

## RT600 Mission Simulator

### Generic Mission/Sortie Setup and Brief

#### Instructor Setup

- Connect RT600 DCU Trainer to the computer with USB cable – the DCU display should illuminate with the Version Select page. Select the desired Becker517/RT-600 software version if required.
- Suggest setting up a separate MP/Instructor station monitor so the student can't see it (see User Guide for computer display settings). The Student Observer should see the Student Screen on the main computer's monitor & the RT-600 DCU Trainer unit, plus have access to the computer keyboard to snapshot aircraft latitude / longitude (L/L) position with the Escape key.
- Start the program by clicking on the desktop shortcut. Make the initial position determination on the RT600 Mission "Saved/Default" selection window (if it appears). If required, left click & drag the title bar of the Instructor Screen and HSI Screen to move these windows to the Instructor's monitor.
- On the Instructor Screen (I/S), select ELT 1, then select ELT Type (VHF or 406) and desired frequency. Note the possible VHF frequency range is 118 – 124 MHz in 25KHz steps. The 406 MHz frequency is selected by the drop down box.
- In necessary, reposition the ELT by inputting ELT 1 L/L in Position boxes (TX position should follow).
- Locate the ELT position on the I/S Map (Red Ball) using ZOOM button (or mouse thumbwheel) as necessary.
- To place the airplane, position the cursor on the Map at the desired location and left double click
- Select desired Signal level and Noise level. Note actual received signal level will vary with range.
- Type in desired Airspeed (up to 1200 kts to speed things along) and click Set Airspeed button.
- Set desired aircraft initial heading (suggest initially, not pointing it at the ELT).
- Select Breadcrumbs ON (optional – can be used for debriefing, etc.).
- Set up is complete. When ready to start sortie, click the HDG button.

#### Notes:

- Clicking the Off button will pause the flying & maintain the current sortie details.
- When ready to restart, make any desired changes in the current scenario - Clear Map, LOP, Breadcrumbs. Right click on the map and select Reload to restore the airplane icon. Click HDG button to start.

#### Mission Briefing

##### Briefer Information

Situation Information (as from AFRCC)

- Type of ELT – VHF [e.g. 121.5 or between 118 and 124 MHz] or 406 MHz (hint: 406 MHz frequency & GPS location may or may not be known).
- Advise general area of ELT signal, e.g. AFRCC briefing information, airliners having picked up an ELT in a specified area.

##### MP Brief

- Agreed that the Student Observer is responsible for directing the aircraft by requesting any heading changes of the MP. MP/Instructor steers the aircraft in increments in the general direction of the area using the heading feature of the HSI window on the Instructor Screen. At any time, the instructor may elect to direct the aircraft using the specified heading command buttons of +/- 70, +/- 90, or +/-1 degrees.
- Agreed that the S.O. will conduct the sortie by
  - o Manipulating the RT600 and obtain bearing information.
  - o Make heading requests of the MP (as above) and make simulated radio calls to Mission Base with Line of Position (LOP) and any other pertinent information.



### **Conduct Sortie**

Have the S.O. provide requests for heading changes to navigate to the target. After the first LOP is recorded and the offset heading to the right or left established, the airspeed can be varied significantly to cut down on the elapsed time to next LOP. This sequence could be used on all subsequent LOP maneuvers.

### **Sortie Debrief**

Thank you for using the RT600 Mission Simulator System.

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