
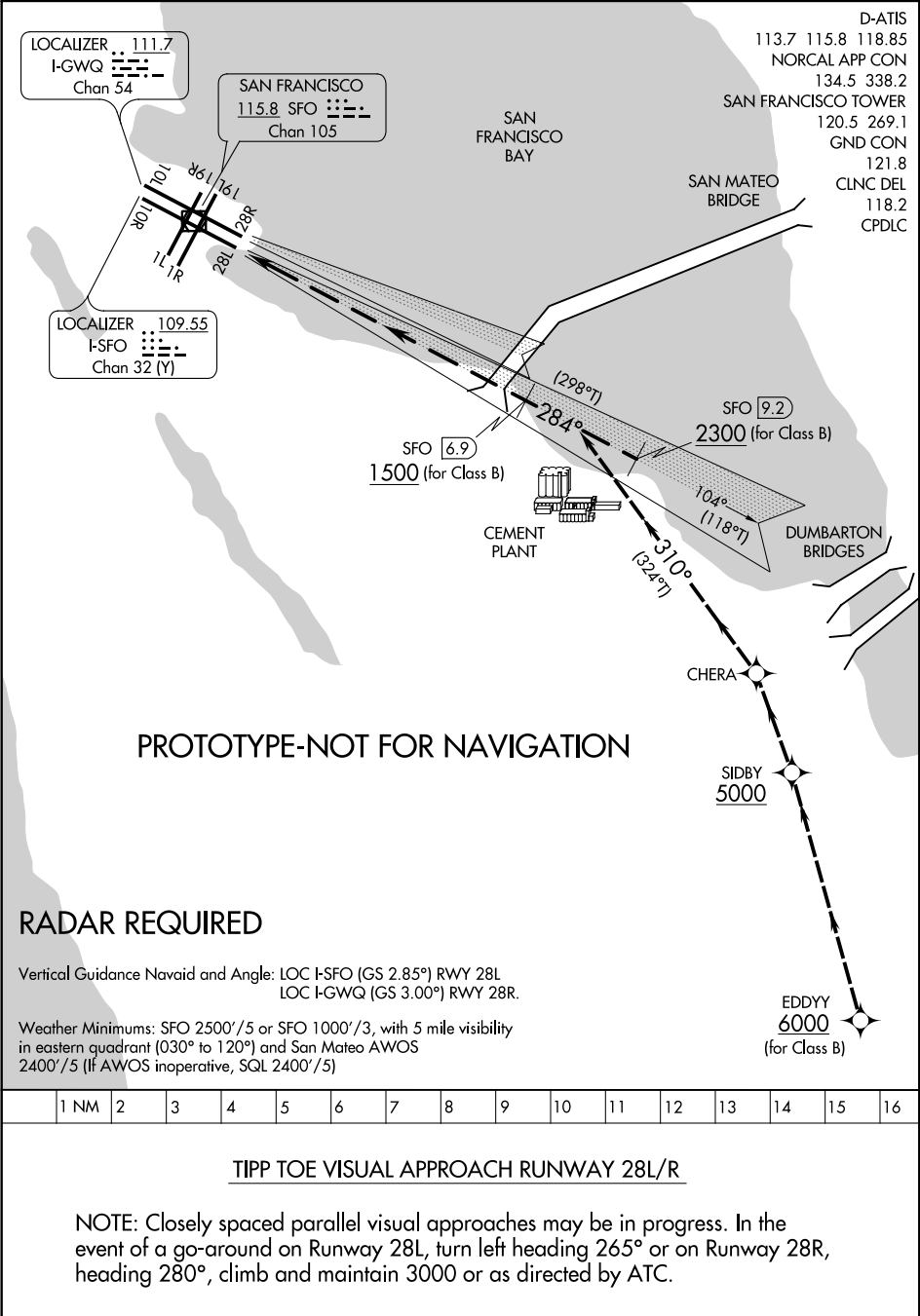
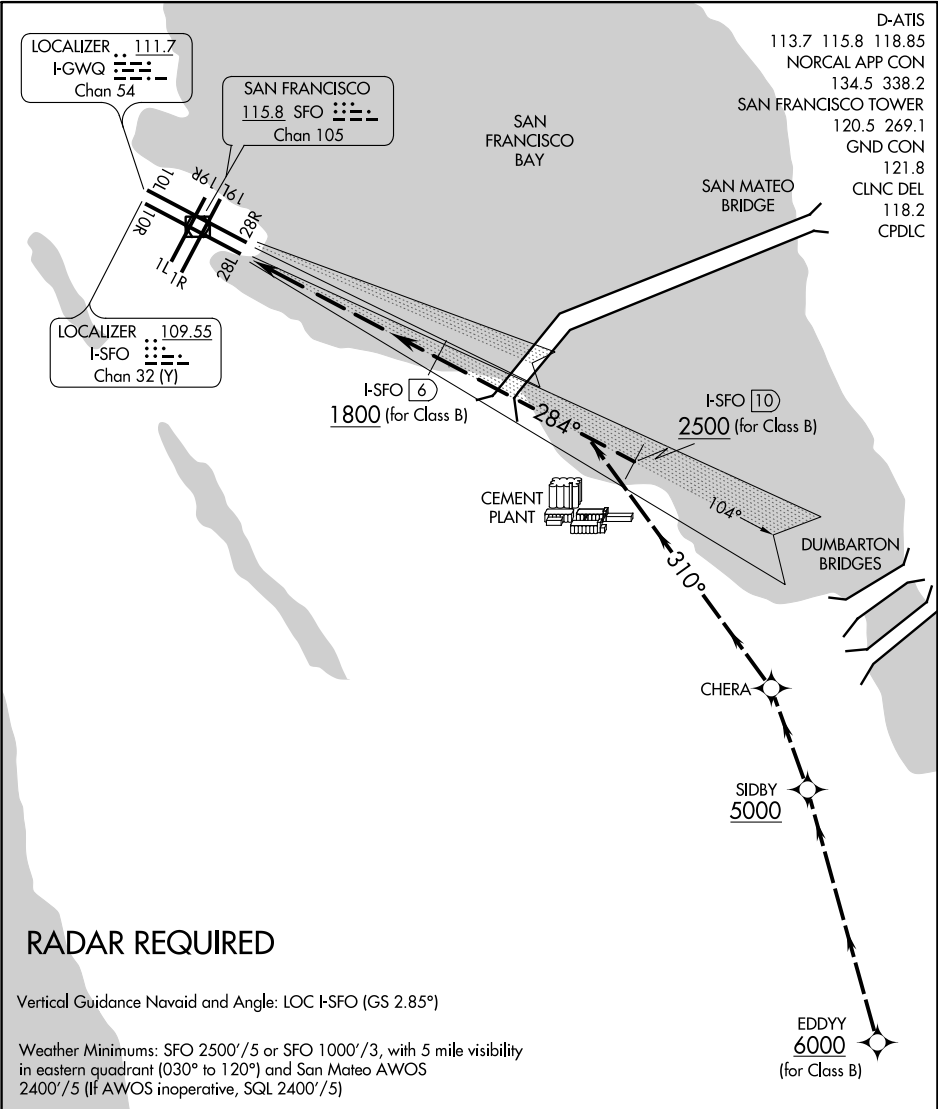


Flight Procedures Cover Page	Task Action: FLIGHT CHECK	Task Type: IAP	Estimated Chart Date: 01/27/2022	APWS Task ID: F86A7EA188A44FE082859455DF81A887	APWS Project ID: D5FC1EC85BF04250A5CA9A55080E284E
Procedure: TIPP TOE VISUAL RWY 28L/R AMDT 3		Enroute: NO	Specialist: Buntin, Karlie		Agreement Number:
Airport ID: KSFO			Airport City: SAN FRANCISCO		State: CA
Facility ID:	Facility Type:	Flight Inspection Remark Type: New FC Slot			
<p>Procedure Comments:</p> <p>Change charted altitude for Class B to "at or above 1500" at the SFO 6.9 DME and to "at or above 2300" at the SFO 9.2 DME. Change DME source from I-SFO to SFO.</p> <p>Active Airport Data Used</p> <p>Contact Jon Denton: 405-954-5467</p> <div style="text-align: right; margin-right: 100px;"> <i>Digitally signed by</i> JON DENTON Jan 18, 2022 </div>					

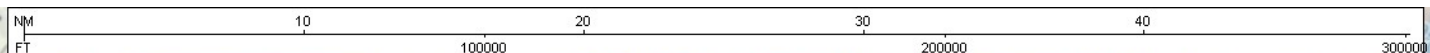


FIPC BASIC FORM							
PROCEDURE: TIPP TOE VISUAL RWY 28L/R AMDT 3			AIRPORT NAME: SAN FRANCISCO INTL		AIRPORT ID: KSFO	SPECIAL CONTROL NO: S-12-011-21	
FAC ID: KSFO		CITY: SAN FRANCISCO			ST: CA	ORIG CHART DATE: 03/24/2022	
DFL TYPE: CVFP	THIRD PARTY: <input type="checkbox"/> YES	EST. TIME ON SITE: 0.5	REIMB. NUMBER:		PTS TASK ID:		
PREFLIGHT NOTES							
REVIEWER:					DATE:		
COMMENTS:					CHECK ONE:		
					<input type="checkbox"/> FLT CK REQ <input type="checkbox"/> NFCR <input type="checkbox"/> REJECT		
							YES
					CPV COMPLETE?		X
PROCEDURE RESULTS							
INSPECTION DATE: 01/13/2022	CREW #: VN234	N #: N68	INSTRUMENT PROCEDURE STATUS: <input checked="" type="checkbox"/> SAT <input type="checkbox"/> SAT W/CHANGES <input type="checkbox"/> UNSAT			ARINC CODING: <input type="checkbox"/> SAT <input type="checkbox"/> SAT/GOLD <input type="checkbox"/> UNSAT	
FLIGHT INSPECTOR SIGNATURE: daniel c favorite @ 01/14/2022 07:43			PRINTED NAME: FAVORITE, DANIEL CHARLES				NOTAM INITIATED? <input type="checkbox"/> YES <input checked="" type="checkbox"/> NO
FLIGHT INSPECTOR REMARKS: Procedure flown Sat. SFO DME added to support final altitudes							
IN-FLIGHT OBSTACLE REPORT							
OBSTRUCTION ID #:	COORDINATES OR LOCATION:	GNSS ALTITUDE (MSL):	BAROMETRIC ALTITUDE (MSL):		HEIGHT ABOVE GROUND LEVEL:		





1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
TIPP TOE VISUAL APPROACH RUNWAY 28L/R															
NOTE: Closely spaced parallel visual approaches may be in progress. In the event of a go-around on Runway 28L, turn left heading 265° or on Runway 28R, heading 280°, climb and maintain 3000 or as directed by ATC.															



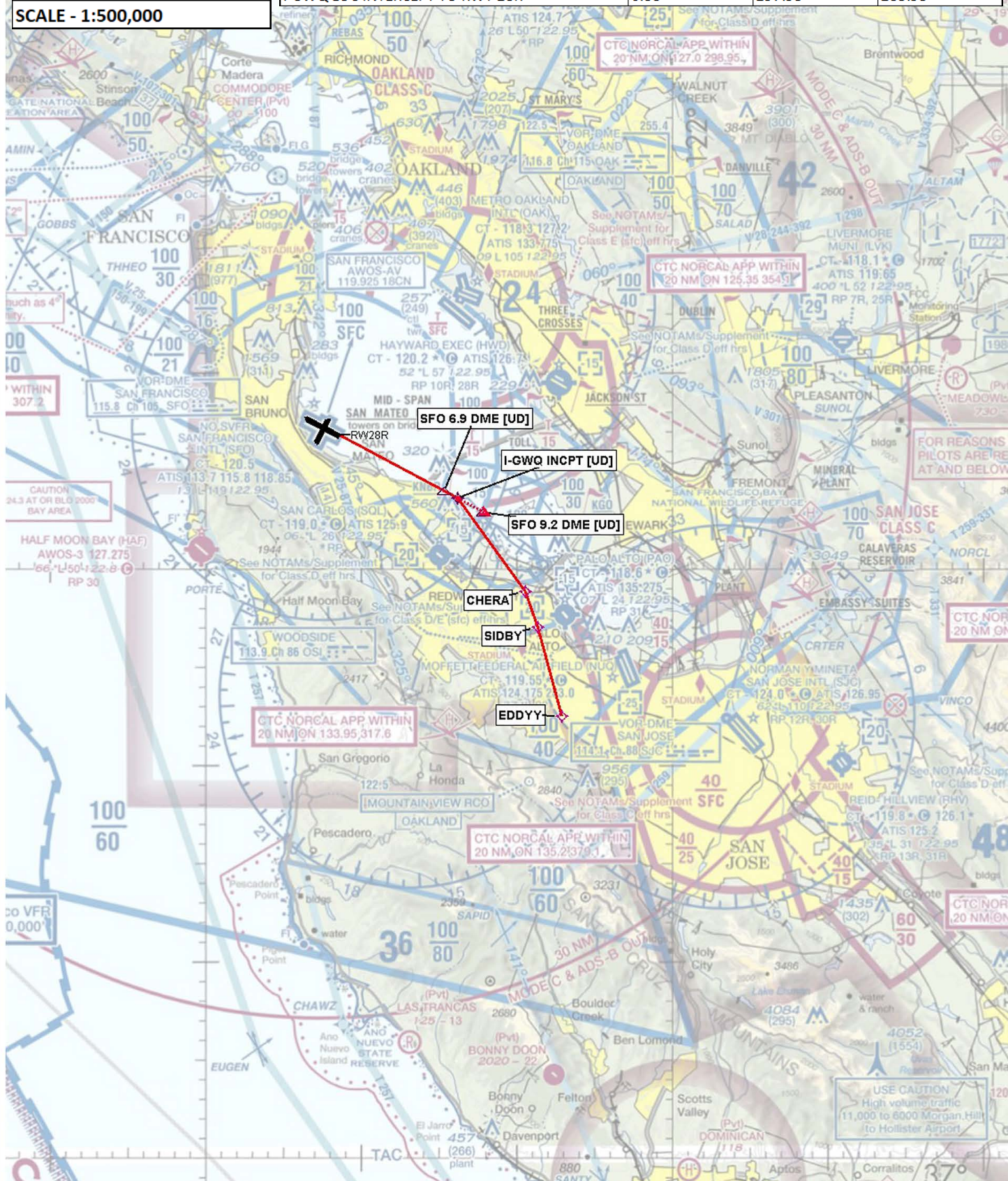
KSFO, SAN FRANCISCO, CA	SEGMENT	DISTANCE (NM)	COURSE (T)	COURSE (M)
	EDDYY TO SIDBY	4.71	344.71	330.71
	SIDBY TO CHERA	1.93	340.44	326.44
	CHERA TO I-SFO LOC INTERCEPT (ON 310° MC)	5.59	324.00	310.00
	I-SFO LOC INTERCEPT TO RWY 28L	7.13	297.92	283.92
AMDT 3				
SCALE - 1:500,000				



NM	10	20	30	40
FT	10000	20000	30000	40000

KSFO, SAN FRANCISCO, CA
TIPP TOE VISUAL RWY 28L/R
RWY 28R
AMDT 3
SCALE - 1:500,000

SEGMENT	DISTANCE (NM)	COURSE (T)	COURSE (M)
EDDYY TO SIDBY	4.71	344.71	330.71
SIDBY TO CHERA	1.93	340.44	326.44
CHERA TO I-GWQ LOC INTERCEPT (ON 310° MC)	5.86	324.00	310.00
I-GWQ LOC INTERCEPT TO RWY 28R	6.88	297.93	283.93



**U.S. DEPARTMENT OF TRANSPORTATION
FEDERAL AVIATION ADMINISTRATION
CATEGORICAL EXCLUSION DECLARATION**

**San Francisco International Airport
San Francisco, California**

TIPP TOE VISUAL RWY 28L/R


Description of Action:

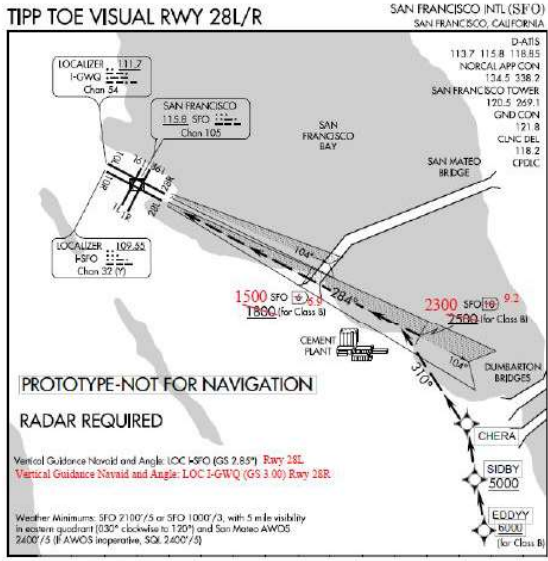
The Federal Aviation Administration (FAA) is proposing to amend the TIPP TOE charted visual approach procedure to Runway (RWY) 28 Left and Right (L/R) for San Francisco International Airport (KSFO) by utilizing the San Francisco (SFO) Very High Frequency Omnidirectional Range (VOR)/Distance Measuring Equipment (DME) instead of the SFO Instrument Landing System (ILS)/DME, while still maintaining Class B airspace containment.

The following table lists the proposed amendments:

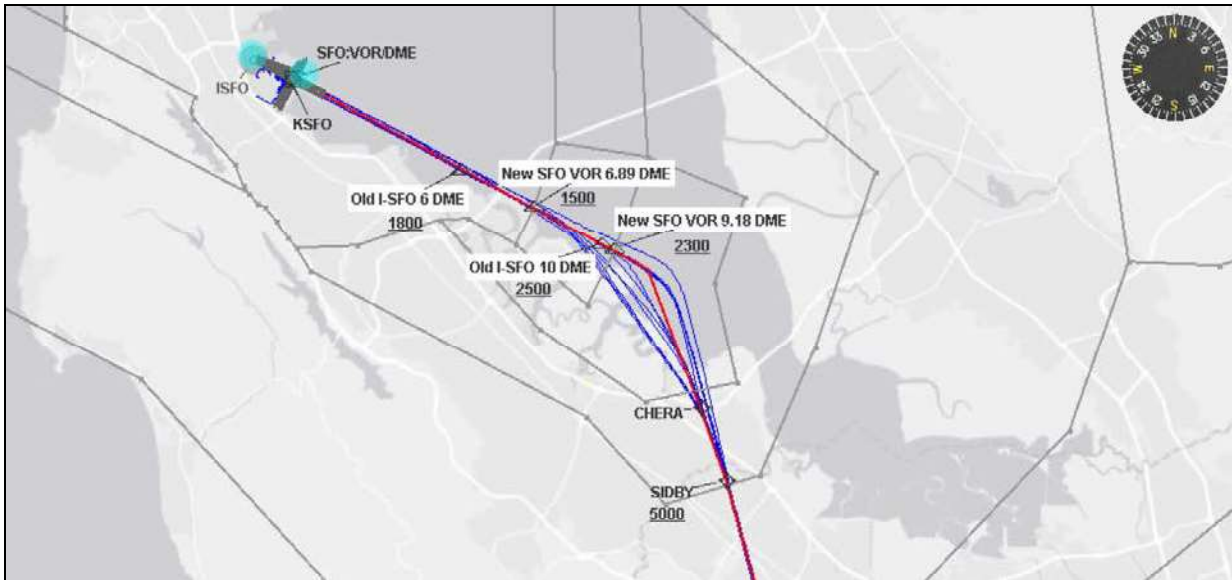
Procedure Name	Proposed Amendments
TIPP TOE Visual 28L/R	<ul style="list-style-type: none">- The DME source for the two step-down fix locations will be changed from SFO ILS DME (I-SFO) to the SFO VOR/DME. The VOR is approximately 1.1 Nautical Mile (NM) east of the ILS DME.- The current I-SFO 6 DME step-down fix will be replaced with a SFO 6.9 VOR/DME step-down fix with a minimum altitude restriction of 1,500 feet Mean Sea Level (MSL). The new crossing restriction will be approximately 2 NM east of the previous crossing restriction.- The current I-SFO 10 DME step-down fix will be replaced with a SFO VOR/DME 9.2 DME step-down fix with a minimum altitude restriction of 2,300 feet MSL. The new step-down fix will be approximately 0.3 NM east of the previous crossing restriction.- Vertical guidance navigational charting notes will be amended by adding vertical guidance for RWY 28R.- Changes to aircraft altitudes or ground tracks are not anticipated as a result of the proposed actions.

The above-mentioned amendments are indicated in red on the following current procedure chart and description.

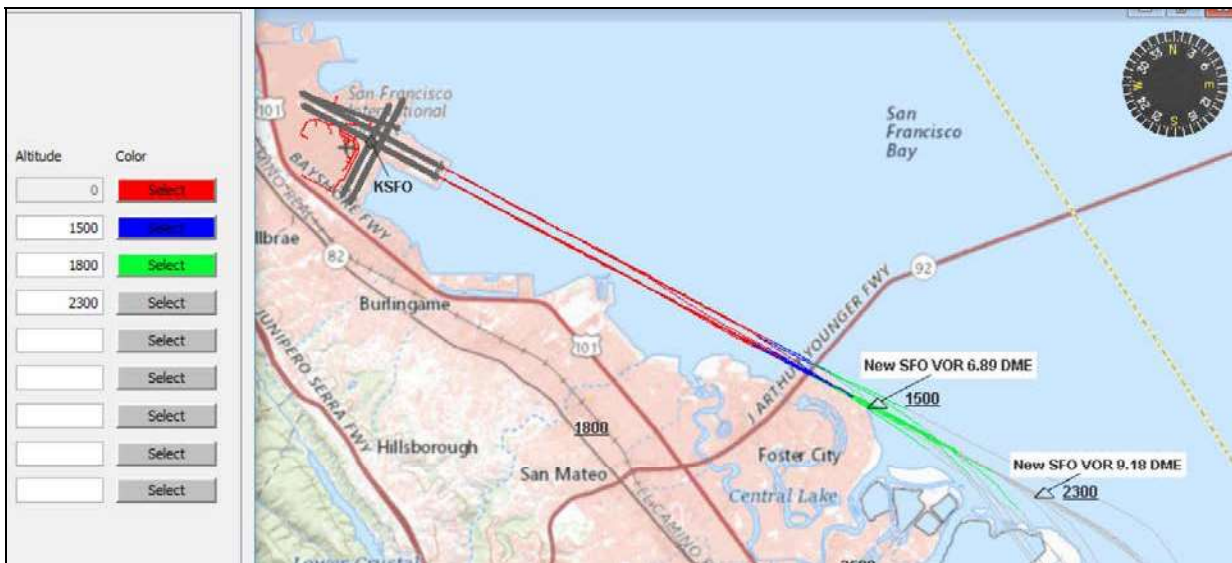
 Charted Visual Flight Procedures (CVFP)		Bearings, courses, and radials are magnetic. Elevations and altitudes are in feet MSL. Altitudes are recommended unless otherwise indicated. Ceilings are in feet above airport elevation. Distances are in nautical miles except visibilities which are in statute miles.	
CVFP Name	Airport Name	City and State	
TIPP TOE VISUAL RWY 28L/R	SAN FRANCISCO INTL	SAN FRANCISCO, CA	
VISUAL ARRIVAL ROUTE			
FROM (visual landmarks)	TO (visual landmarks)	COURSE (if desired)	ALTITUDE (if needed) Show if for Class B
EDDDY WP SIDBY WP CHERA WP	SIDBY WP CHERA WP INTERCEPT I-SFO LOCALIZER	310.00	AT/ABOVE 5000
Weather Minima: Ceiling _____ Visibility _____ Notes: SFO 2500/5 OR SFO 1000/3 WITH 5 MILE VISIBILITY IN EASTERN QUADRANT (030 TO 120) AND SAN MATEO A/WOS 2400/5 (IF A/WOS INOPERATIVE, SQL 2400/5)		Supplementary Navaid/Waypoint Information and Additional Landmarks NOTES: CLOSELY SPACED PARALLEL VISUAL APPROACHES MAY BE IN PROGRESS. IN THE EVENT OF A GO-AROUND ON RWY 28L, TURN LEFT HEADING 265 OR ON RWY 28R, HEADING 280, CLIMB AND MAINTAIN 3000 OR AS DIRECTED BY ATC. CHART: I-GWQ LOCALIZER, CEMENT PLANT, SAN MATEO BRIDGE, DUMBARION BRIDGES. (CONT'D)	
Vertical Guidance Navaid and Angle: I-SFO LOCALIZER (GS 2.85) Rwy 28L and LOC I-GWQ (GS 3.00) for Rwy 28R			
Description of route (will not be printed on chart) EDDYY AND PROCEED TO SIDBY AT/ABOVE 5000. NORTH TURN AT SIDBY TO CHERA. FOLLOWING CHERA, 310 HEADING TO INTERCEPT THE LOCALIZER. IN THE EVENT OF A GO-AROUND ON RWY 28L, TURN LEFT ON HEADING 265. FOR A GO-AROUND ON RWY 28R, HEADING 280, CLIMB AND MAINTAIN 3000 OR AS DIRECTED BY ATC.			
NOTES (CONT'D): 2300 SFO 9.2 1500 SFO 6.9 CHART: AT/ABOVE 2500 AT I-SFO 4-DME (FOR CLASS B), AT/ABOVE 1800 AT I-SFO 6-DME (FOR CLASS B), AT/ABOVE 6000 AT EDDYY (FOR CLASS B) CHART: RADAR REQUIRED.			
Amdt. No. or Orig.	Effective Date	Supersedes	Amdt. No.
2		TIPP TOE VISUAL RWY 28L/R	1
		Dated	8/22/2013
FAA Form 7110-8 (8-96) Supersedes Previous Edition		NSN: 0052-00-890-3001	

Graphic Depiction:  <p>TIPP TOE VISUAL RWY 28L/R</p> <p>PROTOTYPE-NOT FOR NAVIGATION</p> <p>RADAR REQUIRED</p> <p>Vertical Guidance Navaid and Angle: LOC I-SFO (GS 2.85) Rwy 28L Vertical Guidance Navaid and Angle: LOC I-GWQ (GS 3.00) Rwy 28R</p> <p>Weather Minimums: SFO 2100/5 or SFO 1000/3, with 5 mile visibility in eastern quadrant (030° clockwise to 120°) and San Mateo A/WOS 2400/5 (IF A/WOS inoperative, SQL 2400/5)</p> <p>Communications to be charted: D-ATIS 113.7 115.8 NORCAL APP CON 134.5 338.2 SFO TOWER 120.5 269.1 GND CON 121.8 CLNC DEL 118.2 CPDLC </p>	SAN FRANCISCO INTL (SFO) SAN FRANCISCO, CALIFORNIA D-ATIS 113.7 115.8 118.5 NORCAL APP CON 134.5 338.2 SAN FRANCISCO TOWER 120.5 269.1 GND CON 121.8 CLNC DEL 118.2 CPDLC SAN MATEO BRIDGE CEMENT PLANT DUMBARION BRIDGES CHERA SIDBY 5000 EDDYY 6000 (for Class B)
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The following figure shows the proposed notional TIPP TOE visual approach procedure (red line) superimposed on sample arrival tracks (blue) that appear to follow TIPP TOE path. The figure also depicts the Class B airspace boundaries (grey lines). The 30-day track data is from September 2019 and was obtained from the FAA's Instrument Flight Procedures, Operations, and Airspace Analytics (IOAA) Tool available at <https://sda.tc.faa.gov/AfsTools/#/>.



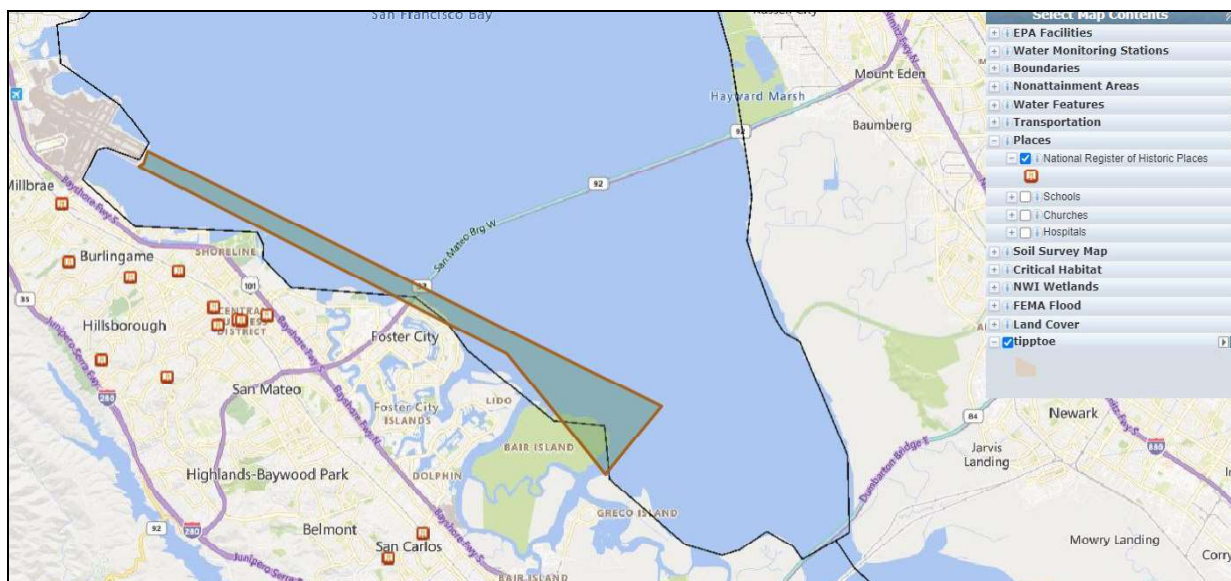
The altitudes for sample flight tracks are shown in the following figure. The data indicates that aircraft are predominantly above 1,800 feet MSL at the new SFO 6.9 DME location, and above 2,300 feet MSL at the new SFO 9.2 DME location. These flight profiles are not anticipated to change.



Based on the data for the year 2019, approximately 590 aircraft land on RWYs 28L/R daily on an average. In general, weather permitting, the TIPP TOE procedure is used extensively by aircraft arriving from the south. This could account for approximately 30–40% of all SFO arrivals. Currently, approximately 90% of the aircraft that fly the TIPP TOE procedure intercept the glideslope for RWY 28L or 28R. These aspects are not anticipated to change with the new step-down fixes.

The historical flight tracks and proposed amendments to the procedure indicate that it is unlikely that any new areas will be exposed to aircraft noise.

Additionally, NEPA Assist Tool (<https://nepassisttool.epa.gov/nepassist/nepamap.aspx>) was used to examine the presence of noise sensitive National Environmental Policy Act (NEPA) resources in the vicinity of the proposed actions. As an example, the following figure shows that no nationally registered historical properties are located within the general study area (shaded polygon) of the proposed actions.



Given the existence of historical flight tracks that are predominantly over water, and that no land disturbance is expected due to the proposed action, it is anticipated that the identified NEPA resources—including properties covered under Section 4(f) of the U.S. Department of Transportation Act of 1966, and Section 106 of the National Historic Preservation Act—will not be adversely impacted and no further analysis is needed.

The data available from the following sources was considered to determine cumulative impacts:

- KSFO airport planning website: <https://www.flysfo.com/about-sfo/sfo-tomorrow/draft-final-airport-development-plan>
- FAA's Instrument Flight Procedures (IFP) Information Gateway website: https://www.faa.gov/air_traffic/flight_info/aeronav/procedures/

Although some of the proposals found on the IFP Information Gateway for 2021 implementation are expected to impact the current design of the TIPP TOE Visual RWY 28L/R, including relocation of the EDDYY waypoint, they are not anticipated to impact the amendments mentioned in this document.

The proposed action, when considered with other past, present, and reasonably foreseeable projects, would not exceed the thresholds of significance for the resource categories analyzed in this environmental review. Therefore, no cumulative impacts would be anticipated.

In accordance with FAA Order 1050.1F, Paragraph 5-2, regarding Extraordinary Circumstances, the FAA has reviewed the proposed amendments for factors and circumstances in which a normally categorically-excluded action may have a significant environmental

impact requiring further analysis. The FAA has determined that no extraordinary circumstances exist that warrant additional environmental review.

Declaration of Exclusion:

The FAA has reviewed the above referenced proposed action and it has been determined, by the undersigned, to be categorically excluded from further environmental documentation according to FAA Order 1050.1F, "Environmental Impacts: Policies and Procedures." The implementation of this action will not result in any extraordinary circumstances in accordance with FAA Order 1050.1F.

Basis for this Determination:

This review was conducted in accordance with policies and procedures in Department of Transportation Order 5610.1C, "Procedures for Considering Environmental Impacts," and FAA Order 1050.1F.

The applicable categorical exclusion is:

5-6.5.i. - Establishment of new or revised air traffic control procedures conducted at 3,000 feet or more above ground level (AGL); procedures conducted below 3,000 feet AGL that do not cause traffic to be routinely routed over noise sensitive areas; modifications to currently approved procedures conducted below 3,000 feet AGL that do not significantly increase noise over noise sensitive areas; and increases in minimum altitudes and landing minima.

Recommended by:**Facility Airspace Manager Review/Concurrence**

Signature: Francine K. Malabo Digitally signed by Francine K. Malabo
Date: 2020.10.14 08:43:36 -07'00' Date: _____
 Name: Francine K. Malabo
 Air Traffic Manager
 Northern California Terminal Radar Approach Control

Concurrence by:**Western Service Area Environmental Specialist**

Signature: MARINA JMP LANDIS Digitally signed by MARINA JMP LANDIS
Date: 2020.10.16 15:28:26 -07'00' Date: _____
 Name: Environmental Protection Specialist, Operations Support Group
 Western Service Center, AJV-W25

Approval by:**Western Service Area Director or Designee Approval**

Signature: BYRON G Y CHEW Digitally signed by BYRON G Y CHEW
Date: 2020.10.21 13:29:13 -07'00' Date: _____
 Name: B. G. Chew
 Acting Group Manager, Operations Support Group
 Western Service Center, AJV-W2