2 FORECASTS

14 CFR PART 150 UPDATE

CHAPTER 2. FORECASTS

San Diego International Airport (SDIA) is a vital component of the National Plan of Integrated Airport Systems (NPIAS) and the California system of airports. Forecasts for this study were developed as part of a separate concurrent project, the Airport Development Plan (ADP), for 2018 through 2050. These forecasts are presented in detail in the 2019 Aviation Activity Forecast Update Technical Report (2019 Forecast Report), included in **Appendix D - Forecast**. Since these forecasts were completed concurrent with the start of this Title 14, Code of Federal Regulations (CFR) Part 150 Study Update (14 CFR Part 150 Study), using them as a basis for this study maintains consistency with the other planning studies. Since the onset of the COVID-19 pandemic, operations temporarily have dropped off substantially at the Airport. The FAA has determined that even though the 2019 approved forecasts do not take into account the COVID-19 pandemic, they are appropriate for use in this 14 CFR Part 150 Study for land use compatibility efforts. This is further discussed in **Appendix L - Pandemic Forecast Analysis**. However, the forecasts will be updated for the next NEM Update.

2.1 BACKGROUND

Projections of aviation demand developed as part of the 2019 Forecast Report were prepared according to guidance in Federal Aviation Administration (FAA) Advisory Circular (AC) 150/5070-6B, *Airport Master Plans*. Though the technical report includes forecasts up to 2050, only the 2018 (existing) and forecast 2026 (future) were used for this 14 CFR Part 150 Study to reflect the planning horizon that is required. A 14 CFR Part 150 Study calls for a five-year planning horizon, with the existing contours reflecting the last full year of actual operational data and the future contours being approximately five years after the date of submittal. The 2019 Aviation Activity Forecast Update Technical Report provided scenarios for a constrained forecast and an unconstrained forecast.

Due to the physical restraints of the surrounding environment that limit future air and landside facility modification at SDIA, a constrained forecast is used because it aligns with what can actually operate with the one runway airfield. The constrained forecasts for 2018 and 2026 are used to provide the basis for several operational inputs into the Aviation Environmental Design Tool (AEDT) used for this 14 CFR Part 150 Study. The FAA approved these forecasts on June 19, 2019 (see **Appendix D - Forecast** for the approval letter and the 2019 Forecast Report).

A 14 CFR Part 150 Study would be incomplete without preparation of the Noise Exposure Maps (NEMs). The NEMs identify the existing and future noise exposure (typically five years forward from the NEM date of submission) using the AEDT. AEDT generates a noise exposure contour map for a particular year using calculations based on the number of aircraft operations, the types of aircraft (fleet mix), and the time of day (day or night) that the activity occurs. 2018 data, retrieved from SDCRAA records, served as the base year because it was the last full year of operations at the time this 14 CFR Part 150 Study began. The future base case examined will be 2026, or approximately five years from the date of expected submission of the contours to FAA. More information about the methods of forecast development is available in the 2019 Report.

2.2 EXISTING OPERATIONS AND FORECASTS SUMMARY

This section presents the summary of the existing operations for 2018. As stated above, 2018 provided the last full year of data available that represented "normal" operations, without major operational changes (such as runway closures due to maintenance). This section also presents the summary of the forecasts developed for 2026 in the 2019 Aviation Activity Forecast Update Technical Report by LeighFisher. **Table 2.1** presents the aircraft operations by aircraft category.

TABLE 2.1 **SUMMARY OF FORECASTED AIRCRAFT OPERATIONS BY AIRCRAFT CATEGORY**

Year	Aircraft Category					Total Operations
	Air Carrier/ Cargo Operations	Air Taxi/ Charter Operations	General Aviation Operations	Military Operations	Helicopter	
2018	212,430	365	11,680	760	365	**225,570**
2026	247,105	730	9,855	730	365	**258,785**

SOURCE: 2019 Aviation Activity Forecast Update Technical Report, LeighFisher.
NOTE: The forecast was further extrapolated for additional years (2026) for noise analysis by HMMH and KB Environmental.