

7.0 AIRPORT PLANS

The future development plan for Rifle Garfield County Airport is derived from a comprehensive analysis. Factors included in the analysis are: aviation activity forecasts, facility requirements, environmental considerations, and aircraft operational characteristics. Forecasts are utilized as a planning foundation; however, facilities are constructed to meet actual demand. Previous chapters in this Master Plan establish and quantify the future development needs of RIL. Various elements of the development plan are categorically reviewed and graphically detailed in this chapter. The Airport Layout Plan (ALP) drawing set for RIL includes the following drawings: the Airport Layout Plan, the Terminal Area Plan, Part 77 Airport Airspace Drawing, Existing/Ultimate Airspace Approach Profiles, Inner Portion of the Approach Surface Drawings, Departure Surface Drawing, Land Use Drawing, and the Exhibit 'A' Property Map.

7.1 AIRPORT LAYOUT PLAN

The ALP graphically represents existing and future airport facilities. Documentation of existing and planned development is federally required and will enable the Airport to accommodate future demand. Necessary airport and runway design criteria is also provided within the ALP. The detailed criteria data is necessary to define relationships with applicable standards. The ALP illustration, **Figure 7-2**, and subsequent paragraphs, describes major components of the future Airport Development Plan.

7.1.1 RUNWAY SYSTEM

RIL's runway configuration will remain structured around its existing runway, Runway 8/26, with its existing length and width (7,000 feet x 100 feet). Other runway improvements include the construction of 20-foot paved runway shoulders.

It is also important to consider the existing and planned instrument approach system:

- Upgrade existing ILS to Runway 26 for improved approach visibility minimums
- Maintain existing LOC/DME to Runway 26
- Maintain existing RNAV RNP, RNAV GPS, and VOR/DME non-precision approaches to Runway 8 and Runway 26.

7.1.1.1 Runway Lighting and Landing Aids

- Maintain existing High Intensity Runway Light (HIRL) system
- Maintain existing Precision Approach Path Indicators (PAPI) to Runway 8 and Runway 26
- Maintain existing Omnidirectional Approach Lighting System (ODALS) to Runway 26

7.1.2 TAXIWAY SYSTEM

The recommended taxiway system improvements at RIL include:

- Construct Taxiway A3
- Construct paved taxiway shoulders to Taxiways A, A-1, A-2, A-4, A-5, B-1, B-2, and B-4

FIGURE 7-1 – ALP COVER SHEET

FIGURE 7-2 – AIRPORT LAYOUT PLAN

FIGURE 7-3 – AIRPORT LAYOUT PLAN DATA SHEET

7.2 AIRSPACE PLAN

The Part 77 Airspace Drawing is based upon 14 CFR Part 77, *Safe, Efficient Use, and Preservation of the Navigable Airspace*. The criteria contained in 14 CFR Part 77 have been established to provide guidance in controlling the height of objects within the vicinity of airports, and to protect an airport from potential hazards to safe and efficient aircraft operations. 14 CFR Part 77 specifies a set of imaginary surfaces that identifies obstructions when objects penetrate airspace surfaces.

14 CFR Part 77 Airspace drawings, as shown in **Figure 7-4** through **Figure 7-6**, provide plan and profile views depicting imaginary surfaces and any penetrations specifically related to the Rifle Garfield County Airport.

The airspace plan view is based upon future planned runway lengths and future planned approaches to all runway ends. Runway 8/26 airspace is based on a larger-than-utility runway with a precision approach to Runway 26.

FIGURE 7-4 – AIRPORT AIRSPACE DRAWING – PART 77

FIGURE 7-5 – AIRPORT AIRSPACE OBSTRUCTION TABLE

FIGURE 7-5 – AIRPORT AIRSPACE OBSTRUCTION TABLE CONT.

FIGURE 7-5 – AIRPORT AIRSPACE OBSTRUCTION TABLE CONT.

FIGURE 7-6 – AIRPORT AIRSPACE DRAWING RUNWAY 8/26 PROFILE

7.3 INNER PORTION OF THE APPROACH SURFACE DRAWINGS

The Inner Portion of the Approach Surface Drawings provides a detailed view of the inner areas of the Runway Protection Zone (RPZ) surfaces and the 14 CFR Part 77 approach surfaces. The RPZ is an area off each runway end designed to enhance the protection of people and property on the ground. The RPZ begins 200 feet off the end of the runway, and extends along the runway centerline in a trapezoidal shape. The RPZ size is a function of the design aircraft, as well as the visibility minimums of the runway's instrument approach capabilities. Based upon the future planned approaches to each runway end, the Inner Portion of the Approach Surface Drawings illustrate a large-scale plan and profiles that identify roadways, railroads, structures, power lines, and other potential obstructions that may lie within the confines of the inner approach surface area. The Inner Portion of the Approach Surface drawings are shown below in **Figure 7-7** and **Figure 7-8**.

7.4 DEPARTURE SURFACE DRAWINGS

Departure Surface Drawings graphically depict applicable runway departure surfaces as defined in Table 3-2, Approach/Departure standards table in FAA AC 150/5300-13A, *Airport Design*. Approach surfaces are shown for each runway end that is designated primarily for instrument departures. The Departure Surface Drawings are shown in **Figure 7-9** and **Figure 7-10**.

FIGURE 7-7 – RUNWAY 8 INNER APPROACH PLAN & PROFILE

FIGURE 7-8 – RUNWAY 26 INNER APPROACH PLAN & PROFILE

FIGURE 7-9 – RUNWAY 8 DEPARTURE PLAN & PROFILE

FIGURE 7-10 – RUNWAY 26 DEPARTURE PLAN & PROFILE

7.5 TERMINAL AREA PLAN

The Terminal Area Plan, as shown below in **Figure 7-11**, illustrates a detailed view of the more intensely developed areas on the landside of the Airport. Items shown on the airside development of the Terminal Area Plan include the following:

- Expand transient apron and construct apron access taxiway
- Expand existing general aviation apron
- Construct two T-hangars
- Construct Southeast Hangar Area apron
- Construct eight 100' x 100' hangars, one 125' x 125' hangar, and one 150' x 150' hangar

Landside development as shown on the Terminal Area Plan includes an expansion and improvement of the existing GA parking lot.

7.6 LAND USE DRAWING

The Land Use Drawing graphically depicts existing and recommended future land uses within the future property line, as well as the vicinity of the Airport. It includes land contained within the future 65 day/night average sound level (DNL) noise contour. The Land Use Drawing provides guidance to local authorities to establish appropriate zoning within the vicinity of the Airport. The Land Use Drawing for RIL is presented below, in **Figure 7-12**.

7.7 EXHIBIT 'A' AIRPORT PROPERTY MAP

The Airport Property Map illustrates the acquisition history of various tracts of land contained within airport boundaries, such as federal funds, county funds, and surplus property. Specifically, **Figure 7-13** provides information for analyzing both the current and future aeronautical use for land acquired by means of federal funding.

FIGURE 7-11 – TERMINAL AREA PLAN

FIGURE 7-12– AIRPORT LAND USE PLAN

FIGURE 7-13 – EXHIBIT 'A' AIRPORT PROPERTY MAP