

CHAPTER 4

DEMAND ANALYSIS

CHAPTER 4 - DEMAND ANALYSIS

This chapter establishes the factors that will aid in the identification of where and to what extent a community requires an airport and aviation-related services. Data was utilized in this evaluation from both the county and community levels. The data allowed for the development of demand factors, which influence the location of airports and aviation-related facilities or the need for aviation services. These factors were identified in two meetings with the Planning Advisory Committee (PAC). The PAC consists of members of the Nebraska Department of Aeronautics, airport managers from across the State, members of the Nebraska Department of Economic Development, Nebraska Department of Roads, Nebraska Health and Human Services, and the regional office of the FAA. The demand factors were ranked by the Committee in order of importance to determine aviation needs and were weighted for further analysis. Measurement criteria were established for each factor that allowed for the scoring of each airport and the associated city.

It is important to note that the demand analysis is based on a “snapshot in time” of present conditions and is used only as a starting point in this system planning process. Based on analysis that will be conducted in subsequent steps, the future needs of the airport system will be identified.

Demand for aviation services is influenced by factors that are related to aviation, as well as factors that are unrelated. It was determined that both aviation and non-aviation factors should be considered to achieve a balance in evaluating airport needs throughout the State. These factors were then related to the following four general system performance criteria/goal categories that were established:

- Access
- Economic
- Physical
- Social/Cultural

Data were evaluated for their availability and reliability to provide sufficient detail to support comparison of the various demand factors.

DEMAND FACTOR EVALUATION

At the onset of the Plan’s development, all airports were placed on a level plain regardless of the size of the airport, annual operations, annual enplanements, or type of existing aviation services at each airport. The demand factors were applied to each airport and the associated city or county in order to measure the demand at each airport for aviation and aviation-related services.

The initial step was to identify the criteria for each of the four system performance categories that would be utilized to evaluate the demand for aviation-related services. The factors are listed below, and represent data from the county and community levels. These factors are only intended to rank the demand for aviation in the associated city for existing airports. The total demand score that is discussed below does not rank the importance of the existing airport, and is not intended to declare that an airport with a higher demand rank is more important than an airport with a lower demand score. This process provides a means to group the airports by functional level based on the demand for aviation in the airport region. This grouping is necessary to establish facility and service standards or objectives that are desirable at airports in each of the functional levels.

Demand Factors

The following summarizes the factors used by system performance category and the level of data available for that factor.

ACCESS

- Current Population of the Associated City for the existing Airport - Community Level

ECONOMIC

- Net Taxable Retail Sales Collections - Community Level
- Air Cargo Service - Community Level

PHYSICAL

- Based Aircraft - Community Level
- Registered Pilots - County Level

SOCIAL/CULTURAL

- Distance to a Metro Area with a Population of 100,000 People or Greater - Community Level

Weight Assignment

The demand factors listed above are not equal in their importance to assessing the demand for aviation. The PAC was asked to assign importance weightings for the four system performance categories to establish the perceived importance of the various categories to the development of the airport system. The category with the highest ranking was assigned the greatest weight for the demand analysis. The reasoning for the assigned ranking, the measurement for each factor and the weight assigned to the factors, are described below.

Rank and Data Sources

The PAC ranked the four system performance categories from high to low as follows:

- Access
- Economic
- Physical
- Social/Cultural

A description of the data sources for each of the factors is provided below.

Access

Current Population – The current population of the associated city for the existing airport represents the number of potential aviation users for the airport. The higher the population of the associated city for the airport, the higher the rank for the airport, based upon the matrix to the right. The city of Geneva was identified as the associated city for Fairmont State Airfield.

RANGE	SCORE
50,000 ++	5
10,001 to 50,000	4
5,001 to 10,000	3
2,501 to 5,000	2
1 to 2,500	1

Source: Nebraska State Data Center, Center for Public Affairs Research, University of Nebraska at Omaha; and U.S. Bureau of the Census

Economic

Net Taxable Retail Sales Collections – The greater the total net taxable retail sales in each town, the higher the economic activity in the area. The associated cities that collect greater tax revenue were awarded a higher demand rank, based upon the matrix to the right. The city of Geneva was identified as the associated city for Fairmont State Airfield.

RANGE	SCORE
1,000 Million ++	5
150 to 1,000 Million	4
12 to 150 Million	3
2.5 to 12 Million	2
0 to 2.5 Million	1

Source: The Nebraska Databook, data for 1999

Air Cargo Service – The airports in Nebraska that currently have air cargo service were identified, and a rank was applied to those airports based on the number of air cargo carriers, including airlines providing service at each airport. The airports that are currently serviced by two or more cargo carriers received the highest rank of “5.” The airports that are currently serviced by one cargo carrier received a middle rank of “3.” Airports that do not currently have air cargo service were awarded a score of “0” for this factor.

RANGE	SCORE
2+	5
1	3
0	0

Source: Nebraska Department of Aeronautics

Physical

Based Aircraft – The total number of aircraft hangared or based at each airport. The higher based aircraft figures represent a greater potential use of the airport, and a higher demand rank of the airport, based upon the matrix to the right.

RANGE	SCORE
100 ++	5
30 to 99	4
16 to 29	3
5 to 15	2
1 to 4	1
0	0

Source: The Nebraska Airport database, compiled by a survey of airport managers across Nebraska

Registered Pilots – The total number of registered pilots in each county. A greater number of registered pilots in a county represents a greater demand for aviation in that county, which translates to a higher demand rank for the airport. If a county possessed multiple airports, the airport with the greatest number of based aircraft was assigned the highest score based upon the matrix to the right. The additional airports received a score based upon the proportion of based airplanes compared to the based airplanes at the largest airport. Example: A county possesses airports - “A” and “B,” and 90 pilots. Airport “A” has 50 based airplanes and Airport “B” has 25 based airplanes. Airport “A” is awarded a score of “4,” and airport “B” is awarded a score of “3.” Since Airport “B” has 33 percent of the aircraft in the county, Airport “B” is credited with 30 pilots, 33 percent of the pilots in the county.

RANGE	SCORE
300 ++	5
50 to 299	4
25 to 49	3
10 to 24	2
0 to 9	1

Source: FAA Civil Aviation Registry Oklahoma City, OK

Social/Cultural

Distance to a Metro Area – The distance from the associated city of the existing airport to a metropolitan statistical area with a population of 100,000 residents was measured in miles. The associated cities that are farthest from the metropolitan areas received the highest demand rank. The towns that are in the most rural areas of the State possess a higher demand for aviation based on their isolation from the metropolitan areas. The scores were based upon the matrix to the right.

RANGE	SCORE
250 ++	5
200 to 245	4
125 to 195	3
55 to 120	2
5 to 50	1
0	0

Source: Map Quest Driving Distance from the Airport to the nearest MSA of 100,000 people or more

Results of Demand Evaluation

With each airport and factor scored, the appropriate weights were applied to the system performance categories to develop final scores for each airport. For those system performance categories with more than one factor, the scores of the factors were combined and divided by the number of factors, such that each category was scored separately. The sum of the category scores for each airport, including the weight, produced the results of the demand evaluation. Again, this process is warranted to group the airports into functional levels based on the demand for aviation services in their area. The results of this process are presented in **Table 4-1**.

TABLE 4-1			
AVIATION DEMAND RANK OF WEIGHTED FACTORS			
County	Associated City	Airport Name	Sum of Weighted Scores
Douglas	Omaha	Eppley Airfield	45.00
Lancaster	Lincoln	Lincoln Municipal Airport	45.00
Lincoln	North Platte	North Platte Regional Airport	41.50
Buffalo	Kearney	Kearney Municipal Airport	40.50
Scotts Bluff	Scottsbluff	Western Nebraska Regional / Wm. B. Heilig	40.50
Hall	Grand Island	Central Nebraska Regional Airport	39.50
Madison	Norfolk	Karl Stefan Memorial Airport	39.50
Douglas	Omaha	Millard Airport	37.50
Platte	Columbus	Columbus Municipal Airport	36.50
Adams	Hastings	Hastings Municipal Airport	36.50
Box Butte	Alliance	Alliance Municipal Airport	36.00
Red Willow	McCook	McCook Municipal Airport	35.00
Douglas	Omaha	North Omaha Airport	34.50
Gage	Beatrice	Beatrice Municipal Airport	32.00
Dawes	Chadron	Chadron Municipal Airport	31.00
Dodge	Fremont	Fremont Municipal Airport	31.00
Cheyenne	Sidney	Sidney Municipal Airport	31.00

TABLE 4-1(CONTINUED)			
AVIATION DEMAND RANK OF WEIGHTED FACTORS			
County	Associated City	Airport Name	Sum of Weighted Scores
Dakota	South Sioux City	Martin Field	28.50
Cherry	Valentine	Miller Field	27.00
Dawson	Lexington	Jim Kelly Field	26.50
Keith	Ogallala	Searle Field	26.50
Custer	Broken Bow	Broken Bow Municipal Airport	26.00
Holt	O'Neill	O'Neill Muni.-John L. Baker Field	26.00
Phelps	Holdrege	Brewster Field	25.50
Cass	Plattsmouth	Plattsmouth Municipal Airport	25.50
Washington	Blair	Blair Municipal Airport	24.50
Saline	Crete	Crete Municipal Airport	24.50
York	York	York Municipal Airport	24.50
Otoe	Nebraska City	Nebraska City Municipal Airport	23.50
Seward	Seward	Seward Municipal Airport	23.50
Wayne	Wayne	Wayne Municipal Airport	22.50
Kearney	Minden	Pioneer Village Field	21.50
Otoe	Nebraska City	Grundman Airport	21.50
Hamilton	Aurora	Aurora Municipal Airport	20.50
Richardson	Falls City	Brenner Field	20.50
Saunders	Wahoo	Wahoo Municipal Airport	20.50
Merrick	Central City	Central City Municipal Airport	19.50
Dawson	Cozad	Cozad Municipal Airport	19.50
Kimball	Kimball	Robert E. Arraj Field	19.50
Jefferson	Fairbury	Fairbury Municipal Airport	18.50
Sheridan	Gordon	Gordon Municipal Airport	18.50
Dawson	Gothenburg	Quinn Field	18.50
Nemaha	Auburn	Farington Field	17.50
Perkins	Grant	Grant Municipal Airport	17.50
Chase	Imperial	Imperial Municipal Airport	17.50
Brown	Ainsworth	Ainsworth Municipal Airport	16.50
Sheridan	Rushville	Modisett Field	16.00
Boone	Albion	Albion Municipal Airport	15.50
Antelope	Neligh	Antelope County Airport	15.50
Valley	Ord	Evelyn Sharp Field	15.50
Furnas	Cambridge	Cambridge Municipal Airport	15.00
Frontier	Curtis	Curtis Municipal Airport	15.00
Garden	Oshkosh	Garden County Airport	15.00
Dodge	Scribner	Scribner State Airfield	15.00
Holt	Atkinson	Stuart-Atkinson Municipal Airport	14.50
Knox	Creighton	Creighton Municipal Airport	14.50

TABLE 4-1(CONTINUED)			
AVIATION DEMAND RANK OF WEIGHTED FACTORS			
County	Associated City	Airport Name	Sum of Weighted Scores
Butler	David City	David City Municipal Airport	14.50
Cedar	Hartington	Hartington Municipal Airport	14.50
Thayer	Hebron	Hebron Municipal Airport	14.50
Grant	Hyannis	Grant County Airport	14.50
Nuckolls	Superior	Superior Municipal Airport	14.50
Burt	Tekamah	Tekamah Municipal Airport	14.50
Sheridan	Hay Springs	Hay Springs Municipal Airport	14.00
Hooker	Mullen	Hooker County Airport	14.00
Thomas	Theadford	Thomas County Airport	14.00
Fillmore	Fairmont	Fairmont State Airfield	14.00
Lincoln	Wallace	Wallace Municipal Airport	13.50
Knox	Bloomfield	Bloomfield Municipal Airport	13.00
Deuel	Chappell	Billy G Ray Field	13.00
Sherman	Loup City	Loup City Municipal Airport	13.00
Webster	Red Cloud	Red Cloud Municipal Airport	13.00
Custer	Sargent	Sargent Municipal Airport	13.00
Arthur	Arthur	Arthur Municipal Airport	12.50
Hitchcock	Trenton	Trenton Municipal Airport	12.50
Furnas	Arapahoe	Arapahoe Municipal Airport	12.00
Rock	Bassett	Rock County Airport	12.00
Garfield	Burwell	Cram Field	12.00
Pawnee	Pawnee City	Pawnee City Municipal Airport	12.00
Polk	Stromsburg	Stromsburg Municipal Airport	12.00
Johnson	Tecumseh	Tecumseh Municipal Airport	12.00
Greeley	Greeley	Greeley Municipal Airport	11.50
Clay	Harvard	Harvard State Airfield	11.50
Harlan	Alma	Alma Municipal Airport	11.00
Harlan	Alma	Harlan County Lake	11.00
Nance	Genoa	Genoa Municipal Airport	11.00
Thurston	Pender	Pender Municipal Airport	11.00
Cass	Weeping Water	Browns Airport	11.00
Holt	Chambers	Perkins Memorial Airport	10.50
Key Paha	Springview	Springview Municipal Airport	10.50
Sioux	Harrison	Harrison Sky ranch	10.50
Seward	Utica	Flying "V" Airport	10.00
Saline	Wilber	Wilber Municipal Airport	9.00

Source: Wilbur Smith Associates

AIRPORT FUNCTIONAL LEVELS

With the airports scored based on their demand for aviation, the number of functional levels for the Nebraska aviation system was considered next. Functional levels are needed to determine the facility and service standards that should be used to evaluate the adequacy of Nebraska’s airport system and how the system is functioning to meet the objectives set forth in Chapter One. The 1992 Nebraska SASP established five categories of airports, loosely based on definitions used by the Federal Aviation Administration (FAA) at the time the plan was conducted. These five categories were the following:

- ❑ Landing strip
- ❑ Basic utility
- ❑ General utility
- ❑ Transport, business jet
- ❑ Transport, commercial service

The FAA no longer uses a standard classification system, other than the delineation between commercial airports and general aviation airports. To further classify airports, especially as they relate to design, the FAA groups airports based on the type of aircraft that regularly operate at the airport. The new classification system is referred to as Airport Reference Codes (ARCs). This system will be discussed in more detail in a subsequent section.

To develop a functional level classification system for Nebraska based on the results of the demand analysis, the airport scores were reviewed to find natural breaks in the final scores. These natural breaks were presumed to represent division lines between the functional categories of the airports. Through review of the natural breaks and discussion with the PAC, it was determined that four categories of airports should be considered for this Update of the NASP. Classifications for the four categories were developed based on review of other state system planning efforts, the 1992 plan, and input from the PAC, NDA, and the FAA. The four classifications will serve as the baseline, with possible refinement as the evaluation of the system is conducted in later tasks. The four classifications are as follows:

- ❑ National
- ❑ Regional
- ❑ Local
- ❑ Limited

The natural breaks in the final scores for airports functional level classifications are identified in the matrix to the right. The maximum score that any airport could earn was “50,” and a minimum score of “8.5.” The range for the total weighted score for the National Classification was 31 to 50; the range for the Regional Classification was 17.5 to 30.5; the range for the Local Classification was 13 to 17; and the range for the Limited Classification was 0 to 12.5.

RANGE	SCORE
31 to 50	NATIONAL
17.5 to 30.5	REGIONAL
13 to 17	LOCAL
0 to 12.5	LIMITED

Aviation Demand Classification Definitions

Based on discussion with the Department of Aeronautics, the following definitions were drafted for the four airport classifications:

National – maintains a consistent and contributing role in enabling the local, regional, and statewide economy to have access to and from the national and worldwide economy

Regional – maintains a contributing role in supporting the local and regional economies and connecting it to the State and National economies

Local – maintains a supplemental contributing role for the local economy

Limited – maintains a limited contributing role for the local economy

These classifications rank the demand for aviation in the associated cities for existing airports. The classification does not dictate the role of the existing airport within the State Aviation System. In subsequent chapters, each airport will be analyzed in regard to its role within the State Aviation System, and those airports in close proximity to where aviation services are duplicated will be identified. The identification of airports within a region where aviation services are duplicated may dictate reclassification to a lower group.

Table 4-2 presents a list of airports alphabetically by the name of the associated city, and classified into the four categories listed above. **Exhibit 4-1** graphically depicts the airports by associated city and classification.

**TABLE 4-2
NEBRASKA AVIATION DEMAND CLASSIFICATIONS**

NATIONAL	
Associated City	Airport Name
Alliance	Alliance Municipal Airport
Beatrice	Beatrice Municipal Airport
Chadron	Chadron Municipal Airport
Columbus	Columbus Municipal Airport
Fremont	Fremont Municipal Airport
Grand Island	Central Nebraska Regional Airport
Hastings	Hastings Municipal Airport
Kearney	Kearney Municipal Airport
Lincoln	Lincoln Municipal Airport
McCook	McCook Municipal Airport
Norfolk	Karl Stefan Memorial Airport
North Platte	North Platte Regional Airport
Omaha	Eppley Airfield*
Omaha	Millard Airport*
Omaha	North Omaha Airport
Scottsbluff	Western Nebraska Regional / Wm. B. Heilig
Sidney	Sidney Municipal Airport

*Designated U.S. International Airports

REGIONAL	
Associated City	Airport Name
Auburn	Farington Field
Aurora	Aurora Municipal Airport
Blair	Blair Municipal Airport
Broken Bow	Broken Bow Municipal Airport
Central City	Central City Municipal Airport
Cozad	Cozad Municipal Airport
Crete	Crete Municipal Airport
Fairbury	Fairbury Municipal Airport
Falls City	Brenner Field
Gordon	Gordon Municipal Airport
Gothenburg	Quinn Field
Grant	Grant Municipal Airport
Holdrege	Brewster Field
Imperial	Imperial Municipal Airport
Kimball	Robert E. Arraj Field
Lexington	Jim Kelly Field
Minden	Pioneer Village Field
Nebraska City	Nebraska City Municipal Airport
Ogallala	Searle Field
O'Neill	O'Neill Muni.-John L. Baker Field
Plattsmouth	Plattsmouth Municipal Airport
Seward	Seward Municipal Airport
South Sioux City	Martin Field
Valentine	Miller Field
Wahoo	Wahoo Municipal Airport
Wayne	Wayne Municipal Airport
York	York Municipal Airport

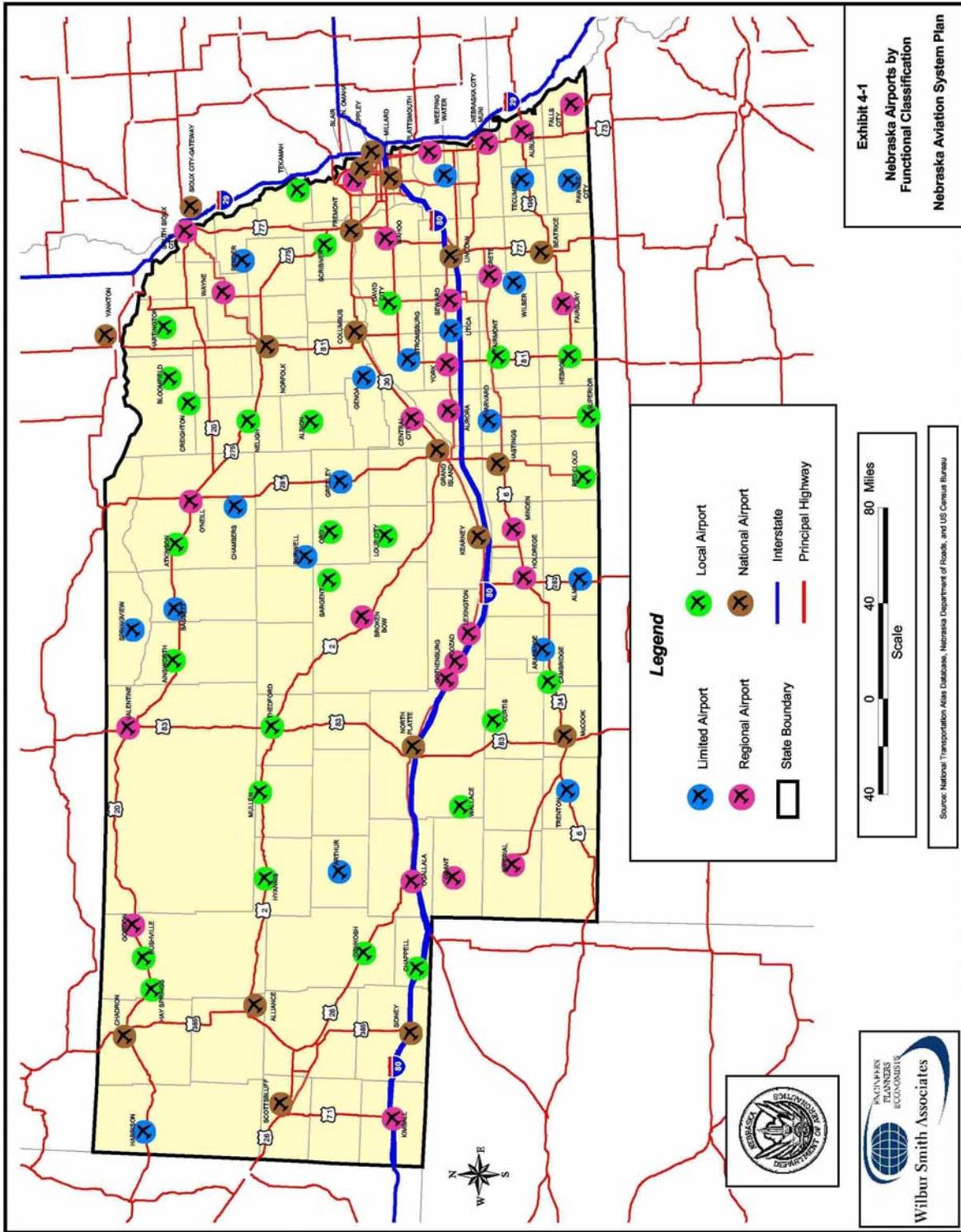
**TABLE 4–2 (CONTINUED)
NEBRASKA AVIATION DEMAND CLASSIFICATIONS**

LOCAL		LIMITED	
Associated City	Airport Name	Associated City	Airport Name
Ainsworth	Ainsworth Municipal Airport	Alma	Alma Municipal Airport
Albion	Albion Municipal Airport	Arapahoe	Arapahoe Municipal Airport
Atkinson	Stuart-Atkinson Municipal Airport	Arthur	Arthur Municipal Airport
Bloomfield	Bloomfield Municipal Airport	Bassett	Rock County Airport
Cambridge	Cambridge Municipal Airport	Burwell	Cram Field
Chappell	Billy G Ray Field	Chambers	Perkins Memorial Airport
Creighton	Creighton Municipal Airport	Genoa	Genoa Municipal Airport
Curtis	Curtis Municipal Airport	Greeley	Greeley Municipal Airport
David City	David City Municipal Airport	Harrison	Harrison Skyranch
Fairmont	Fairmont State Airfield	Harvard	Harvard State Airfield
Hartington	Hartington Municipal Airport	Pawnee City	Pawnee City Municipal Airport
Hay Springs	Hay Springs Municipal Airport	Pender	Pender Municipal Airport
Hebron	Hebron Municipal Airport	Springview	Springview Municipal Airport
Hyannis	Grant County Airport	Stromsburg	Stromsburg Municipal Airport
Loup City	Loup City Municipal Airport	Tecumseh	Tecumseh Municipal Airport
Mullen	Hooker County Airport	Trenton	Trenton Municipal Airport
Neligh	Antelope County Airport	Utica	Flying "V" Airport
Ord	Evelyn Sharp Field	Weeping Water	Browns Airport
Oshkosh	Garden County Airport	Wilber	Wilber Municipal Airport
Red Cloud	Red Cloud Municipal Airport		
Rushville	Modisett Field		
Sargent	Sargent Municipal Airport		
Scribner	Scribner State Airfield		
Superior	Superior Municipal Airport		
Tekamah	Tekamah Municipal Airport		
Theford	Thomas County Airport		
Wallace	Wallace Municipal Airport		

Source: Wilbur Smith Associates

The next section focuses on the FAA classification system for airports, and will be followed by facility and service standards for these four airport classifications.

EXHIBIT 4-1



AIRPORT REFERENCE CODE (ARC) SYSTEM

In this system, the FAA relates airport design criteria to the operational and physical characteristics of the airplanes intended to operate at an airport. The ARC has two components related to the airport design aircraft. The first component, depicted by a letter, is the aircraft approach category; it relates to the aircraft approach speed. The second component, depicted by a Roman numeral, is the airplane design group; it relates to the airplane wingspan. Generally, runways are related to aircraft approach speed, airplane wingspan, and designated or planned approach visibility minimums. **Table 4-3** provides a list of common airplanes with their approach category and design group per FAA standards.

**TABLE 4-3
AIRCRAFT CLASSIFICATION STANDARDS**

FAA Aircraft Approach Categories		
Approach Category	Approach Speed (Knots)	Typical Aircraft Type
A	Less than 91	Beech Bonanza, Cessna 150, Cessna 172
B	91 but less than 121	King Air, Citation I & II, Falcon 50
C	121 but less than 141	Lear 25, Gulfstream III
D	141 but less than 166	Gulfstream II and IV, B-747, B-777

FAA Wingspan Design Groups		
Design Group	Wingspan (Feet)	Typical Aircraft Type
I	Less than 49	Beech Baron 58, Cessna 150, Cessna 172
II	49 but less than 79	Beech King Air C-90, Gulfstream I, Falcon 50
III	79 but less than 118	B-727, B737, DC-9
IV	118 but less than 171	A-300, B-757, B-767, L-1011, DC-10
V	171 but less than 197	B-747, B-777
VI	197 but less than 262	Lockheed C-5A

Source: Federal Aviation Administration

FACILITY AND SERVICE STANDARDS

Once system airports are grouped into classifications or functional levels, it is desirable to identify facilities and services that should ideally be available at airports included in the four classifications. It is important to note that facility and service objectives delineated in this section are just that, objectives. It is possible that airports included in or recommended for an increase in their classification in later analyses may, for one or more reasons, be unable to comply with certain facility and service objectives. An airport’s inability to meet the facility and service objectives for its classification does not necessarily preclude that airport from performing that role or function within the system, but will be considered in the analysis of options to meet identified system deficiencies. **Table 4-4** identifies the minimum facility standards for each of the four airport classifications.

**TABLE 4-4
MINIMUM FACILITY STANDARDS**

AIRPORT CLASSIFICATION	MINIMUM CRITERIA
<u>NATIONAL AIRPORTS</u>	
ARC:	C-II or Design Aircraft
RUNWAY LENGTH:	75% Large Aircraft at 60% Useful Load
RUNWAY WIDTH:	To Meet ARC
CROSSWIND RUNWAY:	As Needed to Meet 95% Coverage
TAXIWAY:	Full Parallel
NAVIGATIONAL AID:	Precision Approach
VISUAL AIDS:	MALSR, PAPIs
LIGHTING:	MIRL , Beacon
WEATHER:	Automated Weather Reporting
SERVICES:	Phone, Restrooms, FBO, Maintenance, Jet
	Fuel, Ground Transportation, RCO/ATCT
FACILITIES:	Terminal, Aircraft Apron, Hangars, Auto Parking
GROUND ACCESS:	Full paved road from associated city to terminal
	Roadway signs on and off site

**TABLE 4-4 (CONTINUED)
MINIMUM FACILITY STANDARDS**

AIRPORT CLASSIFICATION	MINIMUM CRITERIA
<u>REGIONAL AIRPORTS</u>	
ARC:	B-II or Greater
RUNWAY LENGTH:	100% of Small Aircraft w/ less than 10 passenger seats
RUNWAY WIDTH:	To Meet ARC
TAXIWAY:	Partial Parallel
NAVIGATIONAL AIDS:	Non-Precision Approach
VISUAL AIDS:	PAPIs
LIGHTING:	MIRL, Beacon
WEATHER:	Automated Weather
SERVICES:	Phone, Restrooms, FBO, Maintenance, Jet Fuel, Ground Transportation
FACILITIES:	Terminal, Aircraft Apron, Hangars, Auto Parking
GROUND ACCESS:	Full paved road from associated city to terminal Roadway signs on and off site

AIRPORT CLASSIFICATION	MINIMUM CRITERIA
<u>LOCAL AIRPORTS</u>	
ARC:	B-I or Greater
RUNWAY LENGTH:	95% of Small Aircraft (NPIAS airports) 75% of Small Aircraft (non-NPIAS)
RUNWAY WIDTH:	60'-NPIAS, 50'-non-NPIAS
TAXIWAY:	Turnarounds & Connectors
NAVIGATIONAL AIDS:	Non-Precision Approach
VISUAL AIDS:	PAPIs
LIGHTING:	MIRL, Beacon
SERVICES:	Phone, Restrooms, Fuel
FACILITIES:	Pilots Lounge, Aircraft Apron, Hangars, Auto Parking
GROUND ACCESS:	Roadway signs on and off site

**TABLE 4-4 (CONTINUED)
MINIMUM FACILITY STANDARDS**

AIRPORT CLASSIFICATION	MINIMUM CRITERIA
<u>LIMITED AIRPORTS</u>	
ARC:	A-I or Turf
RUNWAY LENGTH:	95% of Small Aircraft (NPIAS airports)
RUNWAY WIDTH:	Maintain Existing (non-NPIAS)
TAXIWAY:	60' Paved or 120' Turf (NPIAS)
LIGHTING:	50' Paved or 100' Turf (non-NPIAS)
SERVICES:	Connector and/or Turnarounds
FACILITIES:	Reflectors or LIRL & Beacon
GROUND ACCESS:	Phone, Restrooms
	Aircraft Apron, Hangars, Auto Parking
	Roadway signs on and off site

Source: Wilbur Smith Associates