

SUBMITTAL CHECKLIST

SITE PLAN REVIEW

Location: Walker Field

Project Name: hangars

ITEMS	DISTRIBUTION																	TOTAL REQ'D.									
DESCRIPTION	SSID REFERENCE	City Community Development	City Dev. Eng.	City Utility Eng.	City Property Agent - Police	City Parks/Recreation	City Fire Department	City Attorney	City Downtown Dev. Auth.	County Planning	County Bldg. Dept.	Irrigation District	Drainage District	Water District - WIC	Sewer District	U.S. West	Public Service	GVRP	CDOT	Corps of Engineers	Walker Field	Pursigo WWT	Mesa County Health	State Environ. Health	City Sanitation	School Dist #51	
● Application Fee \$100	VII-1	1																									
● Submittal Checklist*	VII-3	1																									
● Review Agency Cover Sheet*	VII-3	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
● Planning Clearance*	VII-3	1																									
● 11"x17" Reduction of Assessor's Map	VII-1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
● Evidence of Title <u>LEASE Agmt</u>	VII-2	1			1			1																			
○ Deeds	VII-1	1			1			1																			
○ Easements	VII-2	1	1	1	1			1																			
○ Avigation Easement	VII-1	1			1			1																			
○ ROW	VII-2	1	1	1	1			1																			
○ Improvements Agreement/Guarantee*	VII-2	1	1	1				1																			
○ CDOT Access Permit	VII-3	1	1																								
○ Industrial Pretreatment Sign-off	VII-4	1		1																							
● General Project Report	X-7	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
○ Elevation Drawing	IX-13	1	1																								
● Site Plan*	IX-29	2	2	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
○ 11"x17" Reduction of Site Plan	IX-29				1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
● Grading and Drainage Plan	IX-16	1	2									1								1							
○ Storm Drainage Plan and Profile	IX-30	1	2									1			1	1	1										
○ Water and Sewer Plan and Profile	IX-34	1	2	1		1						1	1	1	1	1											
○ Roadway Plan and Profile	IX-28	1	2									1															
○ Road Cross-Sections	IX-27	1	2																								
○ Detail Sheet	IX-12	1	2																								
● Landscape Plan	IX-20	2	1	1																							
○ Geotechnical Report	X-8	1	1							1																	
○ Final Drainage Report	X-5,6	1	2									1															
○ Stormwater Management Plan	X-14	1	2									1								1							
○ Phase I and II Environmental Rerpot	X-10,11	1	1																								
○ Traffic Impact Study	X-15	1	2																	1							

9 TOTAL REQ'D.

NOTES: * An asterisk in the item description column indicates that a form is supplied by the City.

PRE-APPLICATION CONFERENCE

Date: 9/10/96
Conference Attendance: Steve McCallum, Kristen Ashbeck
Proposal: Hangar
Location: Walker Field

Tax Parcel Number: 2705-312-00-941
Review Fee: \$100

(Fee is due at the time of submittal. Make check payable to the City of Grand Junction.)

Additional ROW required?
Adjacent road improvements required?
Area identified as a need in the Master Plan of Parks and Recreation?
Parks and Open Space fees required? Estimated Amount:
Recording fees required? Estimated Amount:
Half street improvement fees/TCP required? Per engineering Estimated Amount:
Revocable Permit required?
State Highway Access Permit required?
On-site detention/retention or Drainage fee required? Per engineering
Applicable Plans, Policies and Guidelines
Located in identified floodplain? FIRM panel #
Located in other geohazard area?
Located in established Airport Zone? Clear Zone, Critical Zone, Area of Influence?
Avigation Easement required?

While all factors in a development proposal require careful thought, preparation and design, the following "checked" items are brought to the petitioner's attention as needing special attention or consideration. Other items of special concern may be identified during the review process.

- Access/Parking, Drainage, Floodplain/Wetlands Mitigation, Other, Screening/Buffering, Landscaping, Availability of Utilities, Land Use Compatibility, Traffic Generation, Geologic Hazards/Soils

Related Files:

It is recommended that the applicant inform the neighboring property owners and tenants of the proposal prior to the public hearing and preferably prior to submittal to the City.

PRE-APPLICATION CONFERENCE

WE RECOGNIZE that we, ourselves, or our representative(s) must be present at all hearings relative to this proposal and it is our responsibility to know when and where those hearings are.

In the event that the petitioner is not represented, the proposed item will be dropped from the agenda, and an additional fee shall be charged to cover rescheduling expenses. Such fee must be paid before the proposed item can again be placed on the agenda. Any changes to the approved plan will require a re-review and approval by the Community Development Department prior to those changes being accepted.

WE UNDERSTAND that incomplete submittals will not be accepted and submittals with insufficient information, identified in the review process, which has not been addressed by the applicant, may be withdrawn from the agenda.

WE FURTHER UNDERSTAND that failure to meet any deadlines as identified by the Community Development Department for the review process may result in the project not being scheduled for hearing or being pulled from the agenda.

X Steve McCall
Signature(s) of Petitioner(s)

X [Signature]
Signature(s) of Representative(s)

GENERAL PROJECT REPORT

October 18, 1996

**HANGAR NUMBER ONE
WALKER FIELD AIRPORT
GRAND JUNCTION, CO 81501**

**Prepared For:
TPI INDUSTRIAL INC.
464 -25 ½- Road
Grand Junction, CO 81505**

**Prepared By:
HydroTerra Environmental Consulting
1179 Santa Clara Avenue
Grand Junction, CO 81505
970-242-4454**

Table of Contents

	<u>Page</u>
1. General Location and Description	1
2. Public Benefit	2
3. Considerations	2
4. Soils, and Drainage	3
5. Development Schedule and Phasing	5
6. Results and Conclusions	5

1. General Location and Description

The proposed project is located in the eastern part of the Walker Field Airport along Aviators Way near the Westar Aviation Building (See Assessor's map in site plan submittal). This area is within the boundaries of the Walker Field Airport Authority and the City of Grand Junction (NE 1/4 of Section 31, T1N, R1E, Ute Prime Meridian). Thus, the site plan will be submitted to both the Airport Authority and the City of Grand Junction for review and comment.

The project proposes erecting two hangar buildings on a leased lot 252 ft by 230 ft (1.33 acres-zoned Planned Airport Development- PAD). The lot is on the south side of Aviators Way and all utilities are available within the street right-of-way. The proposed development is consistent with current zoning and with other development in the area. The proposed building dimensions are 80ft x 172ft (13,760ft²) for the larger building and 40ft x 150ft (6,000ft²) for the smaller building. The larger building will contain approximately 1200 ft² of office space and 5 individual hangars. The smaller building will contain 3 hangars. The buildings will be steel construction on concrete pads.

The subject land parcel is bounded by Aviators Way on the north, Westar Aviation on the east, Taxiway C-1 on the south, and the GM Hangar, currently under construction, on the west.

The proposed project will have two routes of access for automobiles and two routes of access for aircraft. Automobile parking for ten vehicles will be provided along Aviators way as shown on the site plan. Aircraft parking will be provided in the eight hangars. Two-way traffic will circulate the proposed parking area. Occasional automobile access to the hangar area alley will be provided through two 12 ft rolling gates. Pedestrian access will be provided by two 4 ft walk-in gates. Aircraft access will be provided by two paved ramps leading two Taxiway C-1.

Utilities are already present in the area. Telephone service, electricity, a gas line, and water and

sewer service are currently available to the parcel along Aviators Way. A fire hydrant is located about 15 ft north of the larger building.

Utility providers to the property are as follows:

Public Service - gas and electric

Ute Water - potable water

City of Grand Junction - sewer

U.S. West - telephone service

2. Public Benefit

The proposed project will help fulfill a need for additional private aircraft hangar space at the airport. The hangars will be condominiumized, meaning that each hangar will be individually owned. This development will provide hangar space for eight private aircraft.

3. Considerations

- Land use in the surrounding area is all related to the operation of Walker Field Airport as the proposed development will be.
- Automobile access will be limited to Aviators Way.
- The hangars will be privately owned, so there will be no employees at the site. Thus, 10 parking spaces are provided for the 8 private hangars.
- Anticipated hours of operation will be primarily daylight hours.
- No sign is currently planned for the development.
- All utilities are available on or at the edge of the property. A fire hydrant is located directly north of the larger hangar building.
- No special or unusual utility demands have been identified for the proposed development.
- There is already development in the area requiring public services and facilities. Thus,

there will be minimal impacts on public facilities such as fire and police protection, and sanitation.

- Impacts to traffic will be minimal as Aviators Way provides 2 lane, two-way travel to the site but ends less than 100 ft east of the development. Ingress and egress will not require modifications to the existing street. There is no curb and gutter, thus, no curb cuts will be necessary for access. The access will be graveled.

4. Soils, and Drainage

The Natural Resources Conservation Service (formerly the Soil Conservation Service) identifies the soils on the parcel as Persayo Silty Loam (PeD). Based on the properties listed for this soil type, the project will not be adversely impacted by soils and no geologic hazards or constraints to the proposed development are identified.

Historically, runoff from the property drained south and was collected by the existing Walker Field stormwater drainage system about 900 ft south of Taxiway C-1. Developed drainage from the two proposed hangars and the area in between will be routed to two detention basins located south of the two hangar buildings (see site plan). Runoff from the area west of the larger hangar building will be directed south along the lease boundary to Taxiway C-1 where it will cross the taxiway and follow historic drainage patterns. Drainage from the right-of-way of Aviators Way and the proposed parking area will drain west along the historic drainage route to a storm sewer area inlet located in front of the Shade Hanger, about 150 ft west of the proposed development.

Calculation of 100 year historic total runoff:

{per City of Grand Junction, Stormwater Management Manual (SWMM), June 1994}

Total 100 year runoff - $Q_{100} = C^{100} \times I^{100} \times \text{Area}$

$$C^{100} = 0.34 \text{ (from SWMM)}$$

$$I^{100} = 0.17 \text{ ft (from SWMM)}$$

$$Q_{100} = 0.34 \times 0.17 \text{ ft} \times 57,500 \text{ ft}^2 = 3,323 \text{ ft}^3$$

Calculation of 100 year developed runoff:

{per City of Grand Junction, Stormwater Management Manual (SWMM), June 1994}

Drainage Basin	Surface Type	C¹⁰⁰	Area (ft²)	Weighted C¹⁰⁰
West side	non-green landscape	0.54	2,760	CxA = 1490
	pave/roof	0.95	13,780	CxA = 13091
		Total	16,540	14581/16540 = 0.88 = C¹⁰⁰
Central area	Non-green landscape	0.54	800	CxA = 432
	roof/pave	0.95	19,920	CxA = 18,924
		Total	20,720	19356/20720 = 0.93 = C¹⁰⁰
East side	Non-green landscape	0.54	3,150	CxA = 1701
	roof/pave	0.95	17,550	CxA = 16672
		Total	20,700	18373/20700 = 0.88 = C¹⁰⁰

Total 100 year runoff - $Q_{100} = C^{100} \times I^{100} \times A$ $I^{100} = 0.17\text{ft}$ (from SWMM)

West Side - $0.88 \times 0.17\text{ft} \times 16,540 \text{ft}^2 = 2,474 \text{ft}^3$

This runoff will be directed south across taxiway C-1 without detention

Central Area - $0.93 \times 0.17\text{ft} \times 20,720 \text{ft}^2 = 3,275 \text{ft}^3$

This runoff will be directed to detention Basin A and will be retained on site. Basin A capacity will be 3800ft^3 as shown on the grading and drainage plan. (Volume = $L \times W \times D = 80\text{ft} \times 48\text{ft} \times 1\text{ft} = 3,840 \text{ft}^3$.)

East Side - $0.88 \times 0.17 \text{ft} \times 20,700 \text{ft}^2 = 3,096 \text{ft}^3$

This runoff will be directed to Basin B where approximately 75% will be retained in Basin B and the remainder will discharge into Basin A. Any excess from Basin A will discharge south across taxiway C-1. Basin B capacity will be 2400ft^3 as shown on the grading and drainage plan. (Volume = $L \times W \times D = 48\text{ft} \times 50\text{ft} \times 1\text{ft} = 2,400 \text{ft}^3$.)

Total 100 year developed runoff = $2,474 \text{ft}^3 + 3,275 \text{ft}^3 + 3,096 \text{ft}^3 = 8845\text{ft}^3$

Thus, if 100 year historic runoff is 3323ft^3 as calculated above and total 100 year developed runoff will be 8845ft^3 , retention of developed runoff exceeding historic runoff would be $8845 \text{ft}^3 - 3323 \text{ft}^3 = 5522 \text{ft}^3$. The total retention provided by the two basins is $3800 \text{ft}^3 + 2400 \text{ft}^3 = 6200 \text{ft}^3$, which is more than the additional runoff resulting from development.

5. Development Schedule and Phasing

The proposed development will be completed as one phase. Phase one will be construction of the proposed buildings and all associated parking and landscaping. Construction is scheduled to start as soon as all planning clearances are received, hopefully in the Fall of 1996.

6. Results and Conclusions

In summary, the proposed development is consistent with zoning and current use in the area. Significant impacts to existing infrastructure are not anticipated. Based on the scope of the planned development and the consideration of geologic hazards and drainage, the site appears to be well suited. The schedule provides for having a private hangar space available for occupancy in 1996 or early 1997, and based on the growing demand for such space, there is a need in the community for this development.

REVIEW COMMENTS

Page 1 of 2

FILE #SPR-96-230

TITLE HEADING: Airport Hangars

LOCATION: 2867 & 2869 Aviator Way

PETITIONER: TPI Industrial

PETITIONER'S ADDRESS/TELEPHONE: 464 25 1/2 Road
Grand Junction, CO 81505
243-4642

PETITIONER'S REPRESENTATIVE: David Smuin

STAFF REPRESENTATIVE: Bill Nebeker

NOTE: THE PETITIONER IS REQUIRED TO SUBMIT FOUR (4) COPIES OF WRITTEN RESPONSE AND REVISED DRAWINGS ADDRESSING ALL REVIEW COMMENTS.

CITY COMMUNITY DEVELOPMENT 11/7/96
Bill Nebeker 244-1447

1. Required parking (at least 4 spaces) must be paved.
2. Isn't it more desirable to locate the landscaping in the front between the building and the hangars and include some trees?

CITY DEVELOPMENT ENGINEER 11/1/96
Jody Kliska 244-1591

1. Transportation Capacity Payment - \$480.00.
2. It appears based on the office space 4 parking spaces are required. The City Code requires all required parking and maneuvering areas, including the driveways, to be paved.

CITY UTILITY ENGINEER 11/6/96
Trent Prall 244-1590

Please contact Jodi Romero at the City's Customer Service section, 244-1520, for information regarding sewer plant investment fees.

CITY FIRE DEPARTMENT 11/4/96
Hank Masterson 244-1414

1. Submit complete sealed plans to the Fire Department for our review and approval.
2. A knock box or knock padlocks must be provided for gates to allow Fire Department access. Application for knock box/padlock must be obtained at Fire Department.

CITY POLICE DEPARTMENT 10/23/96
Lisa Dicamillo 244-3587

These plans follow the current trend in Crime Prevention using lighting and landscaping.

CITY ATTORNEY

10/28/96

Dan Wilson

244-1505

1. Trash, for the office space.....
2. Graveled areas - dust concern

MESA COUNTY BUILDING DEPARTMENT

10/25/96

Bob Lee

244-1656

The south-east wall located 10' from the lease boundary line must be one-hour fire-resistive or a distance of 40' must be maintained between buildings. Sealed plans must be submitted for each building.

UTE WATER

11/4/96

Gary Mathews

242-7491

1. Policies and fees in effect at the time of application will apply.
2. Contact with Ute Water is needed if the Fire Department requires fire protection other than what is existing.

WALKER FIELD AIRPORT

10/25/96

Dennis Wiss

244-9100

1. The Walker Field Airport Authority has no objections to this proposed site and construction. These structures are compatible-use structures as defined in the Airport's Master Plan and are on Airport property.
2. An FAA Form 7460, Proposed Alteration or Construction, must be filed with the FAA and approved by the FAA prior to the start of this construction. The Airport Authority requests a copy of this completed and approved form when it is received from the FAA.

Comment Response Letter

File #SPR-96-230

November 11, 1996

Location: 2867 and 2869 Aviator Way

Petitioner: TPI Industrial
552 25 Road, #D
Grand Jct, CO 81505
243-4642

RECEIVED GRAND JUNCTION
PLANNING DEPARTMENT.

NOV 15 1996

Petitioner's Representative: David Smuin, HydroTerra Environmental

Staff Representative: Bill Nebeker, Community Development Dept.

Community Development Department
Bill Nebeker

Comment: Required parking (at least 4 spaces) must be paved.

Response: The plans have been changed to include 4 paved parking spaces along with paving the associated maneuvering areas and driveway.

Comment: Isn't it more desirable to locate the landscaping in the front between the buildings and the hangars and include some

Response: The landscaping has been deleted at the request of the Airport Authority as required by the FAA (see attached letter).

City Development Engineer
Jody Kliska

Comment: Transportation capacity payment - \$480.00.

Response: No response required.

Comment: It appears based on the office space, that 4 parking spaces are required. The City Code requires all required parking and maneuvering areas, including driveways, to be paved.

Response: The plans have been changed to include 4 paved parking spaces along with paving the associated maneuvering areas and driveway.

City Utility Engineer
Trent Prall

Comment: Please contact Jodi Romero of the City Customer Service Division at 244-1520 for

information regarding sewer plant investment fees for the facility.

Response: The contact will be made, and fees will be paid.

City Fire Department
Hank Masterson

Comment: A knox box or knox padlocks must be provided for gates to allow Fire Department access. Application for knox box/padlocks must be obtained at Fire Department.

Response: Application will be made for the required box or padlocks.

Comment: Submit complete sealed plans to the Fire Department for our review and approval.

Response: The complete building plans will be submitted for review during the building permit application process.

City Police Department
Lisa Dicamillo

Comment: These plans follow the current trend in Crime Prevention using lighting and landscaping.

Response: No response required.

City Attorney
Dan Wilson

Comment: Trash for the office space.....

Response: A dumpster area has been added to the plans

Comment: Graveled areas - dust concern.....

Response: Most of the area is currently bare soil, thus, the graveled areas will actually lessen the potential for dust. Note that the required parking will be paved.

Mesa County Building Department
Bob Lee

Comment: Sealed plans must be submitted for each building.

Response: Two sets of stamped plans will be provided for review.

Comment: The southeast wall located 10' from the lease boundary line must be one-hour fire-resistant or a distance of 40' must be maintained between buildings.

Response: All applicable codes and standards will be implemented as required.

Ute Water
Gary Mathews

Comment: Policies and fees in effect at the time of application will apply.

Response: No response required.

Comment: Contact with Ute Water is needed if the Fire Department requires fire protection other than what is existing.

Response: No additional fire protection is required by the Fire Department other than possibly a fire wall. The existing hydrant will be sufficient.

Walker Field Airport
Dennis Wiss

Comment: The Walker Field Airport Authority has no objections to this proposed site and construction. These structures are compatible-use structures as defined in the Airport's Master Plan and are on Airport property.

Response: No response required.

Comment: An FAA Form 7460, Proposed Alteration or Construction, must be filed with the FAA and approved by the FAA prior to the start of this construction. The Airport Authority requests a copy of this completed and approved form when it is received from the FAA.

Response: A form will be obtained and approval will be requested. A copy of the approved form will be provided to the Airport Authority upon approval. Also please note that the storm water detention basins and landscaping have been eliminated as required by the FAA per the attached letter.

HydroTerra

Environmental Consulting

1179 Santa Clara Ave.
Grand Junction, CO 81503
Phone / Fax(970) 242-4454

WALKER FIELD Airport Authority

2828 Walker Field Drive, Suite 211
Grand Junction, Colorado 81506
(970) 244-9100
FAX (970) 241-9103

Mr. Jim Biber
1048 Independent Avenue
Grand Junction, CO 81505

November 13, 1996

RE: Installation of River Rock on Leased Premises

Dear Jim:

On October 29, 1996 you and I discussed not installing the river rock on the southern end of your leasehold abutting the taxilane. I based my conversation and comments on FAA Advisory Circular 150/5300-13, change 4, page 36, Table 4-1, Taxiway Dimensional Standards. I have enclosed a copy of the pertinent pages from this document for your review.

Essentially, what Table 4-1 is telling us is that a taxilane with a width of 35 feet, which is what the taxilane width is in your area, has an obstacle free area, (OFA), of 115 feet, centered on the taxilane centerline. That is, the OFA extends 57 1/2 feet either side of the taxilane centerline. A taxiway or taxilane OFA must provide for the safe passage of aircraft through the area should an aircraft depart the pavement. OFA's must be free of above-ground objects that are not there by necessity, such as NavAids.

Subtracting one half the width of the taxilane, 17 1/2 feet, leaves an OFA extending from the edge of the taxilane of 40 feet onto your property. Thus, the reason for my suggesting you leave the ground essentially as it is 40 feet from the taxiway back onto your leasehold, at which point you could begin the river rock installation.

On the same day that you and I talked, I was speaking with Harold Handke, Lead Airport Certification Inspector for the Northwest Mountain Region of the FAA. I was speaking with Harold on another subject and asked him his view on the proposed river rock in the OFA. Mr. Handke's comments were that this was unwise due to the potential hazard to aircraft.

Further, Mr. Handke stated that the criteria for taxiway and taxilane safety areas are basically interchangeable and the criteria for a taxiway safety area would apply to a taxilane as well. The criteria for a safety area is for the area to be cleared, graded, and with no potentially hazardous ruts, humps, depressions, or other surface variations. Again, this is to prevent damage to an aircraft should it depart the pavement.

As you can see, my comments and those of the FAA are based on the negating of any possible damage to an aircraft leaving the pavement. I am

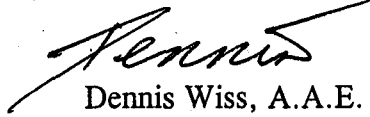


*"We've got the world
at our wingtips"*

truly sorry if this has caused any interruption of your construction plans. I certainly did not mean to slow the process when we first talked.

If there is anything else I can do for you regarding this matter, please let me know. I will be more than happy to meet with you and/or any members of the City and County Planning Commissions to discuss this issue.

Sincerely;



Dennis Wiss, A.A.E.
Director of Operations and Planning

Enclosures

Chapter 4. TAXIWAY AND TAXILANE DESIGN

400. INTRODUCTION. This chapter presents the design standards for taxiways, taxilanes, and associated airport elements.

401. DIMENSIONAL STANDARDS. Tables 4-1 and 4-2 present the dimensional standards for taxiway, taxilanes, and associated elements. Appendix 9 discusses the relationship between airplane physical characteristics and the design of taxiway and taxilane elements. The rationale presented there is useable, on a case-by-case basis, to adapt separation standards to meet unusual local conditions or to accommodate a specific airplane within an airplane design group.

402. TAXIWAY SHOULDERS. Provide stabilized or paved shoulders to reduce the possibility of blast erosion and engine ingestion problems associated with jet engines which overhang the edge of the taxiway pavement. Table 4-1 presents taxiway shoulder width standards. Soil with turf not suitable for this purpose requires a stabilized or low cost paved surface. Chapter 8 contains additional information on this subject.

403. TAXIWAY SAFETY AREA (TSA). The taxiway safety area is centered on the taxiway centerline. Table 4-1 presents taxiway safety area dimensional standards.

a. **Design Standards.** The taxiway safety area shall be:

(1) cleared and graded and have no potentially hazardous ruts, humps, depressions, or other surface variations;

(2) drained by grading or storm sewers to prevent water accumulation;

(3) capable, under dry conditions, of supporting snow removal equipment, aircraft rescue and firefighting equipment, and the occasional passage of aircraft without causing structural damage to the aircraft; and

(4) free of objects, except for objects that need to be located in the taxiway safety area because of their function. Objects higher than 3 inches (7.6 cm) above grade should be constructed on low impact resistant supports (frangible mounted structures) of the lowest practical height with the frangible point no higher than 3 inches (7.6 cm) above grade. Other objects, such as manholes, should be constructed at grade. In no case should their height exceed 3 inches (7.6 cm) above grade.

b. **Construction Standards.** Compaction of taxiway safety areas shall be to FAA specification P-152 found in AC 150/5370-10.

404. TAXIWAY AND TAXILANE OBJECT FREE AREA (OFA). The taxiway and taxilane OFAs are centered on the taxiway and taxilane centerlines as shown in figures A9-2, A9-3, and A9-4.

The taxiway and taxilane OFA clearing standards prohibit service vehicle roads, parked airplanes, and above ground objects, except for objects that need to be located in the OFA for air navigation or aircraft ground servicing purposes. Vehicles may operate within the OFA provided they give right of way to oncoming aircraft by either maintaining a safe distance ahead or behind the aircraft or by exiting the OFA to let the aircraft pass. Provide vehicular exiting areas along the outside of the OFA where required. Table 4-1 specifies the standard dimensions for OFAs.

b. **OFA clearance fillets** shall be provided at intersections and turns where curved taxiway or taxilane centerline pavement markings, reflectors, or lighting are provided. The OFA clearance fillets shall be configured to provide the standard wingtip clearance for the using aircraft. Appendix 9 provides guidance for finding the wingtip trace and Table 4-3 specifies the standard wingtip clearances.

c. **Offset taxilane pavement markings** may be used at existing facilities where it is impracticable to upgrade the facility to existing standards or as a temporary measure to assure adequate wingtip clearance until upgraded facilities meeting design standards are completed. The offset taxilane pavement markings should be located on an arc offset and parallel to the curved centerline. The radius of the offset arc should be approximately $(R^2 + d^2)^{0.5}$. R being the radius of the taxilane turn and d being a representative distance from the center of cockpit to the center of main undercarriage of the larger wingspan aircraft. Increasing the offset radius increases the clearance inside of the curve while decreasing the clearance outside of the curve. Both clearances for each of the larger wingspan aircraft need to be examined. Where offset taxilane pavement markings are provided, centerline lighting or reflectors are required.

405. PARALLEL TAXIWAY. A basic airport consists of a runway with a full length parallel taxiway, an apron, and connecting transverse taxiways between the runway, parallel taxiway, and the apron.

Table 4-1. Taxiway dimensional standards

ITEM	DIM 1/	AIRPLANE DESIGN GROUP					
		I	II	III	IV	V	VI
Taxiway Width	W	25 ft 7.5 m	60 ft 18.3 m	50 ft ^{2/} 15 m ^{2/}	75 ft 23 m	75 ft 23 m	100 ft 30 m
Taxiway Edge Safety Margin ^{3/}		5 ft 1.5 m	7.5 ft 2.25 m	10 ft ^{4/} 3 m ^{4/}	15 ft 4.5 m	15 ft 4.5 m	20 ft 6 m
Taxiway Pavement Fillet Configuration		- Refer to Table 4-2 -					
Taxiway Shoulder Width		10 ft 3 m	10 ft 3 m	20 ft 6 m	25 ft 7.5 m	35 ft ^{5/} 10.5 m ^{5/}	40 ft ^{5/} 12 m ^{5/}
Taxiway Safety Area Width	E	49 ft 15 m	79 ft 24 m	118 ft 36 m	171 ft 52 m	214 ft 65 m	262 ft 80 m
Taxiway Object Free Area Width		89 ft 27 m	131 ft 40 m	186 ft 57 m	259 ft 79 m	320 ft 97 m	386 ft 118 m
Taxilane Object Free Area Width		99 ft 24 m	135 ft 35 m	162 ft 49 m	225 ft 68 m	276 ft 84 m	334 ft 102 m

- 1/ Letters correspond to the dimensions on figures 2-1 and 4-1.
- 2/ For airplanes in Airplane Design Group III with a wheelbase equal to or greater than 60 feet (18 m), the standard taxiway width is 60 feet (18 m).
- 3/ The taxiway edge safety margin is the minimum acceptable distance between the outside of the airplane wheels and the pavement edge.
- 4/ For airplanes in Airplane Design Group III with a wheelbase equal to or greater than 60 feet (18 m), the taxiway edge safety margin is 15 feet (4.5 m).
- 5/ Airplanes in Airplane Design Groups V and VI normally require stabilized or paved taxiway shoulder surfaces.

Consideration should be given to objects near runway/taxiway/taxilane intersections which can be impacted by exhaust wake from a turning aircraft.

The values obtained from the following equations may be used to show that a modification of standards will provide an acceptable level of safety. Refer to paragraph 6 for guidance on modification of standards requirements.

Taxiway safety area width equals the airplane wingspan;

Taxiway OFA width equals 1.4 times airplane wingspan plus 20 feet (6 m); and

Taxilane OFA width equals 1.2 times airplane wingspan plus 20 feet (6 m).



Grand Junction Community Development Department
Planning • Zoning • Code Enforcement
250 North Fifth Street
Grand Junction, Colorado 81501-2668
(303) 244-1430 FAX (303) 244-1599

May 30, 1997

Steve McCallum
TPI Industrial
552 25 1/2 Road
Grand Junction, CO 81505

RE: SPR-96-230; Airport Hangars

Dear Steve:

As you know, the County Building Department has notified us that the airport hangar at 2869 Aviators Way is ready for occupancy. The Certificate of Occupancy cannot be signed by our department until all improvements shown on the approved site plan have been installed. The one remaining item is the need to install 10 wheel chocks. These wheel chocks are required by City Code, Section 5-1-4C.

On a recent site inspection I noted that several other hangars and businesses in this area also have wheel chocks or concrete curbs for their parking. This requirement cannot be waived. Please install the wheel chocks by July 1, 1997 and call for an inspection. If you have any questions please call me at 244-1447.

Sincerely,

A handwritten signature in cursive script that reads "Bill Nebeker".

Bill Nebeker
Senior Planner

~~Bill~~ BLOCKS INSTALLED:
INSPECTED 6.19.97
BN

Bill SPR-1996-230

CERTIFICATE OF OCCUPANCY

BUILDING DEPARTMENT
CITY OF GRAND JUNCTION
(OR MESA COUNTY)

PERMIT # 58632

DATE 4-23-97

PERMISSION IS HEREBY GRANTED TO T P I Const TO OCCUPY THE

BUILDING SITUATED AT 2869 Aviators Way

LOT _____ BLOCK _____ FILING _____ SUBDIVISION _____

TAX SCHEDULE NUMBER 2705-312-00-941

FOR THE FOLLOWING PURPOSE: Hangar- Storage ONLY

THIS CERTIFICATE ISSUED IN CONFORMITY TO SECTION 307, UNIFORM BUILDING CODE

INSPECTOR [Signature]
City Planning [Signature]

THIS C.O. DOES NOT INCLUDE THE TENANT FINISH

CERTIFICATE OF OCCUPANCY

BUILDING DEPARTMENT
CITY OF GRAND JUNCTION
(OR MESA COUNTY)

PERMIT # 58633

DATE 5-2-97

PERMISSION IS HEREBY GRANTED TO TPI Const TO OCCUPY THE

BUILDING SITUATED AT 2867 Aviators way

LOT _____ BLOCK _____ FILING _____ SUBDIVISION _____

TAX SCHEDULE NUMBER 2705-312-00-941

FOR THE FOLLOWING PURPOSE: hangar (THIS C.O. DOES NOT! include tenant finish)

THIS CERTIFICATE ISSUED IN CONFORMITY TO SECTION 307, UNIFORM BUILDING CODE

INSPECTOR [Signature]
City Planning [Signature]

SPR-1996-230
PC Doc 96
B. Webster

CERTIFICATE OF OCCUPANCY
CITY OF GRAND JUNCTION/MESA COUNTY, COLORADO
BUILDING DEPARTMENT

Permit Number: 58633 02/04/00

Units: 0 Permit Type: BFMP Jurisdiction: GRAND JUNCTION

Permission is hereby granted to G FORCE
to occupy the building situated at:
02867 AVIATORS WAY

Lot No.: 0 Block No.: 0 Filing No.: 0

Subdivision:

Tax Schedule No.: 2705-312-00-941

for the following purpose: hangar-rear for storage&front for Aircraft Repair Sho
p

This Certificate issued in conformity to Section 109, Uniform Building Code

Inspector

Bob [Signature]
Bill Nutter 2.29.2000

CERTIFICATE OF OCCUPANCY
CITY OF GRAND JUNCTION/MESA COUNTY, COLORADO
BUILDING DEPARTMENT

Permit Number: 58633 02/04/00

Units: 0 Permit Type: BEMP Jurisdiction: GRAND JUNCTION

Permission is hereby granted to G FORCE
to occupy the building situated at:
02867 AVIATORS WAY

Lot No.: 0 Block No.: 0 Filing No.: 0

Subdivision:

Tax Schedule No.: 2705-312-00-941

for the following purpose: hangar-rear for storage&front for Aircraft Repair Sho
p

This Certificate issued in conformity to Section 109, Uniform Building Code

Inspector

Bob [Signature]
Bill Nutter 2.29.2000

File Close-out Summary

File #: SPR-1996-230

Name: 2 Airport Hangars

Staff: Bill Nebeker

Action: C of O signed 6-19-97

Comments: Improvements installed as shown on site plan

File Turned In: 6-19-97

REVISIONS	BY
11/12/96	MK

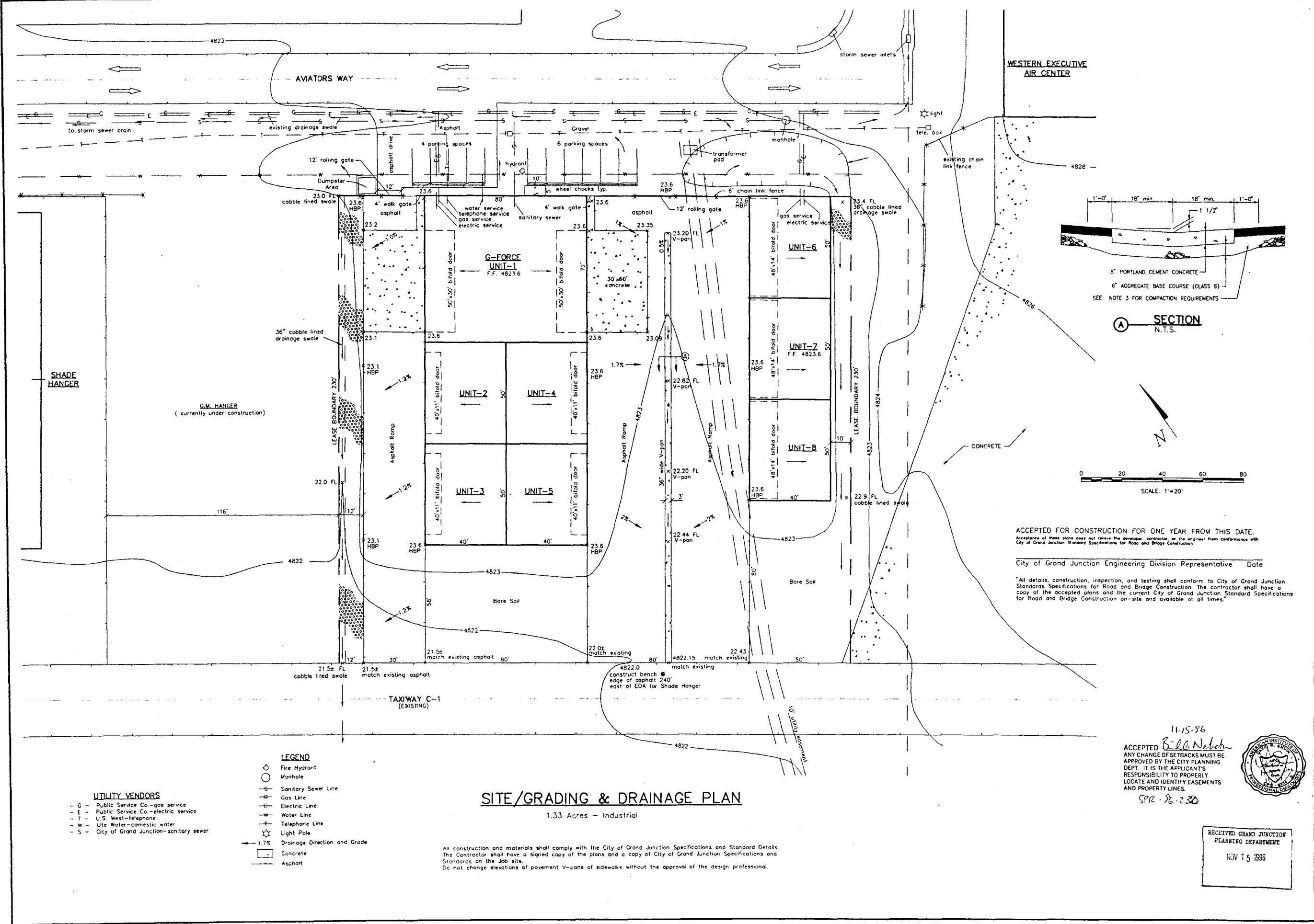
HANGER ONE
Walker Field Airport
Grand Junction, CO.

T.P.I.
552 25 Road, #D
Grand Junction, CO. 81505
(970) 243-4642

HydroTerra
Environmental Consulting
1179 Santa Clara Ave.
Grand Junction, CO 81503
(970) 242-4454

JMK
& Associates
405 1/2 Fruitwood Dr.
Grand Junction, CO. 81504
(970) 434-5618

Date	10/17/96
Scale	20 scale
Drawn	JMK
Sheet	SP-1



- UTILITY VENDORS**
- G - Public Service Co.-gas service
 - E - Public Service Co.-electric service
 - T - U.S. West-telephone
 - W - Ute Water-domestic water
 - S - City of Grand Junction-sanitary sewer

- LEGEND**
- Fire Hydrant
 - Manhole
 - Sanitary Sewer Line
 - Gas Line
 - Electric Line
 - Water Line
 - Telephone Line
 - ☆ Light Pole
 - 1.7% Drainage Direction and Grade
 - Concrete
 - Asphalt

SITE/GRADING & DRAINAGE PLAN

1.33 Acres - Industrial

All construction and materials shall comply with the City of Grand Junction Specifications and Standard Details. The Contractor shall have a signed copy of the plans and a copy of City of Grand Junction Specifications and Standards on the Job site. Do not change elevations of pavement V-pans of sidewalks without the approval of the design professional.

ACCEPTED FOR CONSTRUCTION FOR ONE YEAR FROM THIS DATE.
Acceptance of these plans does not release the developer, contractor, or the engineer from conformance with City of Grand Junction Standards Specifications for Road and Bridge Construction.

City of Grand Junction Engineering Division Representative Date

"All details, construction, inspection, and testing shall conform to City of Grand Junction Standards Specifications for Road and Bridge Construction. The contractor shall have a copy of the accepted plans and the current City of Grand Junction Standard Specifications for Road and Bridge Construction on-site and available at all times."

11-15-96
ACCEPTED *Bill Nebel*
ANY CHANGE OF SETBACKS MUST BE APPROVED BY THE CITY PLANNING DEPT. IT IS THE APPLICANT'S RESPONSIBILITY TO PROPERLY LOCATE AND IDENTIFY EASEMENTS AND PROPERTY LINES.
SPR-96-230



RECEIVED GRAND JUNCTION
PLANNING DEPARTMENT
NOV 15 1996

SPR-96-230