

Richmond Air Traffic Control Tower

Standard Operating Procedures

1) **Purpose** This order defines duties and responsibilities, depicts areas of airspace, runways, and taxiways allocated to each position and provides supplemental direction as necessary for each position of operation within the Richmond Air Traffic Control Tower (ATCT).

2) **Distribution** This order is distributed to all RIC ATCT personnel.

3) **Positions**

<u>Position</u>	<u>Abbreviation</u>	<u>Frequency</u>	<u>ARTS ID</u>	<u>Callsign</u>	<u>Relief Callsign</u>	<u>Voice Room</u>
Local Control	LC	121.100	2T	RIC_TWR	RIC_1_TWR	RIC_2T
Ground Control	GC	121.900	2G	RIC_GND	RIC_1_GND	RIC_2G
Clearance Delivery	CD	127.55	2C	RIC_DEL	RIC_1_DEL	RIC_2C

a. Local Control has” ARTS Tag.

4) **Combining Positions** Positions and responsibilities shall be combined as follows:

5) **Runway Configurations**

a. The following table shows the two possible runway configurations.

<u>Operation</u>	<u>Active Runways</u>
North Operation	2, 7, and 34
South Operation	16, 20, and 25

b. Ensure all non-standard departures are coordinated with the appropriate radar positions. This includes, but is not limited to, aircraft departing runways 16, 20 and 25 in a North Operation, runways 2, 7, and 34 in a South Operation, and inactive runways.

6) **Runway Selection**

a. The South Operation configuration is the **Calm Wind** runway configuration and shall be used when winds are less than 5 knots. Other runway configurations may be used with calm winds if it provides an operational advantage.

7) **Change in Direction of Operation Checklist**

- a. Coordinate the first and last arrival/departure for each runway with JRV FLTRK.
- b. Upon notification by JRV FLTRK, ensure departures are stopped for sector reconfiguration.
- c. Ensure departures are held until JRV FLTRK releases them.
- d. Inform Ground Control and Ramp Control of the new departure configuration and where to stage aircraft for departure.
- e. Ensure coordination is accomplished with all tower personnel.
- f. JRV FLTRK shall inform LCE the sector reconfiguration is complete and when departures are released.
- g. Ensure the ATIS has been updated and reflects the proper status.

- 8) Status Information** Local Control is the Tower Cab Supervisor and is responsible for the accuracy of:
- a.** Active Runway(s)
 - b.** Runway closures.
 - c.** Current ATIS and code.
 - d.** Other items affecting ATC.

- 9) **Distance Remaining From Intersections** Using the chart below, issue distance remaining from an intersection upon taxi if the pilot requests. Distances are in feet.

Runway 16		Runway 02		Runway 07	
At M1	6,350	At E	4,450	At L	1,450
At C	5,300	At C	2,450	At RWY 16/34	700
At M2	4,000	At B	N/A		
At Rwy 7/25	3,100				
At M3	1,050				

Runway 34		Runway 20		Runway 25	
At M3	7,900	At B	4,500	At RWY 16/34	4,400
At Rwy 7/25	5,850	At E	4,050	At L	3,600
At M2	4,900	At C	2,050		
At C	3,600				
At M1	2,700				

Local Control (LC)
General Information and Procedures

1) General

- a. Local Control shall be responsible for separation between:
 - i. Successive departures.
 - ii. Departures and arrivals.
 - iii. Departures and missed approaches/go-arounds.
 - iv. Tower local traffic and over flights – from departures, arrivals and go-arounds.
- b. Local Control shall determine the active runways
- c. Local Control shall maintain the ATIS.

2) Position Information

- a. Frequency: 121.100
- b. Callsign: RIC_TWR
- c. ARTS ID: 2T

3) Area of Jurisdiction All active and/or open runways and the Richmond Tower airspace. Note: Local Control retains communications and control of taxiing aircraft on taxiways Charlie and Echo east of runway 2/20, taxiway Lima, taxiway Hotel and taxiway Mike south of runway 7/25.**4) Forwarding Departure Information** Forward departure information and the departure sequence to FLTRK or TAPPA via the chat box or override unless requested otherwise.

- a. Rolling Calls shall be made no sooner than when the aircraft commences departure roll and no later than the aircraft reaching the departure end of the runway.
- b. Release Requests shall be made up to five (5) minutes prior to aircraft beginning their departure roll.
- c. Rolling Calls and Release Requests shall include the following information:
 - i. Call sign.
 - ii. Departure runway.
 - iii. IFR departure fix, initial route, or name of local airport/destination, and the term "VFR" if appropriate.
 - iv. Heading if non-standard or additional information/restrictions as needed/required.
 - v. Ensure that aircraft taxied to non-designated departure runways have been coordinated accordingly with the appropriate Local Control positions.

5) Taxi Into Position and Hold (TIPH) TIPH procedures are authorized at RIC. Use TIPH 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 TIPH procedures.

- a. The landing clearance need not be withheld if traffic is holding in position.
- b. Withhold landing clearance when the ceiling is less than 800 ft or visibility is less than 2 miles. Or do not use TIPH for departures between successive arrivals.
- c. When jet aircraft are holding in position on runway 16 or 20, and traffic is on final for the other runway, ensure the jets maintain idle thrust until the traffic crosses the landing threshold and advise the landing aircraft of traffic.

6) Missed Approaches / Go Arouns 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:

7) Transfer of Communications

- a. Communications transfer should take place within 1 NM of the departure runway end. Transfer of control and communications occur simultaneously.
- b. LC must notify departure control of any take-off cancellations or aborts which occur after the Release Request or Rolling Call has been made.

8) Traffic Pattern The standard traffic patterns are:

- a. North Operations
 - i. Runway 02 Left Traffic
 - ii. Runway 07 Right Traffic
 - iii. Runway 34 Right Traffic
- b. South Operations
 - i. Runway 20 Right Traffic
 - ii. Runway 25 Left Traffic
 - iii. Runway 16 Left Traffic
- c. Altitudes
 - i. Turbo-props and jets 1,700 MSL
 - ii. Piston-driven props 1,200 MSL

Ground Control (GC)
General Information and Procedures

- 1) **General** GC shall be responsible for aircraft movement on taxiways and those runways designated as non-active.
- 2) **Position Information**
 - a. Frequency: 121.900
 - b. Callsign: RIC_GND
 - c. ARTS ID: 2G
- 3) **Area of Jurisdiction** All taxiways and inactive or closed runways. Note: Local Control retains communications and control of taxiing aircraft on taxiways Charlie and Echo east of runway 2/20, taxiway Lima, taxiway Hotel and taxiway Mike south of runway 7/25. Ground control shall notify LC when Ground control initiates the use of Taxiway "U".
- 4) **Assigning Departure Runway**
 - a. North Operation: Taxi all departures to Runway 02.
 - b. South Operation:
 - i. Assign aircraft that will enter TAPPA airspace to Runway 16.
 - ii. Assign aircraft that will enter FLTRK airspace to Runway 20.
- 5) **ATIS** Ensure all departing aircraft have current ATIS code.
- 6) **Helicopter Movements** When advised of helicopter movement by LC to/from other than active runways, exchange pertinent traffic information and approve or disapprove the movement as appropriate.
- 7) **Crossing Runways**
 - a. Ground control shall coordinate with local control for control/use, or approval to cross an active runway prior to authorizing aircraft, vehicles, or personnel to use any portion of an active runway.
 - i. Ground controllers shall state the words "cross (RUNWAY) at (INTERSECTION OR END)" when requesting approval to cross a runway. Local controllers, when able to approve the request shall state the words "cross (RUNWAY) at (INTERSECTION OR END)".
 - ii. Requests and approvals to cross a runway shall be for one aircraft only unless the request and approval specifically states multiple numbers.

Clearance Delivery (CD)

- 1) **Responsibilities** Issue ATC clearances to all departing aircraft.
- 2) **Position Information**
 - a. Frequency: 1270
 - b. Callsign: RIC_DEL
 - c. ARTS ID: 2C
- 3) **IFR Departures**
 - a. Assign "FLY RUNWAY HEADING" to all aircraft not issued a Departure Procedure (DP).
 - b. Assign an initial altitude of 3,000 feet or requested altitude whichever is lower.
 - c. Issue the appropriate departure frequency (see table below)
 - d. Assign a beacon code
 - e. Do not amend flight plan routes unless the pilot can accept and fly the new routing.
- 4) **VFR Departures**
 - a. Assign an altitude restriction of 3,000 feet when a higher altitude is requested.
 - b. Assign runway heading.
 - c. Issue the appropriate departure control frequency (see table below)
- 5) **Departure Procedures**
 - a. Unless coordinated with the departure controller, all aircraft shall use one of the following departure gates:
 - i. COLIN-SID (COLIN)
 - ii. YEAST-SID (MOL, LYH, SANNY)
- 6) **Aircraft Clearances and Delays** In the event aircraft will be delayed due to weather and/or traffic management initiatives, issue clearances to all aircraft regardless of the status of a particular route. After the clearance has been read back correctly, inform aircraft there are delays and to contact ground for an estimated departure time.
- 7) **Assigning a Ground Control** Once the pilot has correctly read back the clearance, instruct all aircraft to "Contact ground on 121.7 for taxi"