempt flights from STATFOR’s TSU forecast, and then applying growth rates at the same level as the STATFOR TSU forecast.

This forecast is used to calculate en route Determined Unit Costs and prices ([Appendix I](#)).



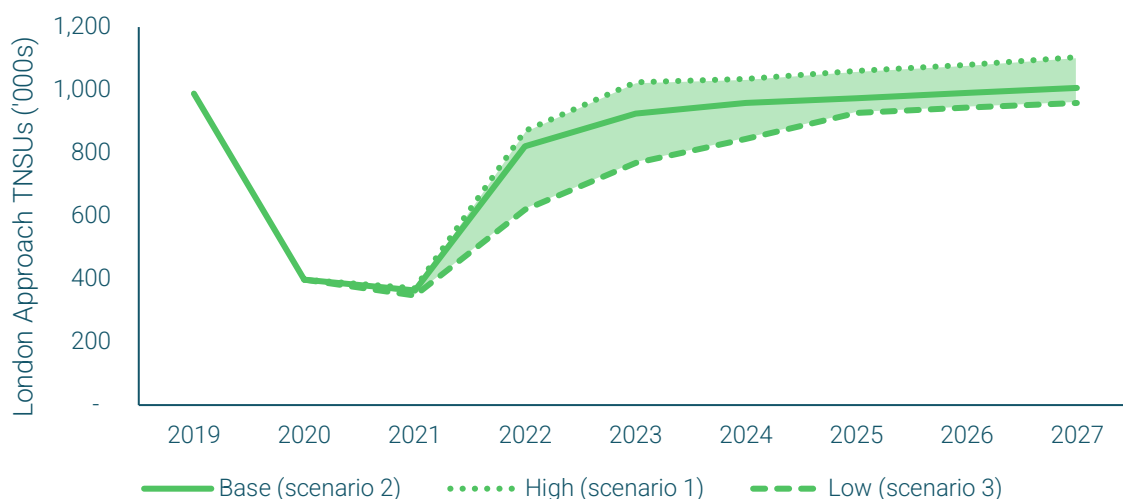
STATFOR October 2021 en route CSUs (derived) forecast

En route CSUs	2019	2020	2021	2022	2023	2024	2025	2026	2027
('000s)	Actual	Actual	Forecast	Plan	Plan	Plan	Plan	Plan	Plan
High case (scenario 1)			5,508	11,434	13,198	13,536	13,811	14,122	14,379
% vs 2019			44%	92%	106%	109%	111%	113%	115%
Base case (scenario 2)	12,453	4,976	5,263	10,494	11,585	12,099	12,294	12,512	12,721
% vs 2019		40%	42%	84%	93%	97%	99%	100%	102%
Low case (scenario 3)			4,837	7,645	9,176	9,961	10,992	11,365	11,582
% vs 2019			39%	61%	74%	80%	88%	91%	93%

STATFOR October 2021 en route CSUs (derived) forecast

London Approach: terminal navigation service units

The Terminal Navigation Service Units (TNSUs) forecast is provided directly by STATFOR and relates to traffic operating in the London Approach area, which covers Heathrow, Gatwick, Stansted, Luton, London City and Biggin Hill airports. This forecast is used to calculate London Approach Determined Unit Costs and prices ([Appendix I](#)).



STATFOR October 2021 London Approach TNSUs forecast

London Approach TNSUs	2019	2020	2021	2022	2023	2024	2025	2026	2027
('000s)	Actual	Actual	Forecast	Plan	Plan	Plan	Plan	Plan	Plan
High case (scenario 1)			371	870	1,024	1,035	1,061	1,080	1,104
% vs 2019			37%	88%	104%	105%	107%	109%	112%
Base case (scenario 2)	989	399	364	821	926	959	974	991	1,007
% vs 2019		40%	37%	83%	94%	97%	99%	100%	102%
Low case (scenario 3)			348	620	769	844	928	945	959
% vs 2019			35%	63%	78%	85%	94%	96%	97%

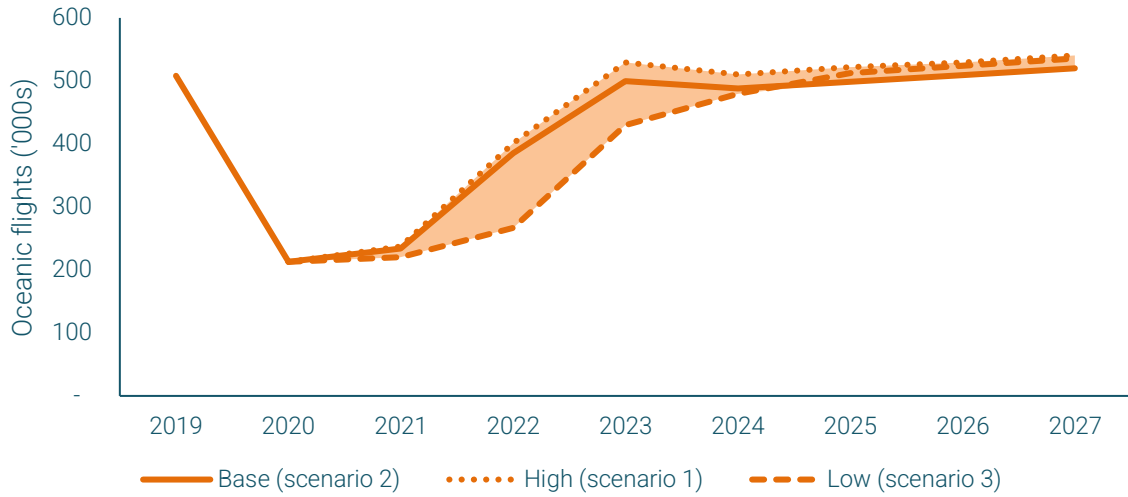
STATFOR October 2021 London Approach TNSUs forecast

Oceanic flights

STATFOR do not produce a dedicated oceanic forecast, therefore we have derived a forecast for traffic across the North Atlantic from various underlying STATFOR data sets. The growth rates for traffic flows that would enter the North Atlantic are calculated from the STATFOR data and these are then applied to the 2020 actual flights. We note a discrepancy in the STATFOR October data in which the low scenario is higher than the base case scenario from 2025 onwards; we have discussed this with

STATFOR and will be working with them to revisit the North Atlantic flow assumptions for the May 2022 forecast update.

This forecast is used to calculate oceanic core charges and ADS-B data charges ([Appendix I](#)), together with the requirements for operational resourcing ([Appendix G](#)).



STATFOR October 2021 oceanic forecast (derived)

Oceanic flights ('000s)	2019	2020	2021	2022	2023	2024	2025	2026	2027
	Actual	Actual	Forecast	Plan	Plan	Plan	Plan	Plan	Plan
High case (scenario 1)			237	401	530	511	521	530	540
% vs 2019			47%	79%	105%	101%	103%	105%	107%
Base case (scenario 2)	505	209	234	386	499	488	498	509	520
% vs 2019		41%	46%	76%	99%	97%	99%	101%	103%
Low case (scenario 3)			220	267	430	479	513	524	536
% vs 2019			44%	53%	85%	95%	101%	104%	106%

STATFOR October 2021 oceanic forecast (derived)

Oceanic flights ('000s)	2019	2020	2021	2022	2023	2024	2025	2026	2027
	Actual	Actual	Forecast	Plan	Plan	Plan	Plan	Plan	Plan
North Atlantic flights	477	201	224	367	475	462	469	479	489
Tango flights	28	8	10	19	24	26	29	30	31
Total oceanic flights	505	209	234	386	499	488	498	509	520

STATFOR October 2021 North Atlantic and Tango flights forecast (derived)