



Z • D • C • A • R • T • C • C

Washington Dulles ATCT

Version 1.51 – August 21, 2020

Summary of Changes

General:

- Added table of contents

Chapter 3:

- Fixed minor typographical errors

Chapter 5:

- Further explained departure gates and appropriate departure headings for each gate
- Changed reduced separation on 19R. 2.5nm reduced separation is not approved for runway 19R

Appendix 1:

- Changed airspace maps to easier to read maps

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Chapter 1. Positions

Identifier	Position	Frequency	VOX Channel	Notes
IAD_DEL	Clearance Delivery	135.700	IAD_1D	
IAD_R_GND	Ramp/Ground Metering	129.550	IAD_1R	
IAD_E_GND	Ground Control East (GCE)	121.900	IAD_1G	1
IAD_W_GND	Ground Control West (GCW)	121.625	IAD_2G	
IAD_N_GND	Ground Control North (GCN)	123.775	IAD_3G	
IAD_E_TWR	Local Control East (LCE)	120.100	IAD_1T	1
IAD_W_TWR	Local Control West (LCW)	120.250	IAD_3T	
IAD_N_TWR	Local Control North (LCN)	134.425	IAD_2T	
KIAD_ATIS	ATIS	134.850	KIAD_ATIS	

1. Primary frequency and position.

Chapter 2. Runway Configurations

2-1. General

- a. The calm wind operation is south with 30, otherwise refer to the configs below and select one most suitable for wind and traffic conditions.
- b. Controllers must be cognizant of 30 departures/12 arrivals when landing north.
- c. Runway 1L/19R should only be used for arrivals.
- d. Runway 12 should only be used for arrivals.
- e. Runway 30 should be used for departures only unless a sustained wind of greater than 25 kts aligns with runway 30 more than any other runway.

2-2. Change in Runway Configuration

- a. The CIC must determine the need for making any runway change. A routine runway change occurs when traffic and/or weather conditions are such that the change can be made with little or no degradation in service. In this instance, departures are allowed to depart from the runway originally assigned. Use the following procedures to complete a routine runway change:
 - 1. Provide PCT with the last departure's identification, its estimated time of departure, and the departure runway.
 - 2. Once the last aircraft departs, ensure that no other aircraft departs IAD without a release from PCT.
 - 3. Ensure that departures off of the new runway have received the appropriate DP and departure control frequency, as needed.
 - 4. PCT shall inform the CIC when the sector reconfiguration has been completed.
 - 5. Ensure the ATIS has been updated and reflects the proper status.

2-3. North Ops

- a. Arrival runways are 1L, 1C and 1R. departure runways are 1C and 1R
- b. North and East departures should get runway 1R, South and West departures should get runway 1C
- c. This config should only be used when the wind is out of the north and greater than 15kts. If the wind is less than 15kts, departing runway 30 is preferred.

2-4. North with 30

- a. Arrival runways are 1L, 1R and 1C. Departing runway 30.
- b. All departures get runway 30 regardless of departure procedure or gate, unless coordinated otherwise
- c. Preferred if wind is out of the North and less than 15kts
- d. Runway 30 departures may not be cleared for takeoff if a runway 1C arrival is within 2.27nm of the threshold
- e. A runway 30 departure may not be cleared for takeoff if a runway 1L arrival is within 3.56nm of the threshold

2-5. South Ops

- a. Arrival runways 19L, 19C and 19R. Depart runways 19C and 19R
- b. South and West departures should get runway 19C, North and East departures should get runway 19R.
- c. This config should only be used when the wind is out of the south and greater than 15 kts. If the wind is less than 15kts, departing runway 30 is preferred.

2-6. South with 30

- a. Arrival runways are 19L, 19R and 19C. Departing runway 30.
- b. All departures get runway 30 regardless of departure procedure or gate, unless coordinated otherwise
- c. Preferred wind calm configuration. Preferred if wind is out of the South and less than 15kts
- d. A runway 30 departure may not be cleared for takeoff if a runway 19R arrival is within 1.3nm of the threshold

2-7. South with 12

- a. Should only be used if there is a sustained wind greater than 20 kts that most closely aligns with runway 12
- b. Arrival runways are 12, departing runways are 19L and 19C
- c. South and West departures should get runway 19C, North and East departures runway 19R.

2-8. Landing 30

- a. Due to Potomac TRACON airspace, all landing on runway 30 should be accomplished via circling procedures
- b. Based on weather or traffic conditions, utilize an instrument approach to runway 1R circle to runway 30. Local control will provide circling instructions. The ILS runway 1R circle to runway 30 is the preferred approach.

Chapter 3. Clearance Delivery

3-1. IFR Departure Instructions

- a. Departure procedures:
 1. IFR RNAV-capable, Turbojet departures should be assigned an RNAV departure and transition consistent with their direction of flight. Non-RNAV Turbojets and Props should be assigned the CAPITAL# departure.
 2. Aircraft unable to fly the CAPITAL# SID shall be told to “fly runway heading, radar vectors (first fix)” in their IFR clearance.
 3. All SID’s should be entered into the aircraft’s flight strip.
 4. The initial altitude for all IFR departures is 3000.
 5. Issue the appropriate departure frequency. (See below)
- b. Do not amend flight plan routes unless the pilot can accept and fly the new routing. Coordinate non-standard routings with the appropriate facilities.
- c. Because the JCOBY SID transits the Washington Flight Restriction Zone (FRZ), United States carriers are able to fly it. General Aviation (N) numbers, Foreign Air Carriers **not** routed via the JCOBY Departure SWANN or AGARD transitions, Air Taxis (EJA, LXJ, FIV, etc.), and other aircraft routed over SWANN, PALEO, and COLIN must be rerouted around the FRZ and must get a different route. If you have any questions about finding a new route, as TMU or the CIC.
 1. Put simpler, any N-callsigns and Air Taxis (EJA, LXJ, FIV, etc.) are not able to fly the JCOBY Departure SWANN/AGARD/PALEO transitions, and any of those, in addition to foreign air carriers, are not able to fly the JCOBY departure, COLIN Transition. Those aircraft all need to be rerouted to different departure gates.
- d. It is very important that all aircraft routed to the northeast with a destination north of New York or with an overseas destination be routed via SWANN..BROSS.J42.RBV before proceeding along their flight plan or amended route.

3-2. Altitude Restrictions

Aircraft departing IAD to the following airports must meet certain route and altitude requirements;

1. **DCA, BWI or HEF** – CAPITAL# departure, radar vectors direct, 4000
2. **RIC** – 10000 (Prop), 14000 (Jet)
3. **PHL** – 7000 (Prop), 11000 (Jet)
4. **JFK** – 17000
5. **EWB, TEB or LGA** – FL210
6. **ORF** – 15000 (Jet)

3-3. VFR Departure Instructions

- a. All VFR departures will receive a Class B Clearance. They should be told to “fly runway heading” in their VFR clearance.
- b. Altitude Assignment
 - 1. Jets – At or below 3,000
 - 2. Props – At or below 2,500
 - 3. Helicopters – At or below 1,300
- c. Departure Frequency – See 4-5. Departure Frequency

3-4. Departure Gates

- a. To standardize departure flows and ensure proper and expeditious routing of traffic, Potomac TRACON (PCT) uses departure exit gates for IFR Departures to destinations outside of PCT airspace. Every IFR aircraft leaving IAD must leave PCT airspace bound for one of these gates, unless coordinated otherwise.
- b. The following high altitude departure gates are used for aircraft filed above 10,000'. Prop or turboprop aircraft may be routed via a low altitude gate regardless of altitude.
 - 1. BUFR [Intersection] – Aircraft going to the Northwest.
 - 2. CLTCH [Intersection] – Aircraft going to the Southwest, often to join J48. For aircraft unable to comply, PAUKI or CSN is acceptable.
 - 3. HANEY [Intersection]
 - 4. JERES [Intersection] – Aircraft going to the North or Northwest, typically to join J211, J220/J227.
 - 5. JDUBB [Intersection] – Aircraft to the Southwest, typically those going to Florida. For aircraft unable to comply, HAFNR or GVE is acceptable.
 - 6. MCRAV [Intersection] – Aircraft going to the Northwest, often to join J518.
 - 7. OTTTO [Intersection] – RNAV Aircraft going to the West. For aircraft unable to comply, LDN is acceptable, or vectors to join J134.
 - 8. PALEO/AGARD [Intersection] – Aircraft going to the Northeast. This is used for LGA, JFK and ISP arrivals.
 - 9. RAMAY [Intersection] – Aircraft going to the West. For aircraft unable to comply, vectors to join J134 is acceptable.
 - 10. SCRAM [Intersection] – Aircraft going to the Southwest. For aircraft unable to comply, FLUKY is acceptable.
 - 11. SWANN [Intersection] – Aircraft going to the Northeast via J42. This is used for BOS, BDL, EWR arrivals.
 - 12. WHINO/COLIN [Intersection] – Aircraft going to the south or southeast. Typically they will join J61.
 - 13. WOOLY [Intersection] – Aircraft going to the Northeast. This gate is used to reroute any air taxis or N-callsigns that normally would go to the Northeast/southeast via SWANN/PALEO/COLIN. For aircraft unable to comply, EMI is acceptable.

- c. The following low altitude departure gates are used for aircraft filed at or below 10,000'.
 - 1. BRV [VOR] – Aircraft going to the South
 - 2. CSN/LDN [VOR] – Aircraft going to the West or Southwest.
 - 3. EMI [VOR] – Aircraft going to the North or Northeast
 - 4. GVE [VOR] – Aircraft going to the South or Southwest.
 - 5. HANEY [Intersection]
 - 6. PXT [VOR] – Aircraft going to the Southeast.
 - 7. MRB [VOR] – Aircraft going to the North or Northwest
- d. It is very important that departures routed to the northeast with a destination NORTH of New York be routed via SWANN..BROSS.J42.RBV
- e. See Appendix 4 for a visual representation of departure gates as well as grouping names.

3-5. CPDLC and PDCs

- a. CPDLC and PDCs are authorized for use at KIAD with any IFR aircraft except general aviation aircraft who wouldn't be able to receive such messages.
- b. Aircraft who receive a PDC will call Clearance Delivery when ready for taxi with their assigned SID, ATIS code and location when ready to taxi. Once CD has verified these are correct, tell them to contact/monitor ground control.

3-6. Departure Frequency

- a. Assign aircraft the appropriate departure frequency for their appropriate departure gate or direction of flight (if VFR).
 - 1. **NORTH/EAST** – ASPER (125.050)
 - 2. **SOUTH/WEST** – TILLY (126.650)

Chapter 4. Ground Control

4-1. General

- a. To reduce delays at the runway, sequence aircraft that have the same first fix or direction departure with other aircraft.
- b. The ramp and alleys are non-movement areas. GC cannot approve push backs or startups in this area. GC may only approve push backs or startups when the aircraft is pushing into the movement area.
- c. If Ramp Control is opened for an event, they may approve pushbacks into the non-movement areas.
- d. Taxiways must be kept clear for landing traffic to exit. All taxiway exits must be protected.

4-2. Standardized Taxi Routings

- a. In general, it is recommended that the following taxiways be used in the following directions. This is only recommended, and may be used otherwise if operationally beneficial.
 - 1. Kilo – North
 - 2. Juliet – South
 - 3. Yankee – North
 - 4. Zulu – South
- b. The transfer point of control (TCP) is the terminal side of the nearest active runways.
- c. Ensure appropriate runway exits are available to aircraft and there are no ATC restrictions to continued movement beyond the applicable holding position marking. Advise LC if appropriate runway exits are not available.
- d. The preferred taxi routes from RWY 1L/19R:
 - 1. **South Operation:** During moderate to heavy RWY 19C arrival traffic: Taxiway U, T and Q. During light RWY 19C arrival conditions, traffic may be taxied via Taxiway W2, W3 or W4 with prior approval from LC2 and the FLM/CIC.
 - 2. **North Operation:** Taxiway W2, W3 and W4.
 - 3. **NOTE:** The practice of the pilot being on LC2s' frequency for the crossing of RWY 1C/19C is a "best practice," resulting from the IAD Collaborative Workgroup. Unless coordinated otherwise, GC3 should have aircraft contact or monitor LC2 to cross runway 01C/19C.

3-3. Pushback Procedures

- a. Movement Areas.
 - 1. Approve pushbacks onto taxiways.
 - 2. Specify tail direction, if nonstandard.
- b. Non-Movement Areas.
 - 1. The following should only be used during events. Normally, aircraft pushing into the alleys or other non-movement areas should be told “advice ready to taxi.”
 - 2. If ground metering is in effect, tell aircraft to advise ready to push. Ground may then provide pushback into the alleys.
 - 3. Provide traffic advisories into or out of non-movement areas.

NOTE: Information related to aircraft movement in non-movement areas is advisory in nature and does not imply control responsibility.

Chapter 5. Local Control

5-1. Airspace

- LC is delegated the airspace within the Washington Class B surface area at and below 2,000 feet and as shown in Appendix 1.
- The eastern line of IAD ATCT airspace borders DCA Helicopter control below 1,500 feet.

5-2. Line Up and Wait

- LUAW procedures are authorized at IAD. Such operations are generally viewed as necessary to maintain airport efficiency. Use LUAW when it is expected the aircraft will depart after conflicting traffic is clear of the runway/ intersection. Utilize good operating practices and memory aids as needed when using LUAW procedures.
- The landing clearance need not be withheld if traffic is holding in position.
- LUAW procedures are not authorized when the ceiling is below 800ft or visibility below 2nm.

5-3. Departure Headings

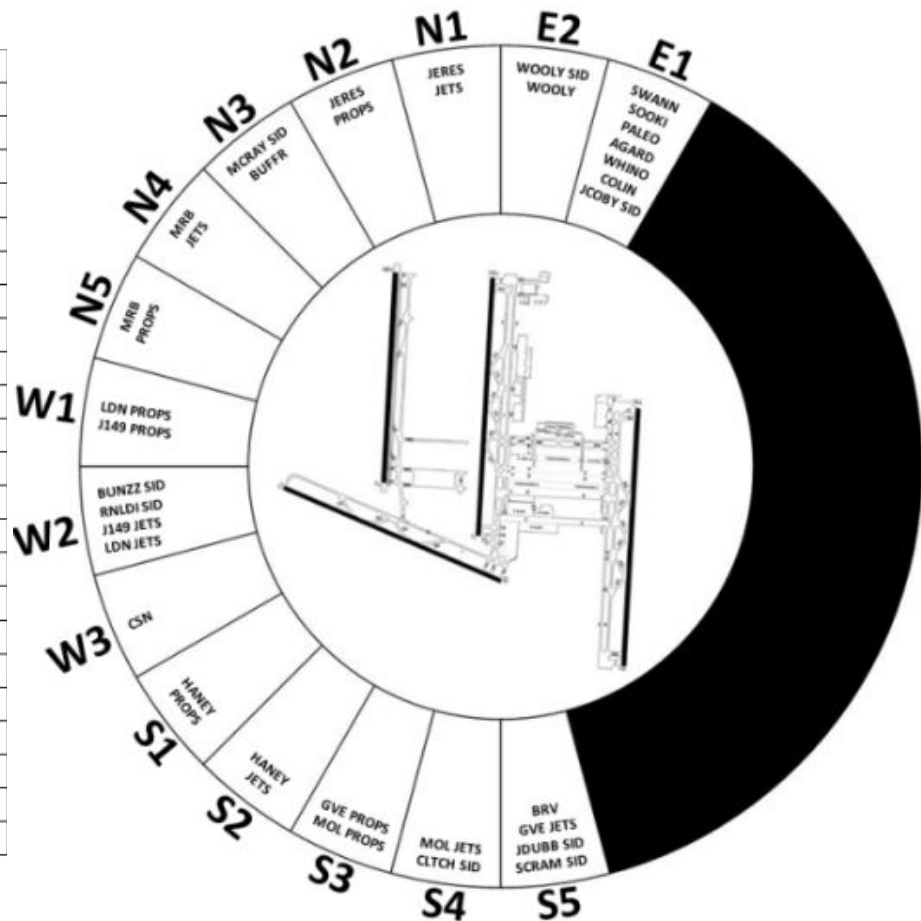
- All departures, whether IFR or VFR, and regardless of SID, should be assigned a heading consistent with the table below.

RUNWAYS IN USE	DEPARTURE FIXES	HEADINGS	FREQ	SECTOR
1L, 1C, 1R and/or 30	All ASPER fixes (E1-N3)	300 thru 010	125.05	ASPER
	All TILLY fixes (W1-S5)	245 thru 300	126.65	TILLY
Note: When departing RWY 30 and SIMULS are in use, turn no further west than 280° and no further northwest than 310°				
19L, 19C, 19R and landing 12	All ASPER fixes (E1-N3)	210 thru 250	125.05	ASPER
	All TILLY fixes (W1-S5)	190 thru 210	126.65	TILLY
19R, 19C, 19L and/or 30	All ASPER fixes (E1-N3)	280 thru 320	125.05	ASPER
	All TILLY fixes (W1-S5)	190 thru 280	126.65	TILLY
Note: When departing RWY 30 and SIMULS are in use, turn no further northwest than 300° and no further southwest than 250°				

ASPER fixes: SWAN, SOOKI, PALEO, AGARD, WHINO, COLIN, JCOBY, RAZZA, WOOLY, JERES, MCRAY, BUFR, and MRB

TILLY fixes: BUNZZ, RAMAY, RNLDI, OTTTO, LDN, CSN, HANEY, FLUKY, MOL, HAFNR, GVE, BRV, BUTRZ, and POOCH

E1	EAST 1	SWANN/SOOKI
		PALEO/AGARD
		WHINO/COLIN
		JCOBY SID
E2	EAST 2	WOOLY/WOOLY SID
N1	NORTH 1	JERES JETS
N2	NORTH 2	JERES PROPS
N3	NORTH 3	MCRAJ SID/BUFFR
N4	NORTH 4	MRB JETS
N5	NORTH 5	MRB PROPS
W1	WEST 1	LDN/J149 PROPS
W2	WEST 2	LDN JETS
		J149 JETS
		BUNZZ SID
		RNLDI SID
W3	WEST 3	CSN
S1	SOUTH 1	HANEY PROPS
S2	SOUTH 2	HANEY JETS
S3	SOUTH 3	GVE/MOL PROPS
S4	SOUTH 4	MOL JETS
		CLTCH SID
		BRV PROPS
		GVE JETS
S5	SOUTH 5	JDUBB/SCRAM SID



5-4. Missed Approaches and Go Arounds

- The tower shall verbally inform the appropriate departure controller of a missed approach/go-around. Unless otherwise coordinated, issue the following instructions to missed approach/go-around aircraft for the corresponding runways: Fly runway heading, maintain 2,000 feet.
- After a missed approach or go around, all departure releases are suspended until released by ASPER/TILLY.
- Tower may re-sequence props providing the Tower ensures separation between the go around and all other pertinent traffic and does not affect the sequence of other IFR arrivals sequenced by the TRACON.
- In the event of a missed approach or go around, automatic departure releases are suspended and local control MUST obtain a release from the departure controller prior to clearing another aircraft for takeoff.

5-5. Arrival Procedures

- Separation of IFR arrivals may be reduced to 2.5nm within 10nm of the runway on the final approach course, regardless of operation or runways in use, providing that wake turbulence is not a factor. 2.5nm separation MUST NOT BE USED on runway 19R

Chapter 6. Ramp Control

6-1. Duties

- a. The midfield ramp area is a non-movement area and in the real world it is operated by the Metropolitan Washington Airport Association (MWAA), not the FAA. We have created a Ramp Control position to establish order on the midfield ramp area during events or periods of heavy traffic. During normal operations on VATSIM, no controller is responsible for aircraft movement in this area. That means pilots may push back and startup at will. When RAMP is closed, GC does not assume the RAMP position and duties. When RAMP is open, it does not assume the Clearance Delivery position and duties, those remain with GCW.
- b. Ramp Control may only be opened when authorized by the ATM, DATM, TA, or CIC.

6-2. Area of Jurisdiction

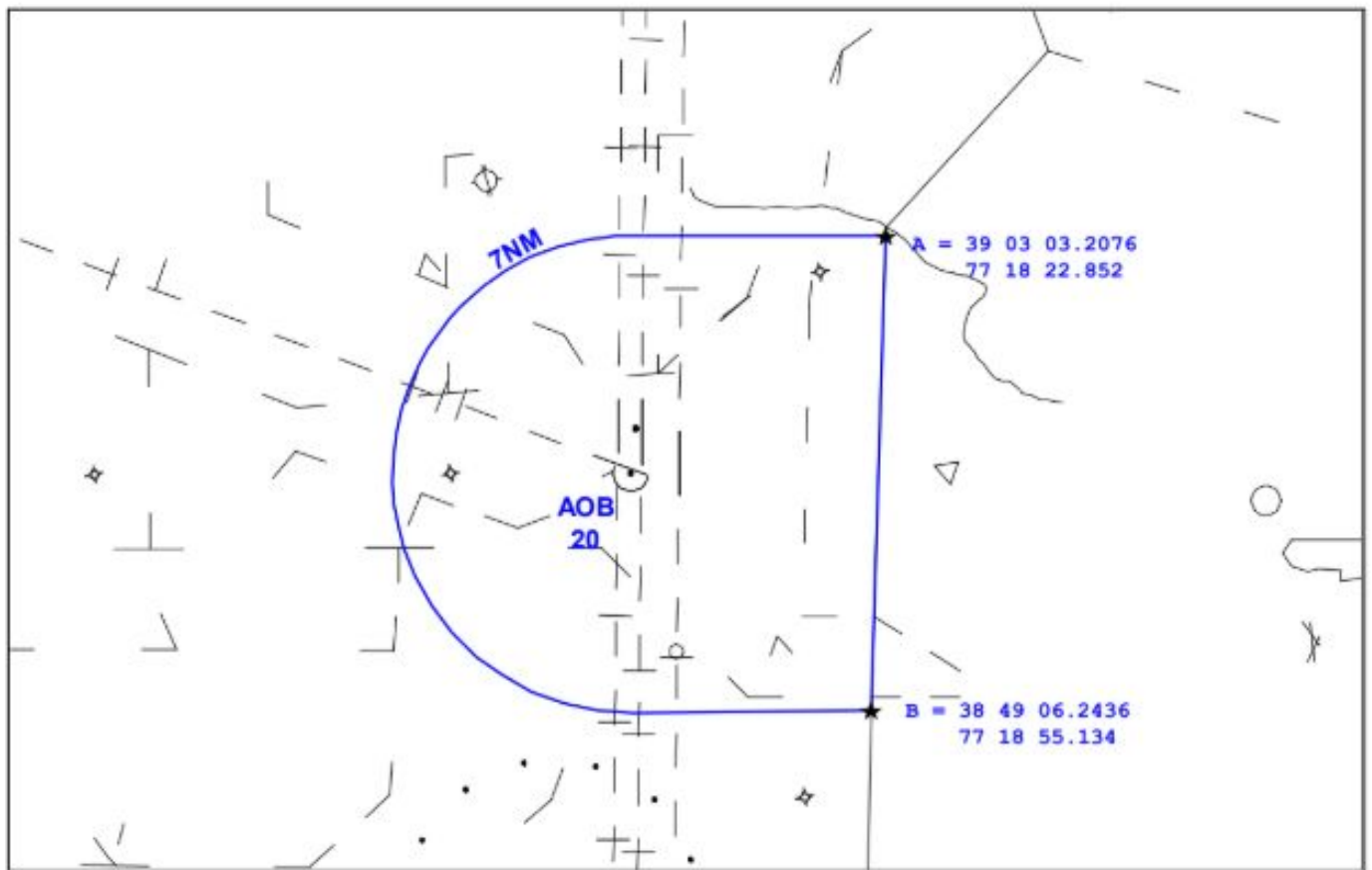
- a. RAMP has jurisdiction for the midfield ramp area (outlined in blue below) which includes taxiways A, B, C, D, E, and F between J and Z.

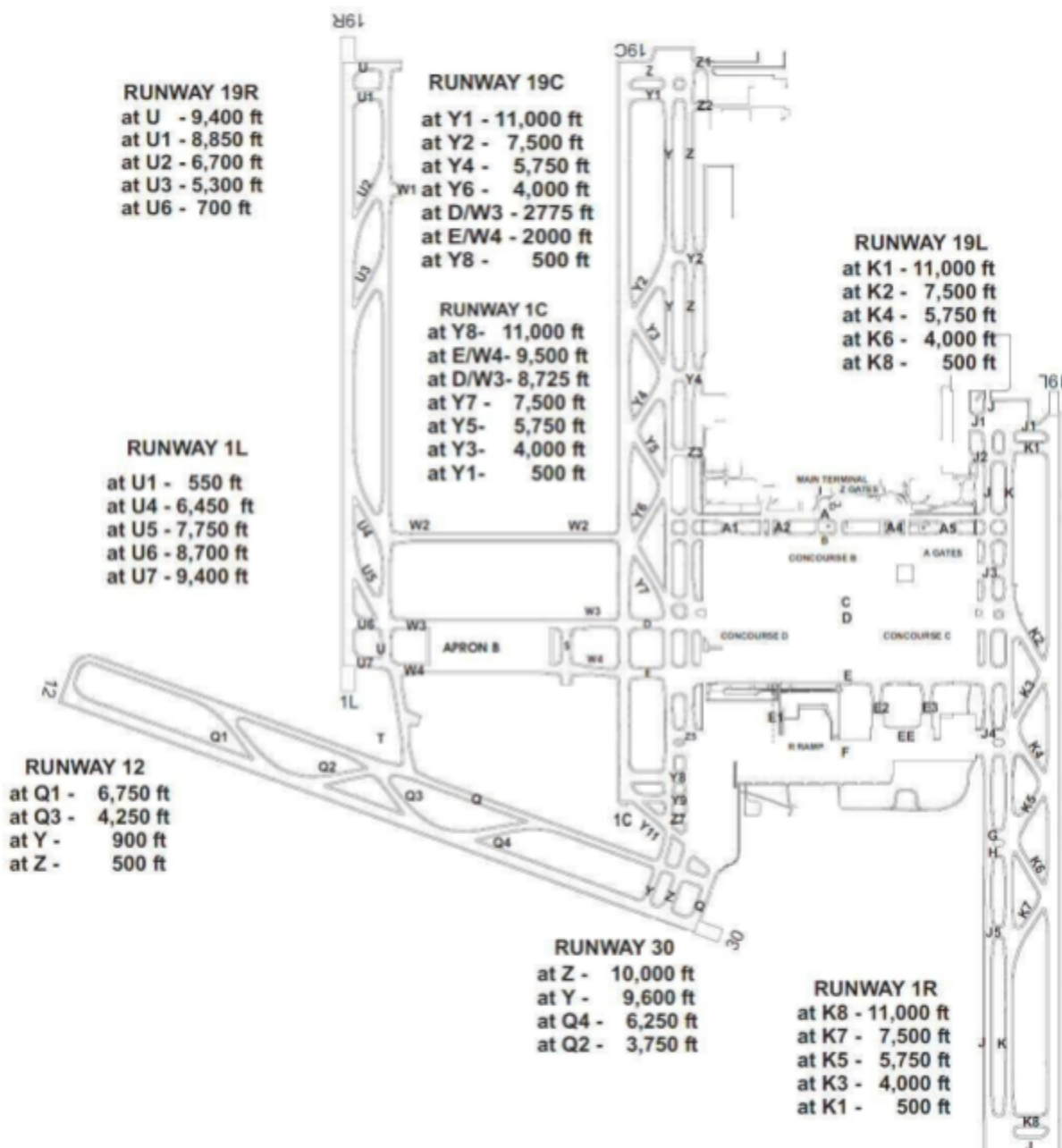
6-3. Procedures

- a. RAMP shall approve all push backs in the midfield ramp area and inform aircraft which way to push their tail.
- b. Runway 1R/19L shall “push tail west” and Runways 1L/19R, 1C/19C and 30 shall “push tail east.”
Example:
“UAL123 push approved, tail west, advise ready to taxi.”
- c. Use the table in the Runway Assignments section to determine which runway to use based on the departure gate and runway configuration. Ground Control may change runway assignments as needed.
- d. When aircraft are ready to taxi, instruct aircraft to:
 - 1. Runway 1R/19L: Taxi east off the ramp, hold short of J, and contact ground.
 - 2. Runway 1/19R, 1C/19C, 30: Taxi west off the ramp, hold short of Z, and contact ground.

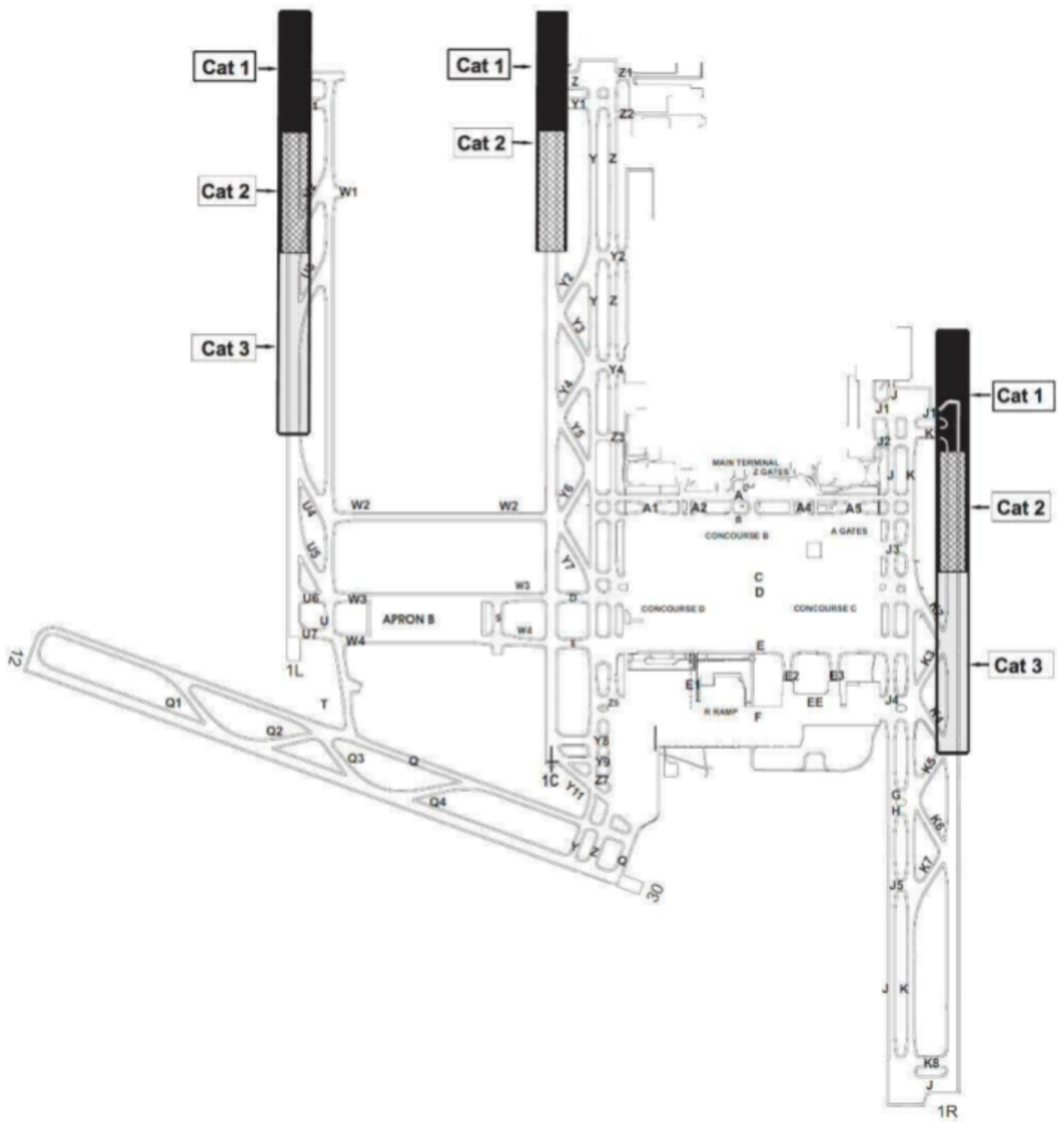
Appendix 1. Airspace

Dulles Tower is delegated 2,000 MSL and below within the AML 7 nm Class B surface area plus the area encompassed by eastward extensions from the northern and southern most points terminating at points A & B as depicted below.





ILS Critical Areas (South Ops).



NORTH AREA RAMP
119.12 (Taxilanes A&B)

All aircraft with a wingspan exceeding 118' (36m) are restricted from using Taxilane A between A1 and A5.

MIDFIELD AREA RAMP
129.55 (Taxilanes C&D)

CALLING FOR THE PUSH: Provide call sign, terminal and gate, and first departure fix; "XYZ 89B, A6D, Blues"

All pushback operations from Midfield Terminal ramp that will enter taxilanes require clearance from ramp control.

SOUTH AREA RAMP
130.55 (Taxilanes E&F)

Taxilane E1 restricted to aircraft with wingspan less than 79' (24m).

Pilots leaving the North Ramp and South Ramp areas should specify their location with reference to their exit spot on initial contact with Ground Control.

FOR RAMP ENTRY:
With FAA Ground until switched to frequency. On initial contact with ramp, advise present position & taxilane (gate) and assigned frequency. Example: "Z 89B, Kilo 1, Brava, AIC"

Diagram Labels:
MAIN TERMINAL
RAMP TOWER
A CONCOURSE
B CONCOURSE
D CONCOURSE
C CONCOURSE
MIDFIELD TERMINAL RAMPS
RAMP
Control Tower
EE
E1
E2
E3
R12
R14
R16
R22
R24
R26
R28
Y6
Y7
Z
W077-27.5
W077-27.4
W077-27.3
W077-27.2
W077-27.1
W077-26.9
W077-26.8
W077-26.7
W077-26.6
W077-26.5
W077-26

Appendix 4. Departure Gates

