

Noise Abatement Procedure (NAP) Adherence Investigation

Melbourne Airport Preferred Flight Paths 2.2 and 2.3

NAP 2.2 directs that ATC shall normally process Instrument flight rules (IFR) departures via Standard Instrument Departures (SIDs). Where aircraft is not following procedural SID, ATC shall process aircraft via paths that approximate relevant SID tracks where possible, and in compliance with height restrictions.

Issue identified (NAP 2.2): Data from June 2025 demonstrated lower than expected use of the NAP of 68.3% while typical numbers across the NAPs above 80%, thus we identified the need to investigate the results further.

NAP 2.3 directs that IFR arriving aircraft must be processed via Standard Instrument Arrival (STAR) tracks (where available), although aircraft may be radar vectored from STAR down-wind or base leg to final approach. Otherwise, STAR tracking may only be varied if essential for sequencing or separation. Non-STAR tracking must comply with altitude restrictions.

Issue identified (NAP 2.3):

Data from July 2025 demonstrated lower than expected use of the NAP below 80%, thus we identified the need to investigate the results further.

Investigation: Held meeting with Airservices Noise and Flight Path Monitoring System supplier Envirosuite (EVS), Environmental Assessment team and air traffic control (ATC) to examine historical flight tracks and ATC operations against EVS parameters of compliance for the reporting.

Outcome:

NAP 2.2 - Determined the compliance 'gates' of SIDs set by EVS (currently set as a standard 1.8km either side of the SID) needed to be adjusted to account for real world operations, for example, different aircraft performance (e.g. large heavy aircraft take wider turns which currently show up as non-compliant although they are). Adjustment also required for tracks that 'approximate' the SIDs as these are currently not captured as compliant.

NAP 2.3 - EVS confirmed the current reporting only reflected IFR arriving aircraft via STARs and did not include radar vectors, hence the radar vectored aircraft are showing as non-compliant. ATC provided guidance on the radar vectors typical areas (on STAR down-wind or base leg to final approach).

Actions: EVS worked to refine parameters and backdate all current reports to match new parameters. The refinements were applied from November 2025 and the following notes added to the website to explain difference in data accessed prior to the change:

NAP 2.2 – “This NAP notes the need to “approximate” the SID where the procedural SID is not being flown. As we worked on defining the corridor that aircraft should be within for approximation, initial reporting on this NAP prior to 28 November 2025 were departures using the procedural SID corridor only without any variance for approximation. As such, reporting accessed prior to 28 November will show a lower adherence result.”

NAP 2.3 – “This NAP notes that aircraft can be vectored at particular points which will take them off the STAR approach. As we worked on defining these points, initial reporting on this NAP prior to 28 November 2025 reported arrivals using STAR tracking only without variance for radar vectors. As such, reporting accessed prior to 28 November will show a lower adherence result.”