

Salgado-Fernandez, Nilo E.

From: Salgado-Fernandez, Nilo E.
Sent: Tuesday, January 25, 2011 10:29 AM
To: Metro, Kristal D.
Subject: ADA issue for 6501 Wyoming

Parker Davis Office Condominiums (6501 Wyoming NE): The ADA issue for the wheelchair on this project fronting Wyoming Blvd. has been resolved. During field inspection, the ramp was checked for compliance of ADA and City requirements. The results met the minimum standards.

Attendance for field inspection:
Anthony Lopez
Nilo Salgado-Fernandez

*ok to release perm. co
-Korn*

02-14-11



TRANSMISSION VERIFICATION REPORT

TIME : 12/21/2010 09:32
NAME :
FAX : 9243864
TEL : 5059243979
SER.# : BROL6J570919

DATE, TIME 12/21 09:32
FAX NO./NAME 92428060
DURATION 00:00:24
PAGE(S) 02
RESULT OK
MODE STANDARD
ECM

DRAINAGE AND TRANSPORTATION INFORMATION SHEET
(REV 12/2005)

PROJECT TITLE: Parker Davis Office Condominiums ZONE MAP: E-19/DSA
DRB#: 1000 9162 EPC#: _____ WORK ORDER#: _____

LEGAL DESCRIPTION: _____
CITY ADDRESS: 6501 WYOMING

ENGINEERING FIRM: _____ CONTACT: _____
ADDRESS: _____ PHONE: _____
CITY, STATE: _____ ZIP CODE: _____

OWNER: _____ CONTACT: _____
ADDRESS: _____ PHONE: _____
CITY, STATE: _____ ZIP CODE: _____

ARCHITECT: _____ CONTACT: _____
ADDRESS: _____ PHONE: _____
CITY, STATE: _____ ZIP CODE: _____

SURVEYOR: _____ CONTACT: _____
ADDRESS: _____ PHONE: _____
CITY, STATE: _____ ZIP CODE: _____

CONTRACTOR: _____ CONTACT: _____
ADDRESS: _____ PHONE: _____
CITY, STATE: _____ ZIP CODE: _____

TYPE OF SUBMITTAL:
____ DRAINAGE REPORT
____ DRAINAGE PLAN 1st SUBMITTAL
____ DRAINAGE PLAN RESUBMITTAL
____ CONCEPTUAL G & D PLAN
____ GRADING PLAN
____ EROSION CONTROL PLAN
____ ENGINEER'S CERT (HYDROLOGY)
____ CLOMR/LOMR
____ TRAFFIC CIRCULATION LAYOUT
____ ENGINEER'S CERT (TCL)
☒ ENGINEER'S CERT (DRB SITE PLAN)

CHECK TYPE OF APPROVAL SOUGHT:
____ SLA/FINANCIAL GUARANTEE RELEASE
____ PRELIMINARY PLAT APPROVAL
____ S. DEV. PLAN FOR SUB'D APPROVAL
____ S. DEV. FOR BLDG. PERMIT APPROVAL
____ SECTOR PLAN APPROVAL
____ FINAL PLAT APPROVAL
____ FOUNDATION PERMIT APPROVAL
____ BUILDING PERMIT APPROVAL
☒ CERTIFICATE OF OCCUPANCY (PERM)
____ CERTIFICATE OF OCCUPANCY (TEMP)
____ GRADING PERMIT APPROVAL
____ PAUVING PERMIT APPROVAL

Nilo,

Check

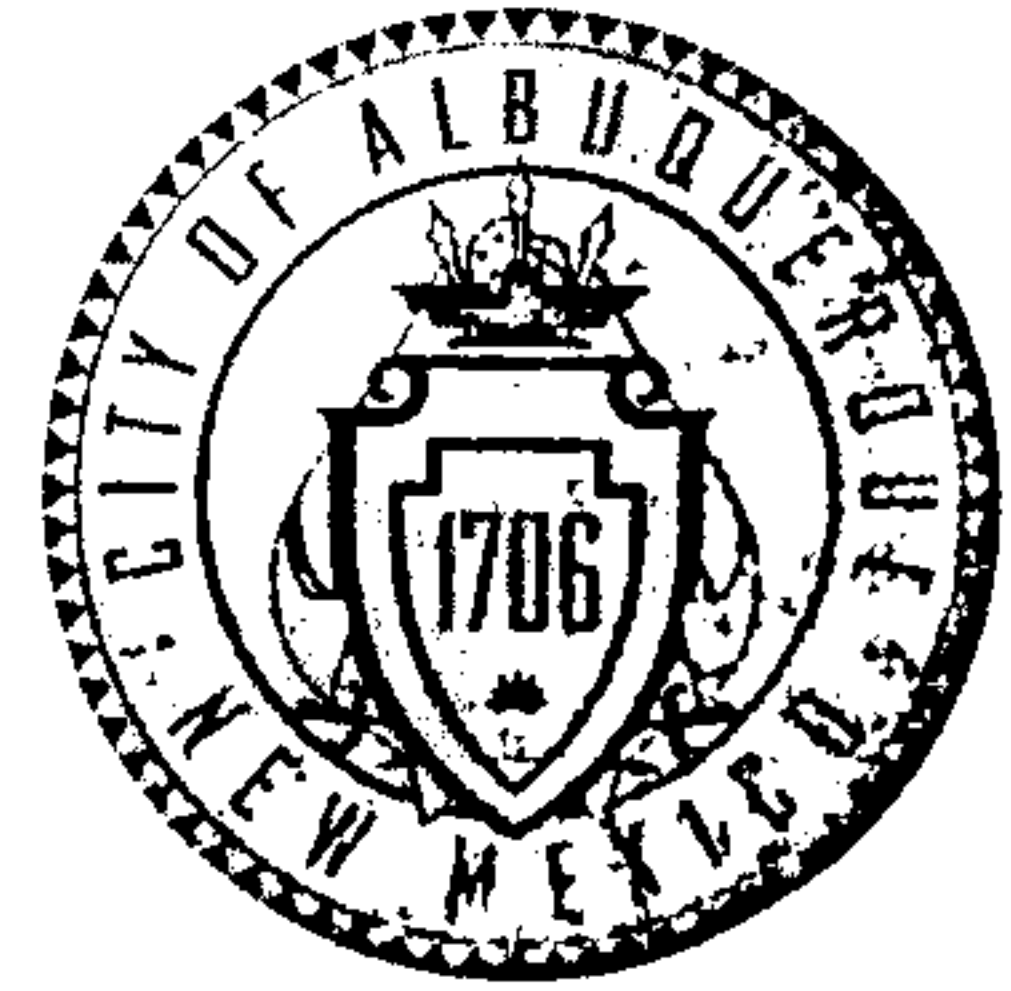
6501 Wyoming NE

(E19-0005A)

- check if fixed

ADA issue

CITY OF ALBUQUERQUE



**Planning Department
Transportation Development Services Section**

July 31, 2008

Paul M. Gladysz, Registered Architect,
BDA Architecture, P.C.
901 Lamberton Place NE
Albuquerque, NM 87107

Re: Approval of Temporary Certificate of Occupancy (C.O.) for
Parker Davis Office Condominiums, [E-19 / D005A]
6501 Wyoming NE
Architect's Stamp Dated 11/02/07

Dear Mr. Gladysz:

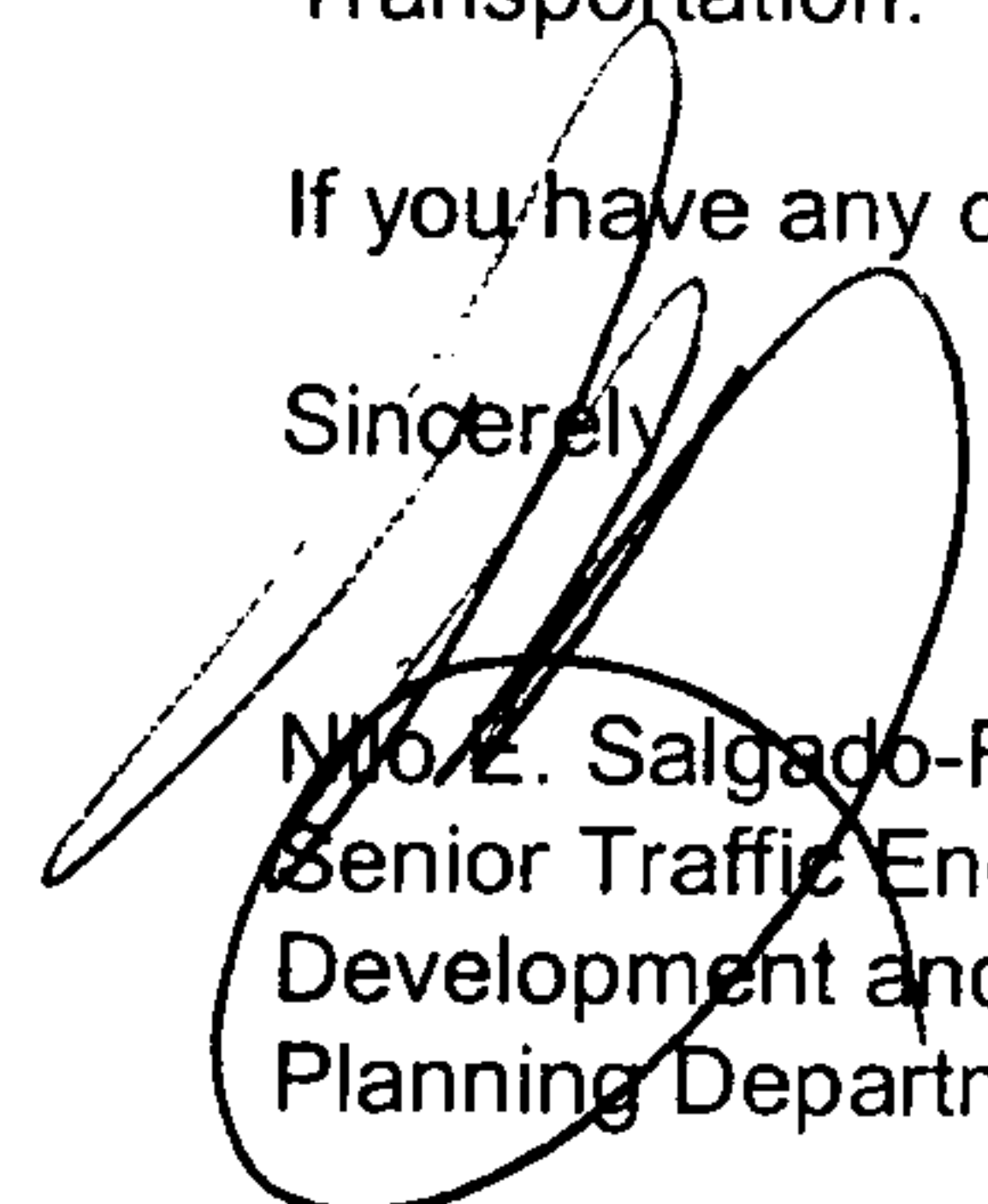
Based on the information provided on your submittal dated July 30, 2008, the above referenced project is approved for a 90-day Temporary C.O.

A Temporary C.O. has been issued allowing the outstanding **entrances (the entrances weren't construct per approved site plan and will need to be re lined on approved plans to show current construction), and wheel ramp off of Wyoming (ramp is not ADA and will need to be ADA design and will need detectable warning surfaces on landing)** issues to be completed within this time period. When these remaining issues have been fully completed, are in substantial compliance, and a final Certification for Transportation has been resubmitted to the City's Hydrology office for approval, a Permanent C.O. will be issued.

The Certification package for Final C.O. must include an **exact** copy of the approved TCL, or signed off D.R.B. Site Plan, which is in each of the two City Permit Plan Sets—the contractor's City field set and the City's plan set in the basement of the Plaza Del Sol building. Package also must include a letter of certification on designer's letterhead-stamped with his seal, signed, and dated. Submit package along with fully completed Drainage Information Sheet to front counter personnel for log in and evaluation by Transportation.

If you have any questions, please call me at 924-3630.

Sincerely,


Nito E. Salgado-Fernandez, P.E.
Senior Traffic Engineer
Development and Building Services
Planning Department

c: Engineer
Hydrology file
CO Clerk

PO Box 1293

Albuquerque

NM 87103

www.cabq.gov

32-200 meters
106 Km E19/P005A
10501
Wyoming
05 Permit
TCO
H.C. Camp
Francis

DRAINAGE AND TRANSPORTATION INFORMATION SHEET

(REV 12/2005)

PROJECT TITLE: PARKER/DAVIS OFFICE CONDOMINIUMS ZONE MAP: E-19/D005A
 DRB#: 1000692 EPC#: _____ WORK ORDER#: _____

LEGAL DESCRIPTION: _____
 CITY ADDRESS: 6501 Wyoming NE

ENGINEERING FIRM: _____ CONTACT: _____
 ADDRESS: _____ PHONE: _____
 CITY, STATE: _____ ZIP CODE: _____

OWNER: PARKER/DAVIS, LLC CONTACT: ~~782-7222~~ 401-3541
 ADDRESS: 8409 Potaluma NE PHONE: Christian Parker
 CITY, STATE: Albuquerque, NM 87122 ZIP CODE: _____

ARCHITECT: BDA ARCHITECTURE CONTACT: Paul Gladys
 ADDRESS: _____ PHONE: 858-0180
 CITY, STATE: _____ ZIP CODE: _____

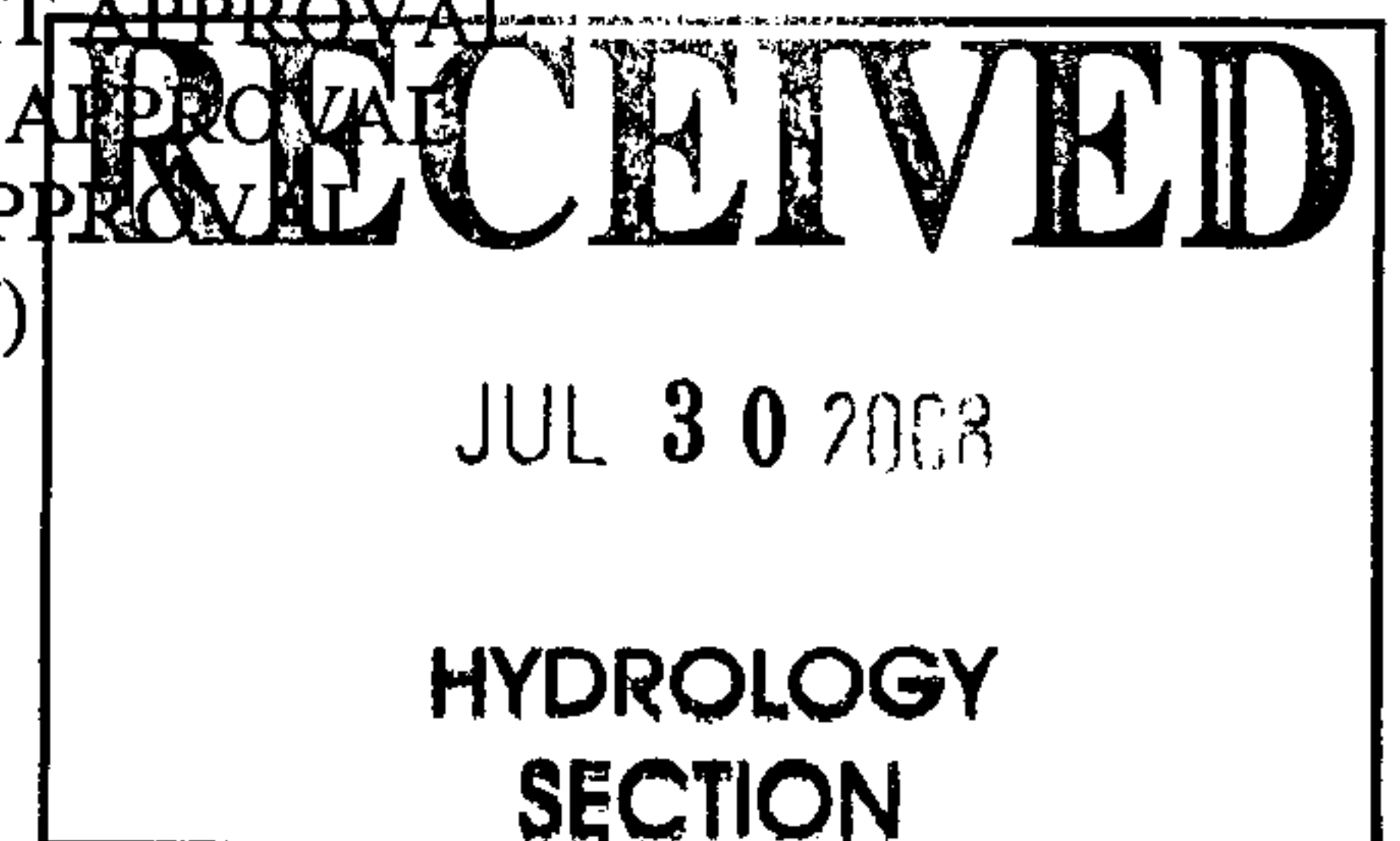
SURVEYOR: _____ CONTACT: _____
 ADDRESS: _____ PHONE: _____
 CITY, STATE: _____ ZIP CODE: _____

CONTRACTOR: _____ CONTACT: _____
 ADDRESS: _____ PHONE: _____
 CITY, STATE: _____ ZIP CODE: _____

TYPE OF SUBMITTAL:
☐ DRAINAGE REPORT
☐ DRAINAGE PLAN 1st SUBMITTAL
☐ DRAINAGE PLAN RESUBMITTAL
☐ CONCEPTUAL G & D PLAN
☐ GRADING PLAN
☐ EROSION CONTROL PLAN
☐ ENGINEER'S CERT (HYDROLOGY)
☐ CLOMR/LOMR
☐ TRAFFIC CIRCULATION LAYOUT
☐ ENGINEER'S CERT (TCL)
☒ ENGINEER'S CERT (DRB SITE PLAN)
☐ OTHER (SPECIFY) _____

CHECK TYPE OF APPROVAL SOUGHT:
☐ SIA/FINANCIAL GUARANTEE RELEASE
☐ PRELIMINARY PLAT APPROVAL
☐ S. DEV. PLAN FOR SUB'D APPROVAL
☐ S. DEV. FOR BLDG. PERMIT APPROVAL
☐ SECTOR PLAN APPROVAL
☐ FINAL PLAT APPROVAL
☐ FOUNDATION PERMIT APPROVAL
☐ BUILDING PERMIT APPROVAL
☒ CERTIFICATE OF OCCUPANCY (PERM)
☐ CERTIFICATE OF OCCUPANCY (TEMP)
☐ GRADING PERMIT APPROVAL
☐ PAVING PERMIT APPROVAL
☐ WORK ORDER APPROVAL
☐ OTHER (SPECIFY) _____

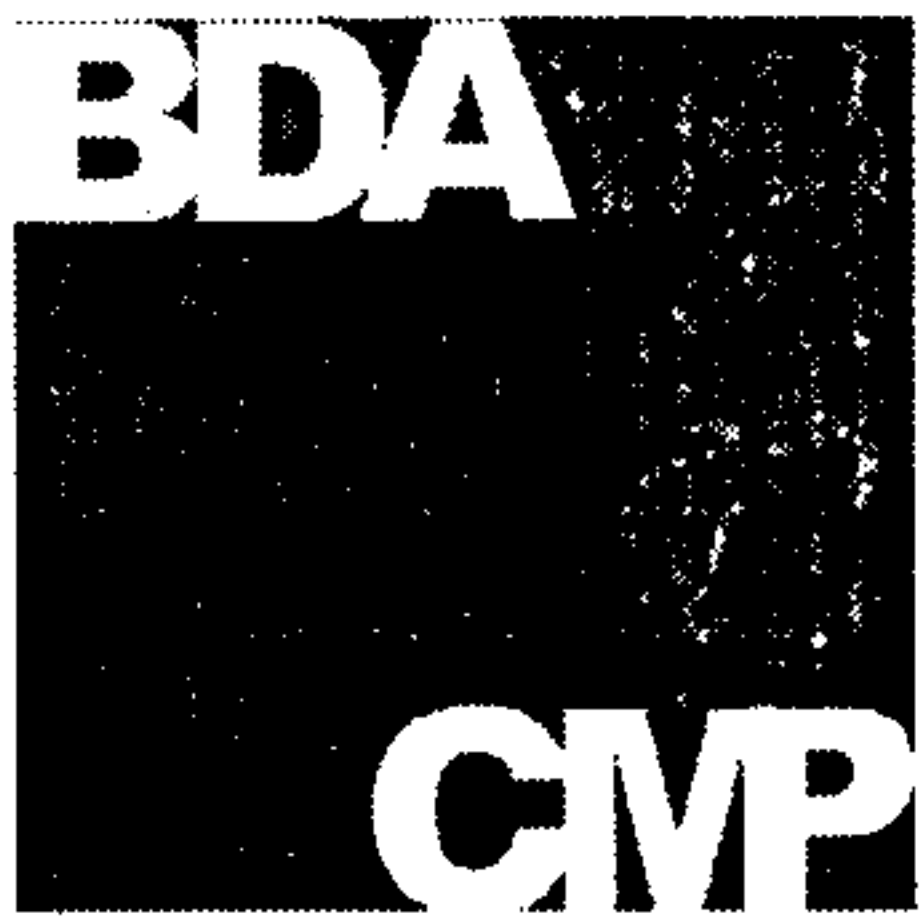
WAS A PRE-DESIGN CONFERENCE ATTENDED:
☐ YES
☐ NO
☐ COPY PROVIDED



DATE SUBMITTED: 7/30/08 BY: _____

Requests for approvals of Site Development Plans and/or Subdivision Plats shall be accompanied by a drainage submittal. The particular nature, location, and scope to the proposed development defines the degree of drainage detail. One or more of the following levels of submittal may be required based on the following:

1. **Conceptual Grading and Drainage Plan:** Required for approval of Site Development Plans greater than five (5) acres and Sector Plans.
2. **Drainage Plans:** Required for building permits, grading permits, paving permits and site plans less than five (5) acres.
3. **Drainage Report:** Required for subdivision containing more than ten (10) lots or constituting five (5) acres or more.



Re: Parker Davis Office Condominiums
6501 Wyoming NE, Albuquerque, NM
Case # DRB - 1000692

TLC CERTIFICATION

November 2, 2007

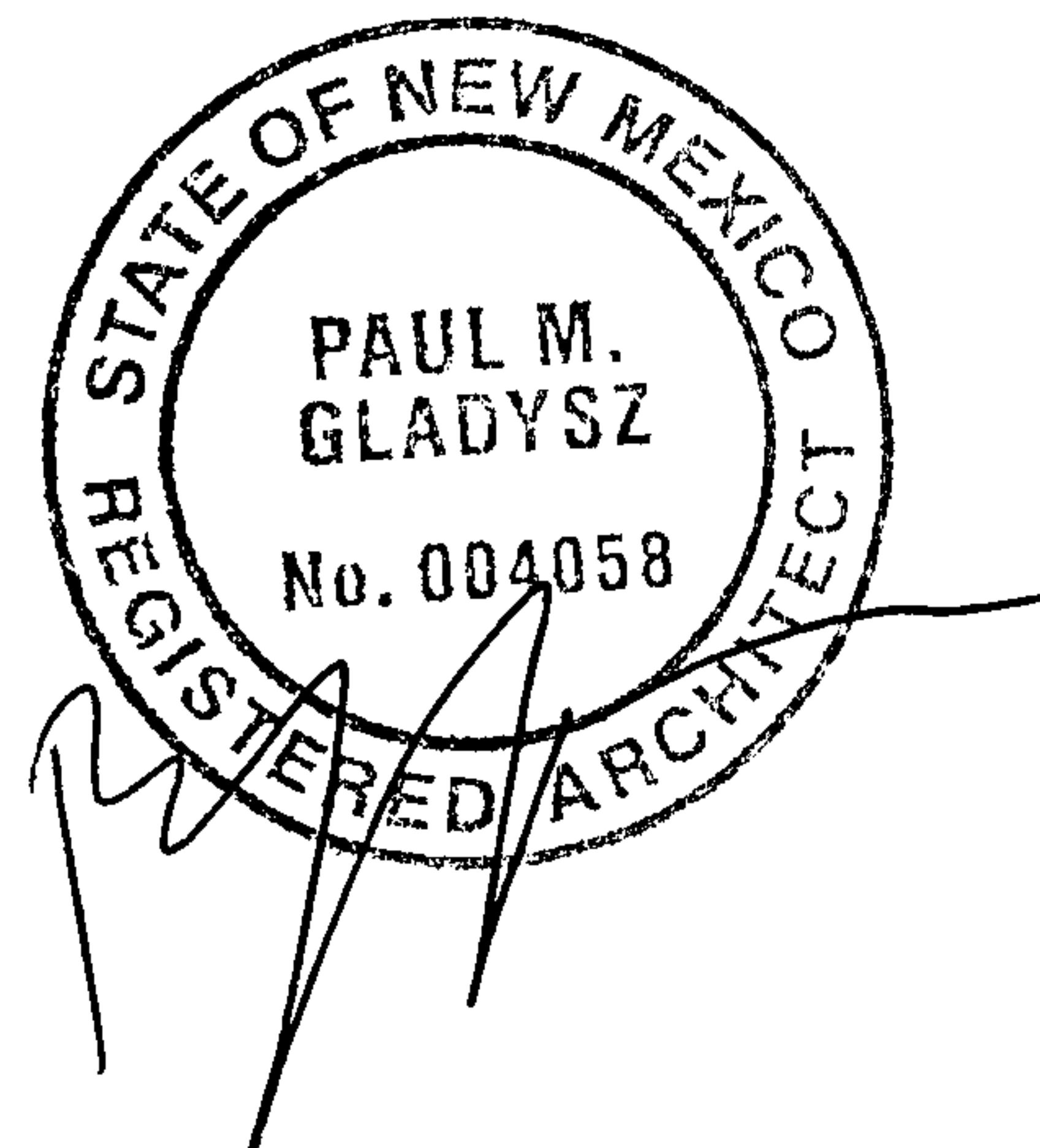
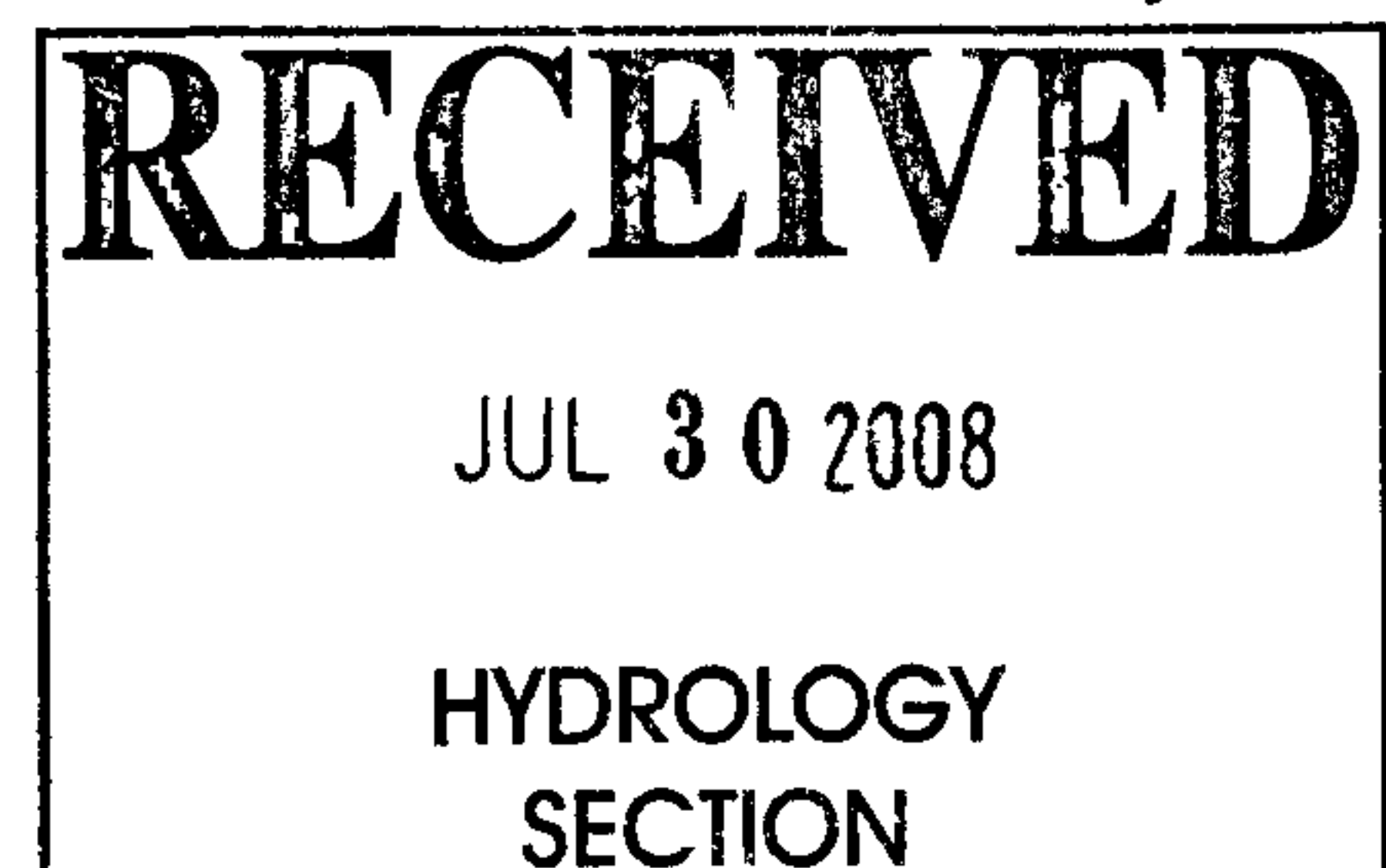
To Whom It May Concern:

I, Paul Gladysz, NM Registration #004058, of the firm BDA Architecture, PC hereby certify that the subject portion of this project has been constructed in substantial compliance with and in accordance with the design intent of the approved plan dated 05/10/05. The record information edited onto the original design document has been obtained by Paul Gladysz #004058, of the firm BDA Architecture. I further certify that I have determined by visual inspection that the provided data is representative of actual site conditions and is true and correct to the best of my knowledge and belief. This certification is submitted in support of a request for a Certificate of Occupancy.

The record information presented hereon is not necessarily complete and intended only to verify substantial compliance of the Traffic Circulation Layout aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose.

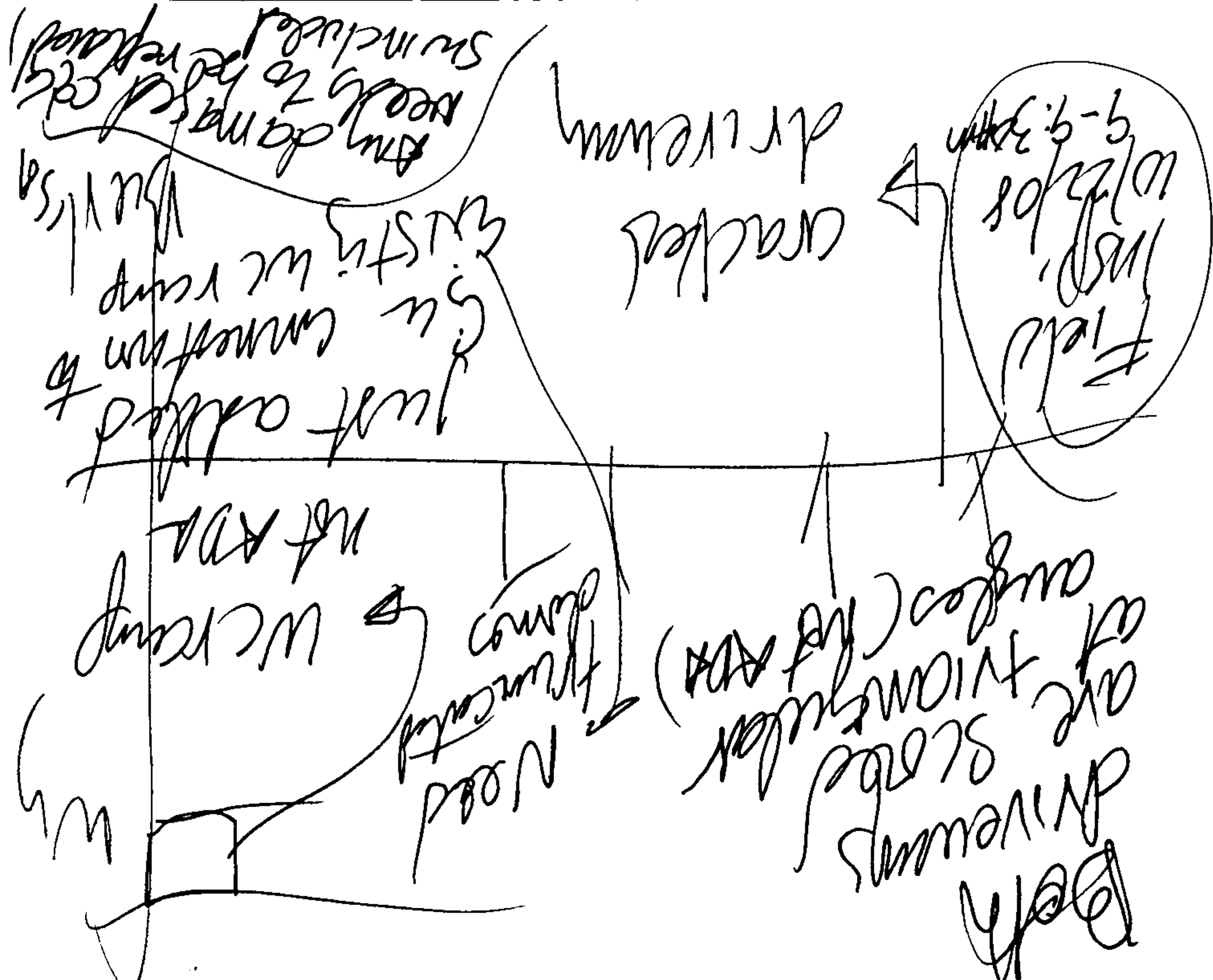
Sincerely,

Paul Gladysz, AIA, CSI, ICC
NM #004058



BDA Architecture, P.C.
901 Lamberton Place NE
Albuquerque, NM 87107

(505) 858-0180
(505) 858-0111 - Fax
info@bdaarc.com



Ed Fogelman
 6501 Wyoming
 265-0900

- ① PE - RA
- ② 8:00



The Rio Grande River

Site Highlights:

[Employee Events](#)

[Employee News](#)

[Check Your Leave Balance](#)

[Administrative Instructions](#)

[City Insurance Benefits](#)

[Jobs for City Employees](#)

[Employee Training](#)

[Computer Tips](#)

[Notes Tips](#)

[Change Active Directory Password](#)

New Numbers Required to Fuel City Vehicles

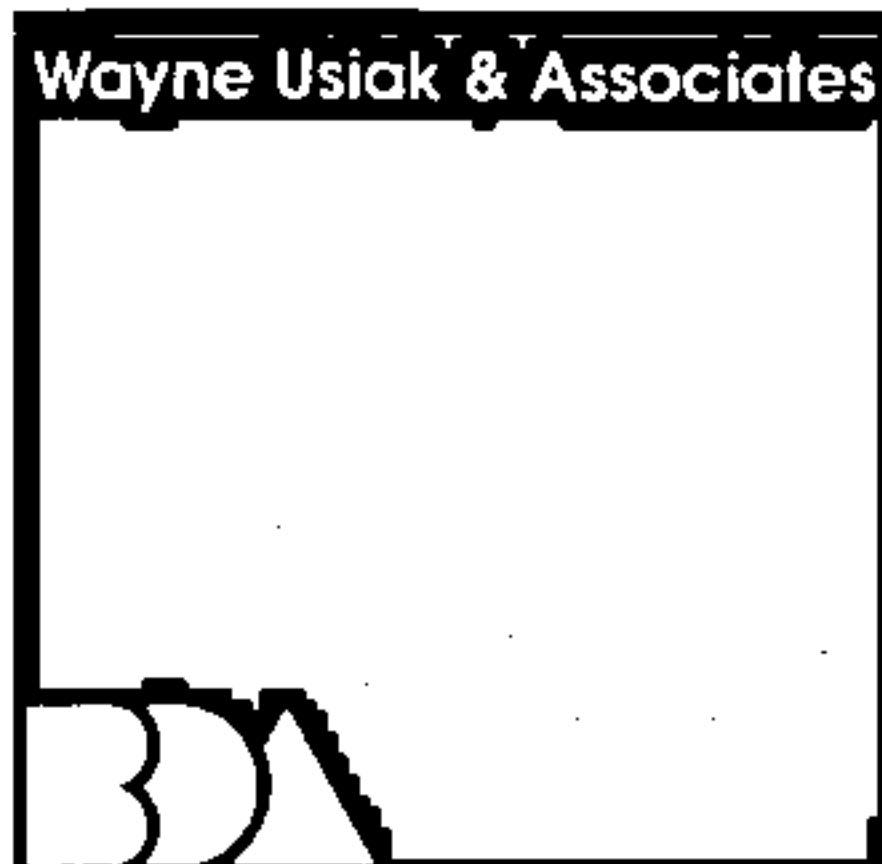
Publish Date: 12/26/2006

The City is moving away from using individual Social Security numbers. Effective immediately, new numbers have been issued for fueling vehicles.

Your new fueling number is your four digit birth year followed by your three, four or five digit employee number. For example,

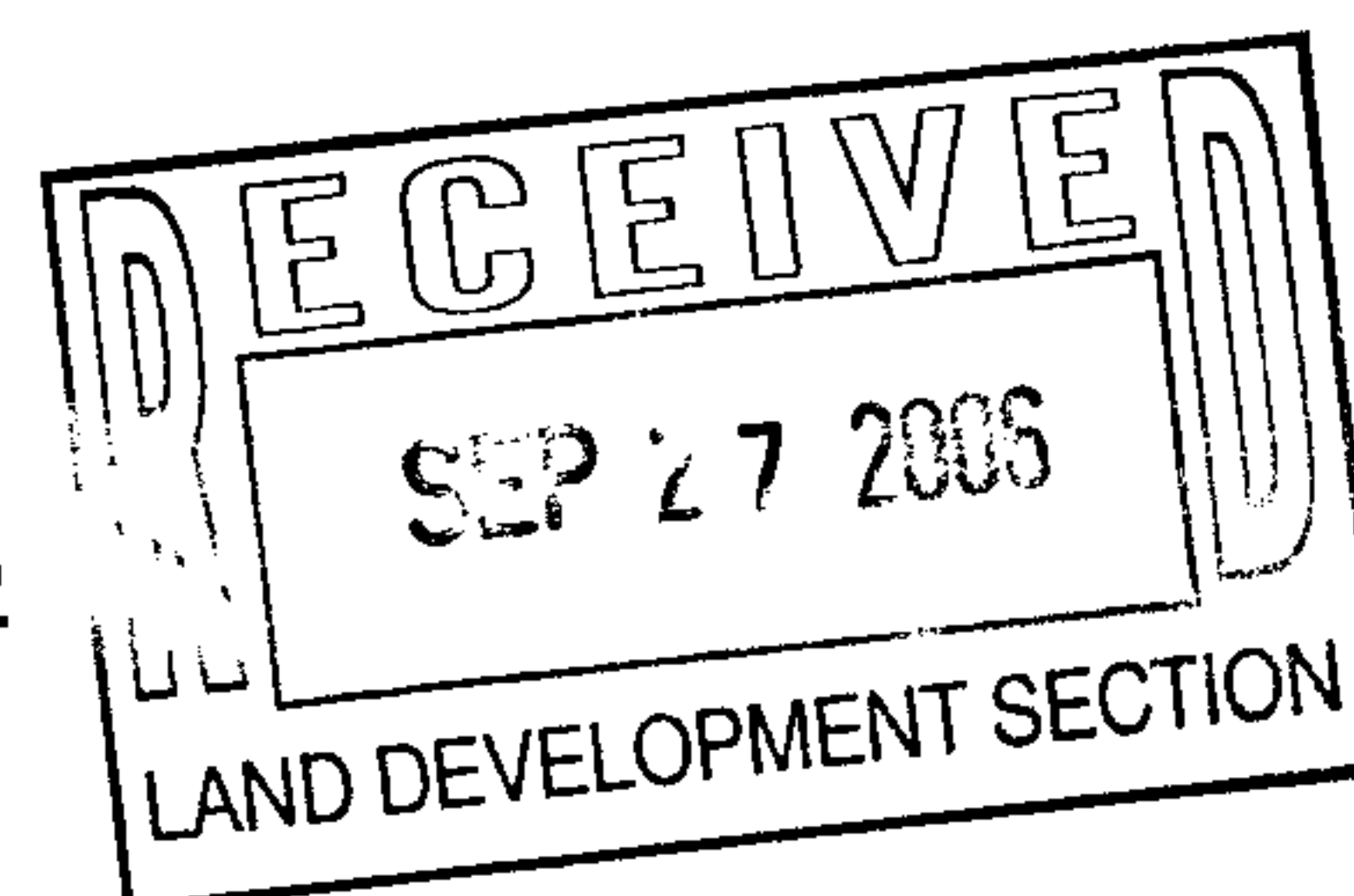
If your Birth Year Is	And If your Employee Number Is	Then your New Fuel Number Is:
1966	000000376	1966376
1952	000006578	19526578
1982	000012554	198212554

Contact: Stephen R. Chavez
768-2925



Post-it® Fax Note	7671	Date 9/21/06	# of pages 1
To	Milo Salgado-Fernandez	From	PAUL GLADYSZ
Co./Dept.		Co.	BDA ARCHITECTURE
Phone #		Phone #	858-0180
Fax #	924-3864	Fax #	858-0111

Re: Parker Davis Office Condominiums
6501 Wyoming NE, Albuquerque, NM
Case # DRB – 1000692



TLC CERTIFICATION (Buildings D, H, J only)

21 September 2006

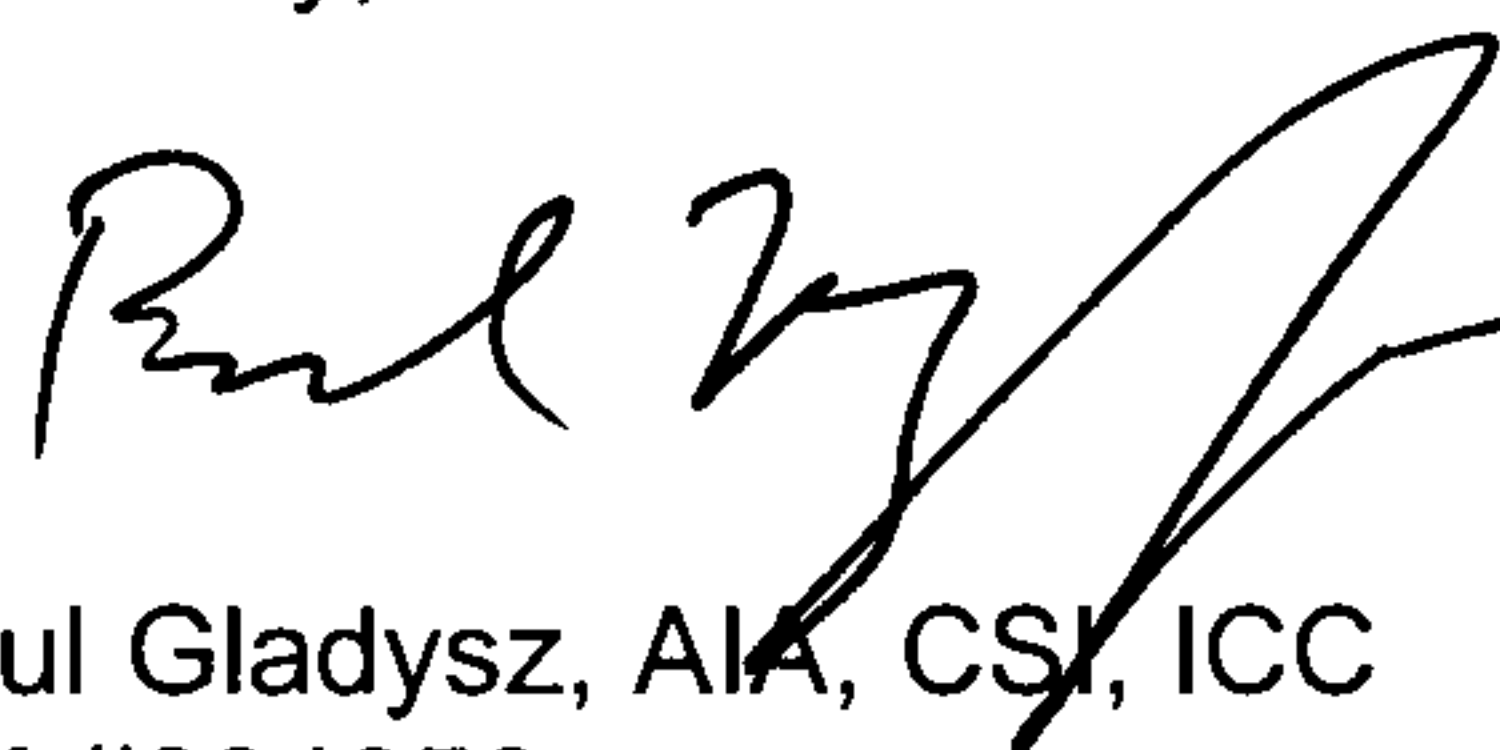
To Whom It May Concern:

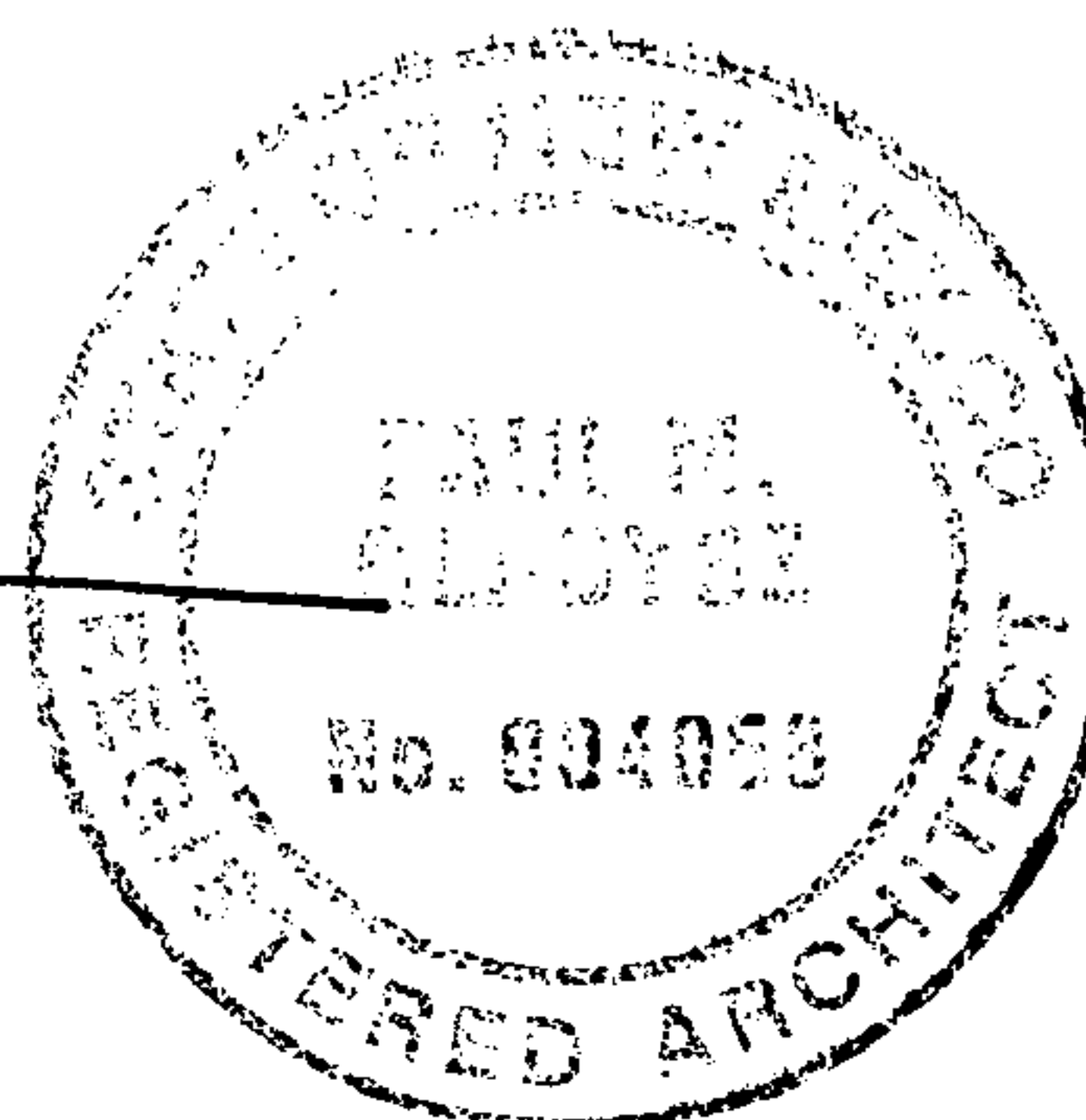
I, Paul Gladysz, NM Registration #004058, of the firm BDA Architecture, PC hereby certify that the subject portion of this project has been constructed in substantial compliance with and in accordance with the design intent of the approved plan dated 05/10/05. The record information edited onto the original design document has been obtained by Paul Gladysz #004058, of the firm BDA Architecture. I further certify that I have determined by visual inspection that the provided data is representative of actual site conditions and is true and correct to the best of my knowledge and belief (exception listed below). This certification is submitted in support of a request for a Certificate of Occupancy.

Exception: None noted.

The record information presented hereon is not necessarily complete and intended only to verify substantial compliance of the Traffic Circulation Layout aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose.

Sincerely,


Paul Gladysz, AIA, CSI, ICC
NM #004058



BDA Architecture, P.C.
901 Lamberton Place NE
Albuquerque, NM 87107

Tel 505.858.0180
Fax 505.858.0111
info@bdaarc.com

DRAINAGE AND TRANSPORTATION INFORMATION SHEET

(Rev. 12/05)

PROJECT TITLE: Wyoming Office Dev. - Bldgs D, H, J ZONE MAP/DRG. FILE # E-19 / D5A
 DRB#: 1060 692 EPC#: _____ WORK ORDER#: _____

LEGAL DESCRIPTION: Parker / Divis office Condominiums
 CITY ADDRESS: 6501 Wyoming NE

ENGINEERING FIRM: _____
 ADDRESS: _____
 CITY, STATE: _____

CONTACT: _____
 PHONE: _____
 ZIP CODE: _____

OWNER: _____
 ADDRESS: _____
 CITY, STATE: _____

CONTACT: _____
 PHONE: _____
 ZIP CODE: _____

ARCHITECT: BDA Architecture
 ADDRESS: 901 Lambertson Place NE
 CITY, STATE: Albuquerque, NM 87107

CONTACT: Paul Gladysz
 PHONE: 858-0180
 ZIP CODE: 87107

SURVEYOR: _____
 ADDRESS: _____
 CITY, STATE: _____

CONTACT: _____
 PHONE: _____
 ZIP CODE: _____

CONTRACTOR: SivAD Enterprises
 ADDRESS: 8409 Petaluma
 CITY, STATE: Albuquerque, NM 87122

CONTACT: _____
 PHONE: _____
 ZIP CODE: _____

TYPE OF SUBMITTAL:

- ☐ DRAINAGE REPORT
- ☐ DRAINAGE PLAN 1st SUBMITTAL
- ☐ DRAINAGE PLAN RESUBMITTAL
- ☐ CONCEPTUAL G & D PLAN
- ☐ GRADING PLAN
- ☐ EROSION CONTROL PLAN
- ☐ ENGINEER'S CERT (HYDROLOGY)
- ☐ CLOMR/LOMR
- ☒ TRAFFIC CIRCULATION LAYOUT
- ☐ ENGINEER/ARCHITECT CERT (TCL)
- ☐ ENGINEER/ARCHITECT CERT (DRB S.P.)
- ☐ ENGINEER/ARCHITECT CERT (AA)
- ☐ OTHER (SPECIFY) _____

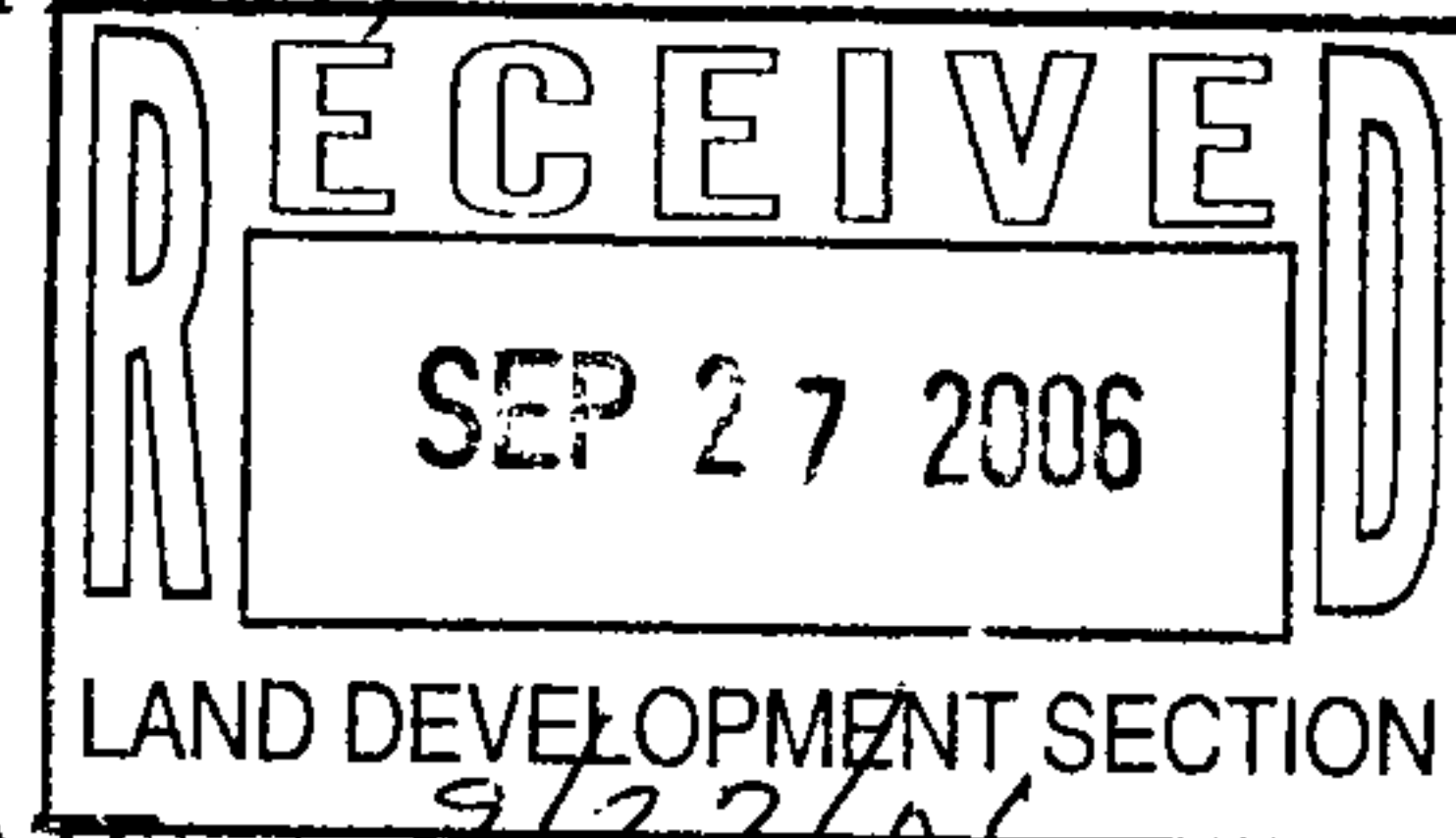
CHECK TYPE OF APPROVAL SOUGHT:

- ☐ SIA/FINANCIAL GUARANTEE RELEASE
- ☐ PRELIMINARY PLAT APPROVAL
- ☐ S. DEV. PLAN FOR SUB'D APPROVAL
- ☐ S. DEV. FOR BLDG. PERMIT APPROVAL
- ☐ SECTOR PLAN APPROVAL
- ☐ FINAL PLAT APPROVAL
- ☐ FOUNDATION PERMIT APPROVAL
- ☐ BUILDING PERMIT APPROVAL
- ☒ CERTIFICATE OF OCCUPANCY (PERM)
- ☐ CERTIFICATE OF OCCUPANCY (TEMP)
- ☐ GRADING PERMIT APPROVAL
- ☐ PAVING PERMIT APPROVAL
- ☐ WORK ORDER APPROVAL
- ☐ OTHER (SPECIFY) _____

WAS A PRE-DESIGN CONFERENCE ATTENDED:

- ☐ YES
- ☐ NO
- ☐ COPY PROVIDED

SUBMITTED BY: Christian Parker DATE: 9/27/06



Requests for approvals of Site Development Plans and/or Subdivision Plats shall be accompanied by a drainage submittal. The particular nature, location and scope to the proposed development define the degree of drainage detail. One or more of the following levels of submittal may be required based on the following:

1. **Conceptual Grading and Drainage Plan:** Required for approval of Site Development Plans greater than five (5) acres and Sector Plans.
2. **Drainage Plans:** Required for building permits, grading permits, paving permits and site plans less than five (5) acres.
3. **Drainage Report:** Required for subdivision containing more than ten (10) lots or constituting five (5) acres or more.

CITY OF ALBUQUERQUE



**Planning Department
Transportation Development Services Section**

September 29, 2006

Paul Gladysz, Registered Architect
901 Lamberton Place NE
Albuquerque, NM 87107

Re: Certification Submittal for Final Building Certificate of Occupancy for
Parker Davis Office Cond.'s(Bldg's D,H,& J), [E-19 / D5A]
6501 Wyoming NE
Architect's Stamp Dated 09/21/06

Dear Mr. Gladysz:

The TCL / Letter of Certification submitted on September 27, 2006 is sufficient for acceptance by this office for final Certificate of Occupancy (C.O.). Notification has been made to the Building and Safety Section.

Sincerely,

Nilo E. Salgado-Fernandez, P.E.
Senior Traffic Engineer
Development and Building Services
Planning Department

c: Engineer
Hydrology file
CO Clerk

P.O. Box 1293

Albuquerque

New Mexico 87103

www.cabq.gov

CITY OF ALBUQUERQUE



**Planning Department
Transportation Development Services Section**

June 30, 2006

Wayne Usiak, Registered Architect,
BDA Architecture P.C.
901 Lamberton Place NE
Albuquerque, NM 87107

Re: Approval of Temporary Certificate of Occupancy (C.O.) for
Wyoming Office (Bldg J), [E-19 / D5A]
6501 Wyoming Blvd NE
Architect's Stamp Dated 06/27/06

Dear Mr. Usiak:

Based on the information provided on your submittal dated June 29, 2006, the above referenced project is approved for a 30-day Temporary C.O.

A Temporary C.O. has been issued allowing the outstanding H.C. ramp issue to be completed within this time period. When these remaining issues have been fully completed, are in substantial compliance, and a final Certification for Transportation has been resubmitted to the City's Hydrology office for approval, a Permanent C.O. will be issued.

The Certification package for Final C.O. must include an exact copy of the approved TCL, or signed off D.R.B. Site Plan, which is in each of the two City Permit Plan Sets—the contractor's City field set and the City's plan set in the basement of the Plaza Del Sol building. Package also must include a letter of certification on designer's letterhead-stamped with his seal, signed, and dated. Submit package along with fully completed Drainage Information Sheet to front counter personnel for log in and evaluation by Transportation.

If you have any questions, please call me at 924-3630.

Sincerely,

Milo E. Salgado-Fernandez, P.E.
Senior Traffic Engineer
Development and Building Services
Planning Department

c: Engineer
Hydrology file
CO Clerk

P.O. Box 1293

Albuquerque

New Mexico 87103

www.cabq.gov

CITY OF ALBUQUERQUE



**Planning Department
Transportation Development Services Section**

May 30, 2006

Paul M. Gladysz, Registered Architect
BDA Architecture, P.C.
901 Lamberton Place NE
Albuquerque, NM 87107

Re: Approval of Temporary Certificate of Occupancy (C.O.) for
Burleson/Wyoming Office Development, Bldg H, [E-19 / D5A]
6501 Wyoming Blvd NE
Architect's Stamp Dated 05/23/06

Dear Mr. Gladysz:

Based on the information provided on your submittal dated May 30, 2006, the above referenced project is approved for a 30-day Temporary C.O.

A Temporary C.O. has been issued allowing the outstanding H.C. ramp issues to be completed within this time period. When these remaining issues have been fully completed, are in substantial compliance, and a final Certification for Transportation has been resubmitted to the City's Hydrology office for approval, a Permanent C.O. will be issued.

The Certification package for Final C.O. must include an exact copy of the approved TCL, or signed off D.R.B. Site Plan, which is in each of the two City Permit Plan Sets—the contractor's City field set and the City's plan set in the basement of the Plaza Del Sol building. Package also must include a letter of certification on designer's letterhead-stamped with his seal, signed, and dated. Submit package along with fully completed Drainage Information Sheet to front counter personnel for log in and evaluation by Transportation.

If you have any questions, please call me at 924-3630.

Sincerely,

Nilo E. Salgado-Fernandez, P.E.
Senior Traffic Engineer
Development and Building Services
Planning Department

c: Engineer
Hydrology file
CO Clerk

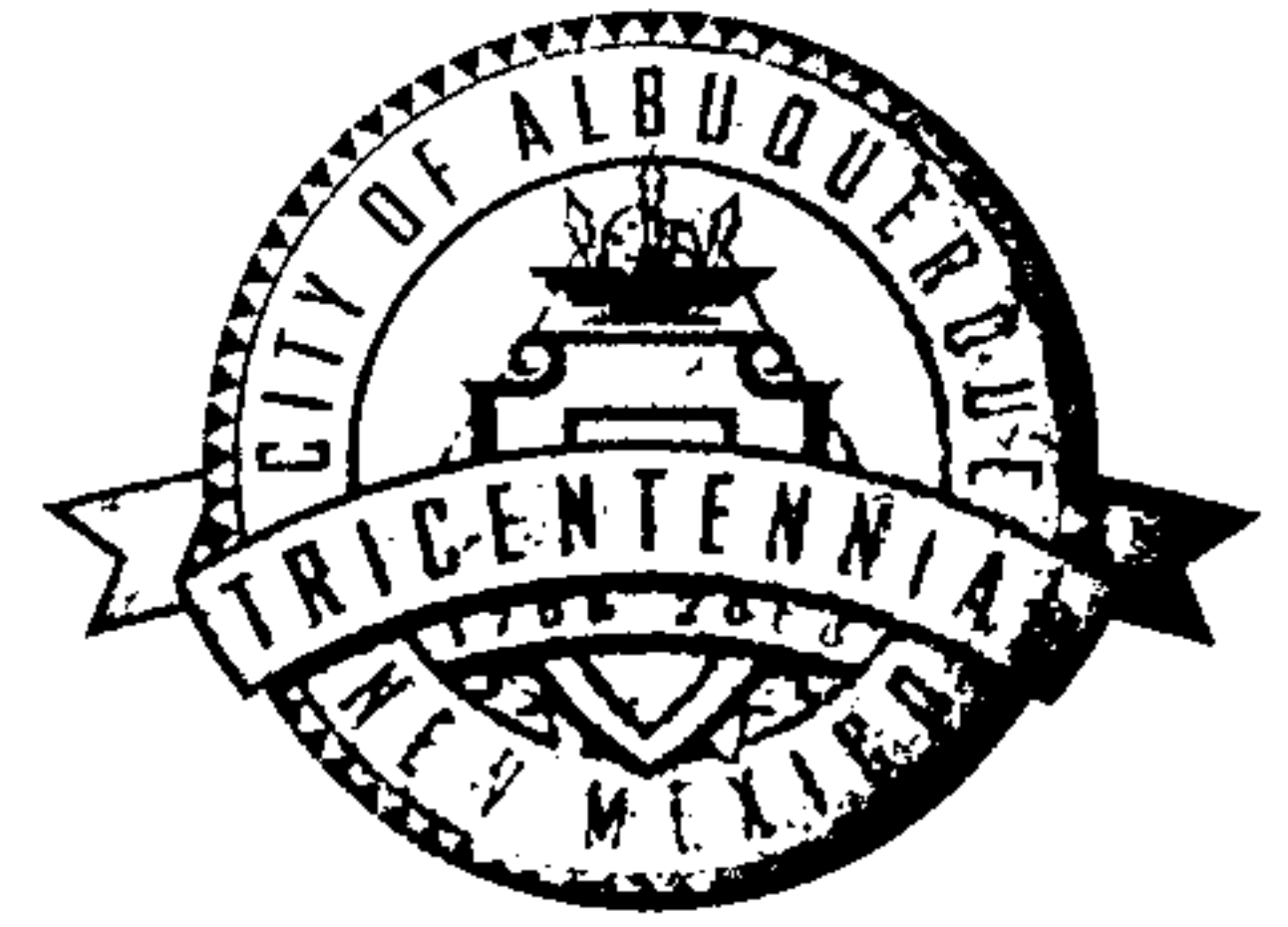
P.O. Box 1293

Albuquerque

New Mexico 87103

www.cabq.gov

CITY OF ALBUQUERQUE



**Planning Department
Transportation Development Services Section**

December 6, 2006

Paul M. Gladysz, Registered Architect
901 Lamberton Place NE
Albuquerque, NM 87107

Re: Certification Submittal for Final Building Certificate of Occupancy for
Wyoming Office Bldg A, [E-19 / D5A]
6501 Wyoming NE
Architect's Stamp Dated 12/01/06

Dear Mr. Gladysz:

The TCL / Letter of Certification submitted on December 4, 2006 is sufficient for acceptance by this office for final Certificate of Occupancy (C.O.). Notification has been made to the Building and Safety Section.

Sincerely,

Nilo E. Salgado-Fernandez, P.E.
Senior Traffic Engineer
Development and Building Services
Planning Department

c: Engineer
Hydrology file
CO Clerk

P.O. Box 1293

Albuquerque

New Mexico 87103

www.cabq.gov

CITY OF ALBUQUERQUE



**Planning Department
Transportation Development Services Section**

July 10, 2006

Wayne Usiak, Registered Architect,
BDA Architecture, P.C.
901 Lamberton Place NE
Albuquerque, NM 87107

Re: Approval of Temporary Certificate of Occupancy (C.O.) for
Wyoming Office Bldg H, [E-19 / D5A]
6501 Wyoming NE
Architect's Stamp Dated 07/07/06

Dear Mr. Usiak:

Based on the information provided on your submittal dated July 7, 2006, the above referenced project is approved for a 30-day Temporary C.O extension.

A Temporary C.O. has been issued allowing the outstanding issues to be completed within this time period. When these remaining issues have been fully completed, are in substantial compliance, and a final Certification for Transportation has been resubmitted to the City's Hydrology office for approval, a Permanent C.O. will be issued.

The Certification package for Final C.O. must include an exact copy of the approved TCL, or signed off D.R.B. Site Plan, which is in each of the two City Permit Plan Sets—the contractor's City field set and the City's plan set in the basement of the Plaza Del Sol building. Package also must include a letter of certification on designer's letterhead-stamped with his seal, signed, and dated. Submit package along with fully completed Drainage Information Sheet to front counter personnel for log in and evaluation by Transportation.

If you have any questions, please call me at 924-3630.

Sincerely,

Nilo E. Salgado-Fernandez, P.E.
Senior Traffic Engineer
Development and Building Services
Planning Department

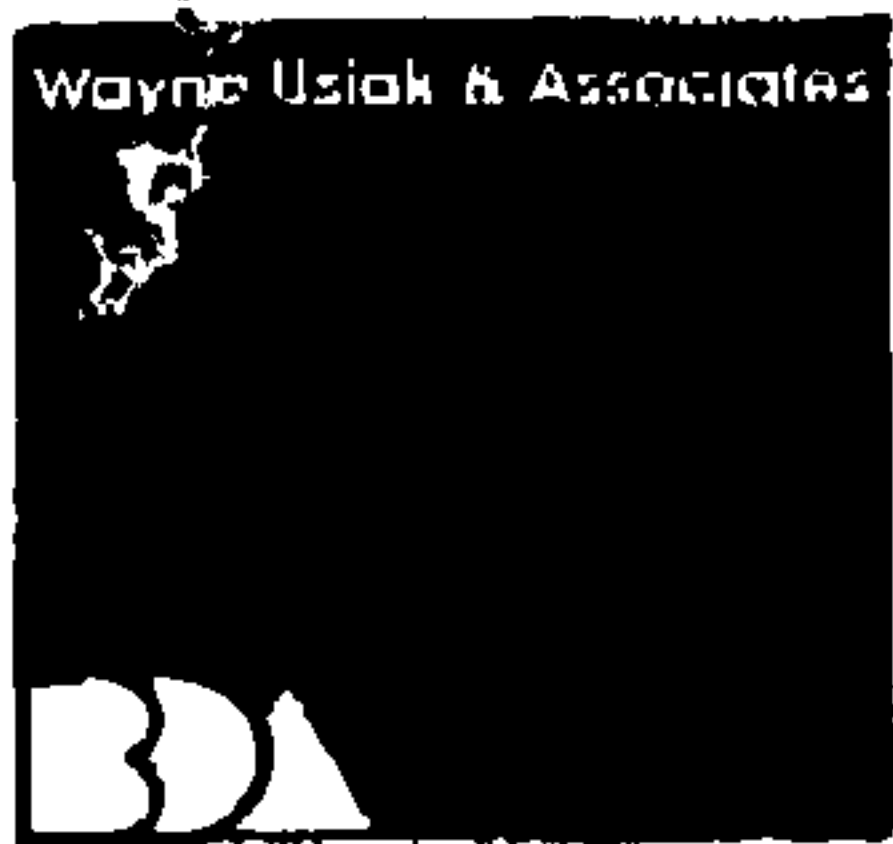
c: Engineer
Hydrology file
CO Clerk

P.O. Box 1293

Albuquerque

New Mexico 87103

www.cabq.gov



Post-It® Fax Note	7671	Date	7/10/06	# of pages	1
To	Bradley Bingham	From	Wayne Usiak		
Co./Dept.	Hydrology	Co.	BDA Architecture		
Phone #		Phone #	858-0180		
Fax #	924-3864	Fax #	858-0111		

Wyoming Office Development, Bldg H
Re: Parker Davis Office Condominiums
6501 Wyoming NE, Albuquerque, NM
Case # DRB - 1000692

E-19/D5A

Per the Owner's request asking for a 30 day extension of the Temporary Certification of Occupancy for the referenced project:
TLC CERTIFICATION (Building H only)

07 July 2006

To Whom it May Concern:

I, Wayne Usiak, NM Registration #1787, of the firm BDA Architecture, PC hereby certify that the subject portion of this project has been constructed in substantial compliance with and in accordance with the design intent of the approved plan dated 05/10/05. The record information edited onto the original design document has been obtained by Wayne Usiak #1787, of the firm BDA Architecture. I further certify that I have determined by visual inspection that the provided data is representative of actual site conditions and is true and correct to the best of my knowledge and belief (exception listed below). This certification is submitted in support of a request for a Temporary Certificate of Occupancy. Certification for the final Certification of Occupancy will be conditioned on the proper completion of the listed exceptions, and correction of any other discrepancy that may become known to me.

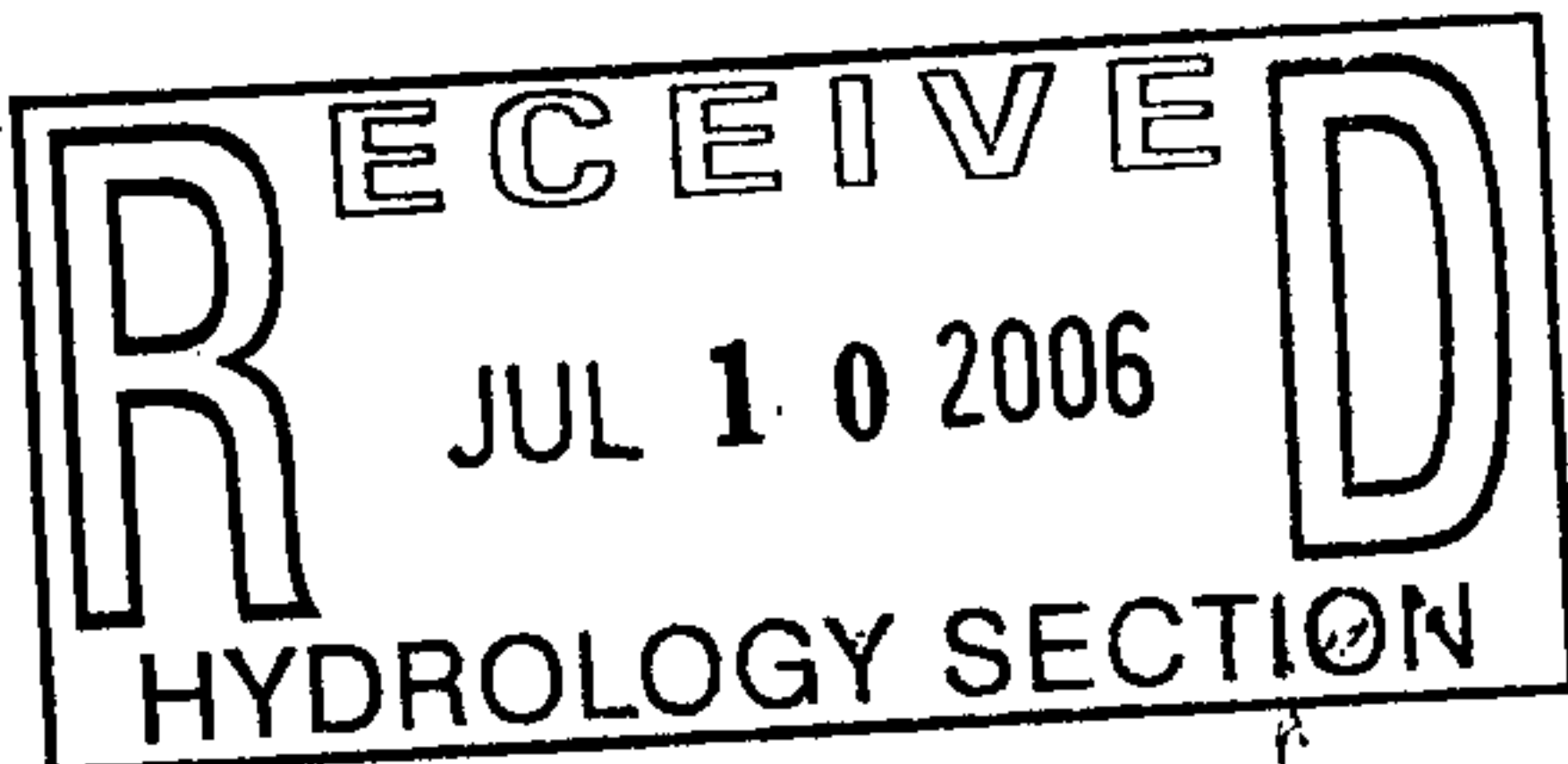
Exception: 1. Wheelchair access ramps are to be reconstructed as so to be in compliance with the details shown on the approved plans.

The record information presented hereon is not necessarily complete and intended only to verify substantial compliance of the Traffic Circulation Layout aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose.

Sincerely,

A handwritten signature in black ink, appearing to be "W" followed by a stylized flourish.

Wayne Usiak, AIA, NCARB
NM #1787



DRAINAGE AND TRANSPORTATION INFORMATION SHEET

(Rev. 12/05)

PROJECT TITLE: Wyoming Office Dev., Bldg. A
6501 Wyoming NE Bldg. A ZONE MAP/DRG. FILE # E-19/D5A
DRB#: DRB-1000652 EPC#: _____ WORK ORDER#: _____

LEGAL DESCRIPTION: PARKER/DAVIS Office Condominiums
CITY ADDRESS: 6501 Wyoming NE 87109

ENGINEERING FIRM: _____
ADDRESS: _____
CITY, STATE: _____

CONTACT: _____
PHONE: _____
ZIP CODE: _____

OWNER: Parker/Davis LLC
ADDRESS: 8409 Metropolitan
CITY, STATE: Albuquerque, NM

CONTACT: Christopher Parker
PHONE: 505 3541
ZIP CODE: 87122

ARCHITECT: BDA Architecture PC
ADDRESS: 901 Lamberton Pl NE
CITY, STATE: Albuquerque, NM

CONTACT: Paul Gladys
PHONE: 505 0180
ZIP CODE: 87107

SURVEYOR: _____
ADDRESS: _____
CITY, STATE: _____

CONTACT: _____
PHONE: _____
ZIP CODE: _____

CONTRACTOR: _____
ADDRESS: _____
CITY, STATE: _____

CONTACT: _____
PHONE: _____
ZIP CODE: _____

TYPE OF SUBMITTAL:

- ☐ DRAINAGE REPORT
☐ DRAINAGE PLAN 1st SUBMITTAL
☐ DRAINAGE PLAN RESUBMITTAL
☐ CONCEPTUAL G & D PLAN
☐ GRADING PLAN
☐ EROSION CONTROL PLAN
☐ ENGINEER'S CERT (HYDROLOGY)
☐ CLOMR/LOMR
☒ TRAFFIC CIRCULATION LAYOUT
☐ ENGINEER/ARCHITECT CERT (TCL)
☐ ENGINEER/ARCHITECT CERT (DRB S.P.)
☐ ENGINEER/ARCHITECT CERT (AA)
☐ OTHER (SPECIFY) _____

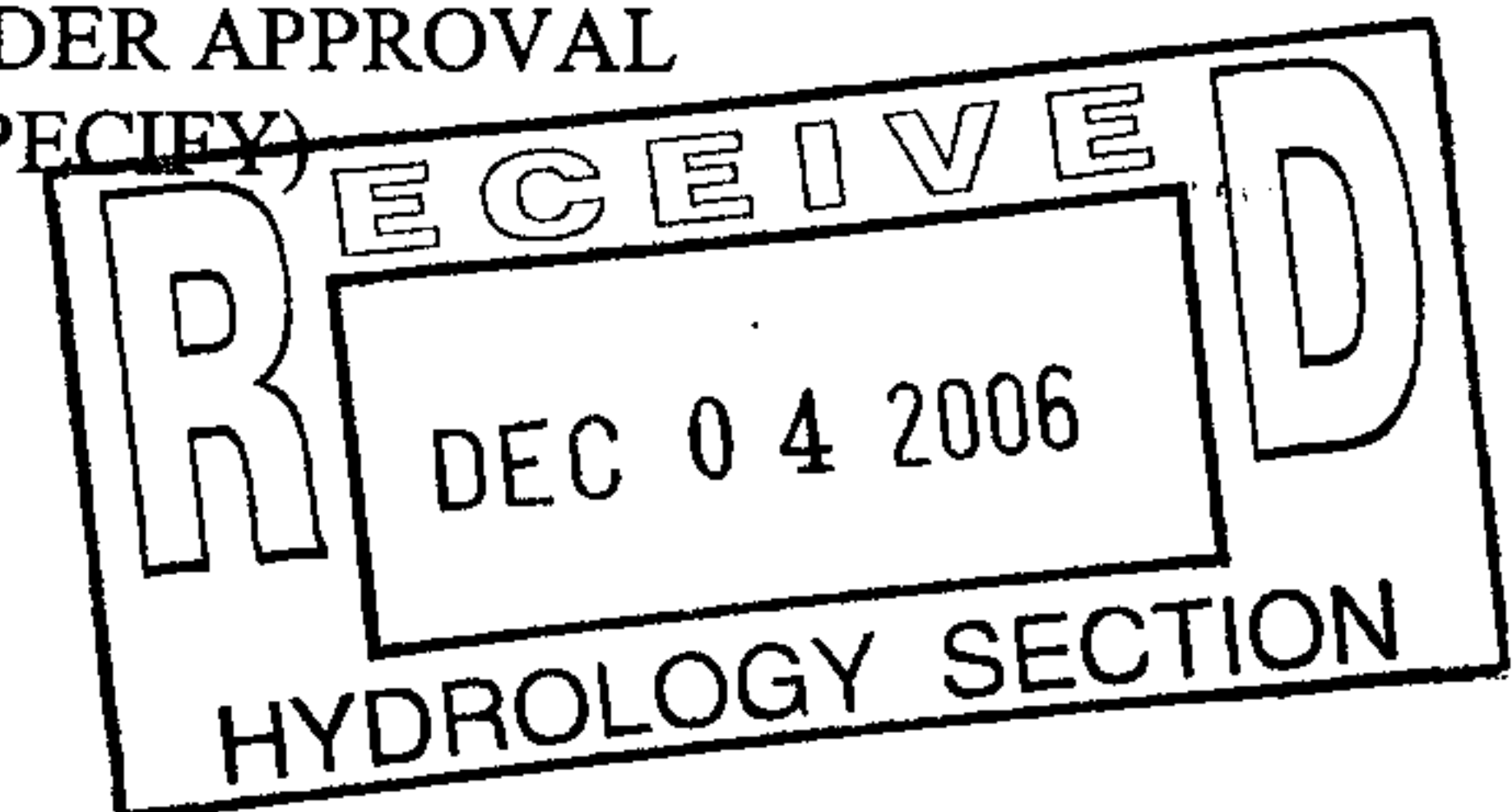
CHECK TYPE OF APPROVAL SOUGHT:

- ☐ SIA/FINANCIAL GUARANTEE RELEASE
☐ PRELIMINARY PLAT APPROVAL
☐ S. DEV. PLAN FOR SUB'D APPROVAL
☐ S. DEV. FOR BLDG. PERMIT APPROVAL
☐ SECTOR PLAN APPROVAL
☐ FINAL PLAT APPROVAL
☐ FOUNDATION PERMIT APPROVAL
☐ BUILDING PERMIT APPROVAL
☒ CERTIFICATE OF OCCUPANCY (PERM)
☐ CERTIFICATE OF OCCUPANCY (TEMP)
☐ GRADING PERMIT APPROVAL
☐ PAVING PERMIT APPROVAL
☐ WORK ORDER APPROVAL
☐ OTHER (SPECIFY) _____

WAS A PRE-DESIGN CONFERENCE ATTENDED:

- ☐ YES
☐ NO
☐ COPY PROVIDED

SUBMITTED BY: [Signature] DATE: 12/4/06



Requests for approvals of Site Development Plans and/or Subdivision Plats shall be accompanied by a drainage submittal. The particular nature, location and scope to the proposed development define the degree of drainage detail. One or more of the following levels of submittal may be required based on the following:

1. **Conceptual Grading and Drainage Plan:** Required for approval of Site Development Plans greater than five (5) acres and Sector Plans.
2. **Drainage Plans:** Required for building permits, grading permits, paving permits and site plans less than five (5) acres.
3. **Drainage Report:** Required for subdivision containing more than ten (10) lots or constituting five (5) acres or more.



Re: Parker Davis Office Condominiums
6501 Wyoming NE, Albuquerque, NM
Case # DRB - 1000692

TLC CERTIFICATION (Building A only)

December 1, 2006

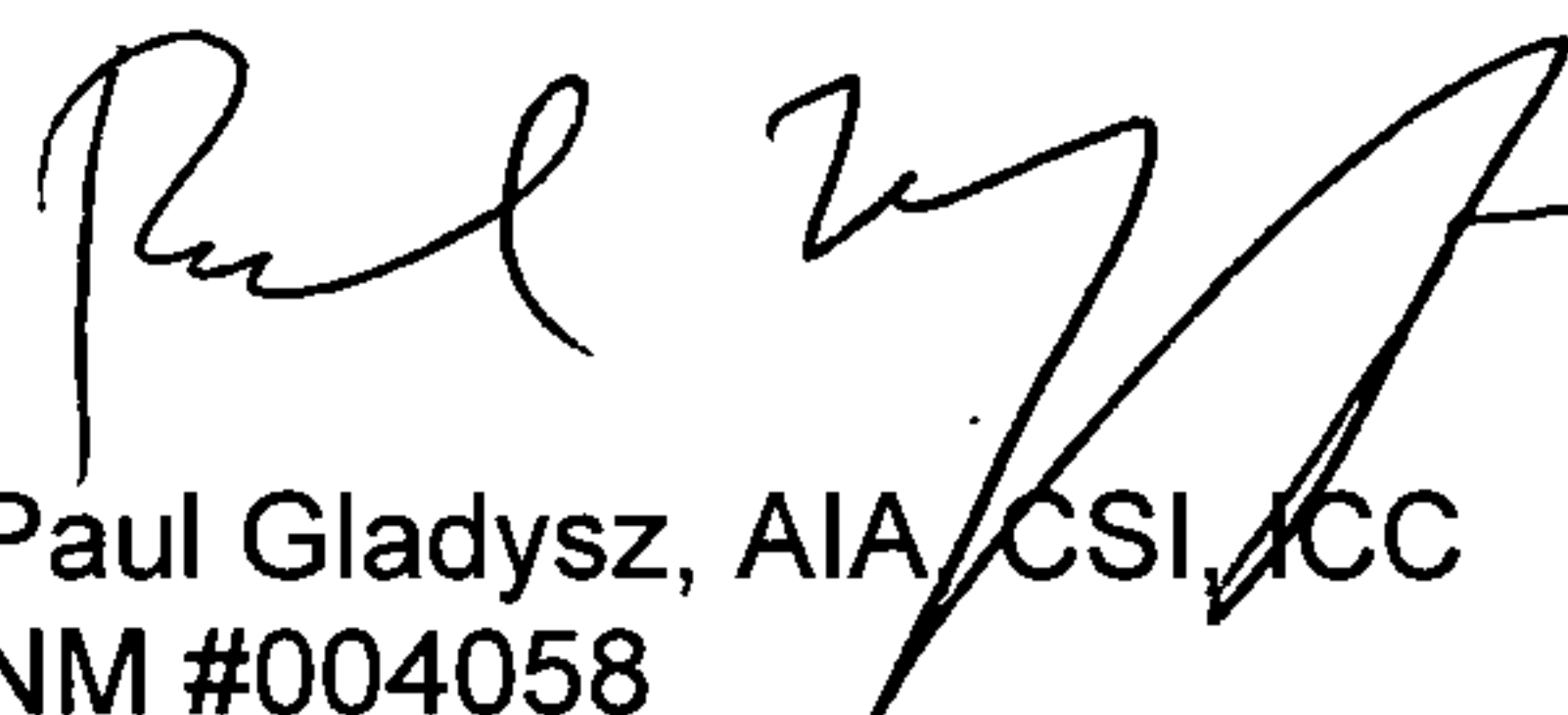
To Whom It May Concern:

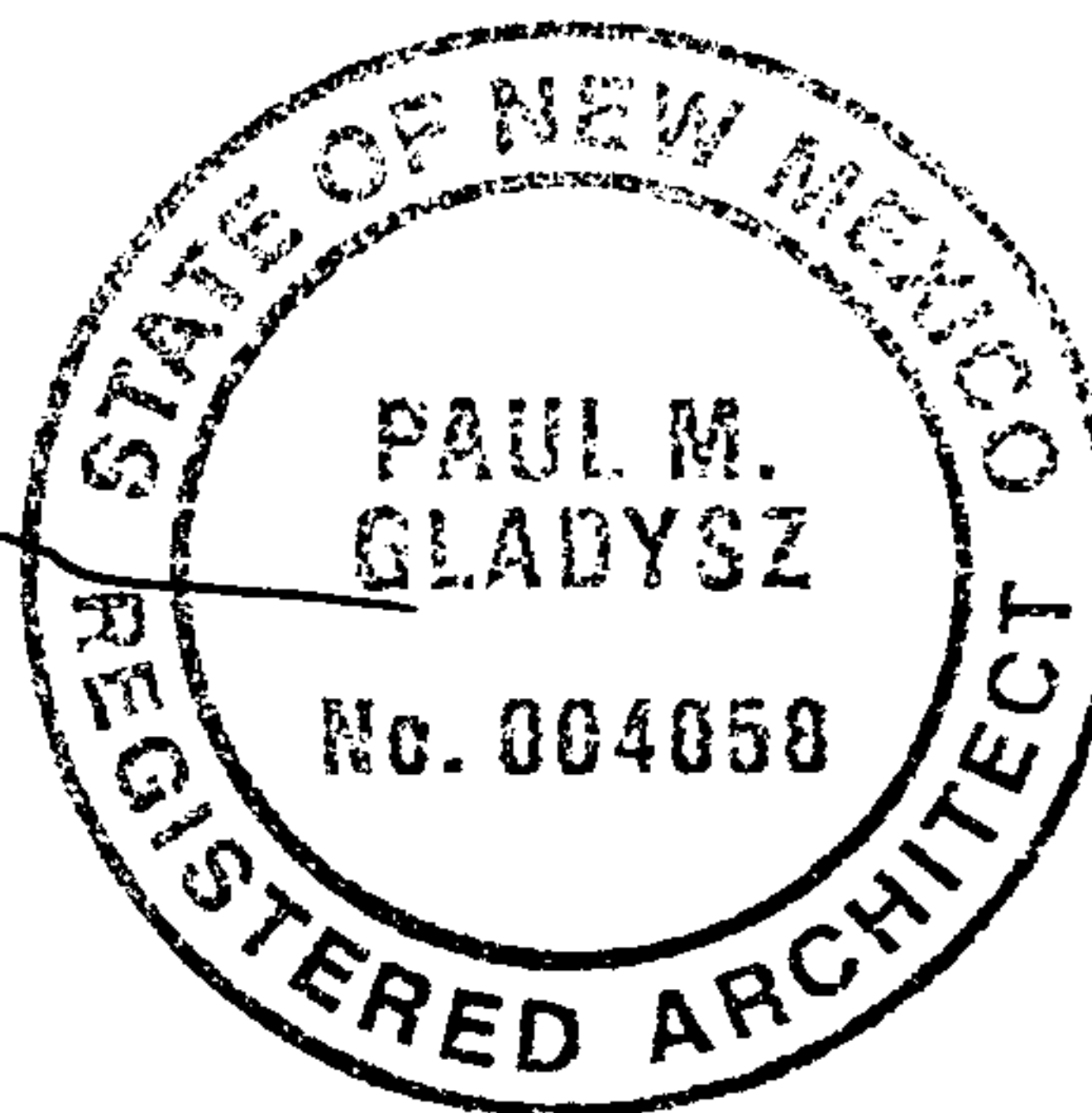
I, Paul Gladysz, NM Registration #004058, of the firm BDA Architecture, PC hereby certify that the subject portion of this project has been constructed in substantial compliance with and in accordance with the design intent of the approved plan dated 05/10/05. The record information edited onto the original design document has been obtained by Paul Gladysz #004058, of the firm BDA Architecture. I further certify that I have determined by visual inspection that the provided data is representative of actual site conditions and is true and correct to the best of my knowledge and belief (exception listed below). This certification is submitted in support of a request for a Certificate of Occupancy.

Exception: None noted.

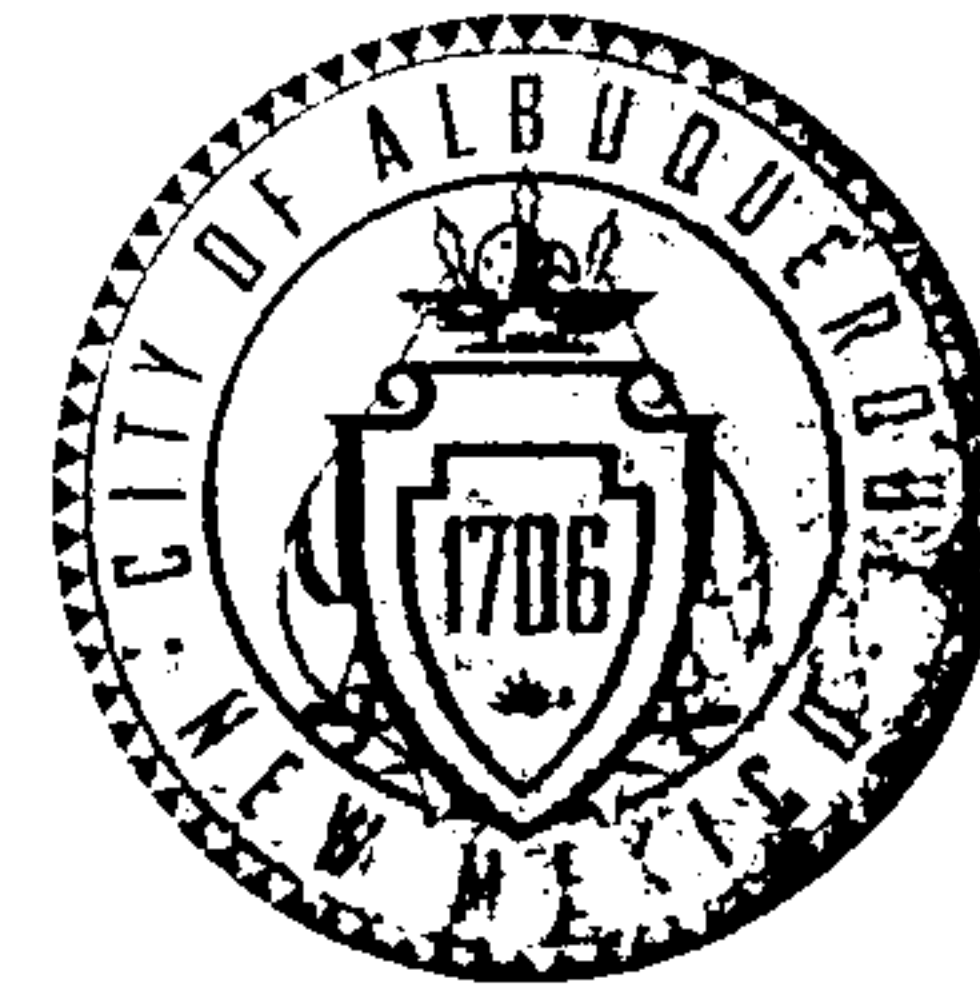
The record information presented hereon is not necessarily complete and intended only to verify substantial compliance of the Traffic Circulation Layout aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose.

Sincerely,


Paul Gladysz, AIA/CSI/ICC
NM #004058



CITY OF ALBUQUERQUE



**Planning Department
Transportation Development Services Section**

October 22, 2008

Paul Gladysz, Registered Architect,
BDA Architecture, P.C.
901 Lamberton Place NE
Albuquerque, NM 87107

Re: Approval of Temporary Certificate of Occupancy (C.O.) for
Parker Davis Office Condominiums, [E-19 / D005A]
6501 Wyoming NE
Architect's Stamp Dated 10/17/08

Dear Mr. Gladysz:

Based on the information provided on your submittal dated October 17, 2008, the above referenced project is approved for a 120-day Temporary C.O.

A Temporary C.O. has been issued allowing the H.C. ramp (located on Wyoming, need truncated domes and new wc ramp), drivepads (located on Burlison, need to be replace with ADA design since they are scored, cracked and not ADA) and any infrastructure that are damaged (sidewalk, curb and gutter, and drivepads will need to be replaced) issues to be completed within this time period. When these remaining issues have been fully completed, are in substantial compliance, and a final Certification for Transportation has been resubmitted to the City's Hydrology office for approval, a Permanent C.O. will be issued.

The Certification package for Final C.O. must include an **exact** copy of the approved TCL, or signed off D.R.B. Site Plan, which is in each of the two City Permit Plan Sets—the contractor's City field set and the City's plan set in the basement of the Plaza Del Sol building. Package also must include a letter of certification on designer's letterhead-stamped with his seal, signed, and dated. Submit package along with fully completed Drainage Information Sheet to front counter personnel for log in and evaluation by Transportation.

If you have any questions, please call me at 924-3620.

Sincerely,

Nilo E. Salgado-Fernandez, P.E.
Senior Traffic Engineer
Development and Building Services
Planning Department

c: Engineer
Hydrology file
CO Clerk

PO Box 1293

Albuquerque

NM 87103

www.cabq.gov



Re: Parker Davis Office Condominiums
6501 Wyoming NE, Albuquerque, NM
Case # DRB - 1000692

TLC CERTIFICATION

October 17, 2008

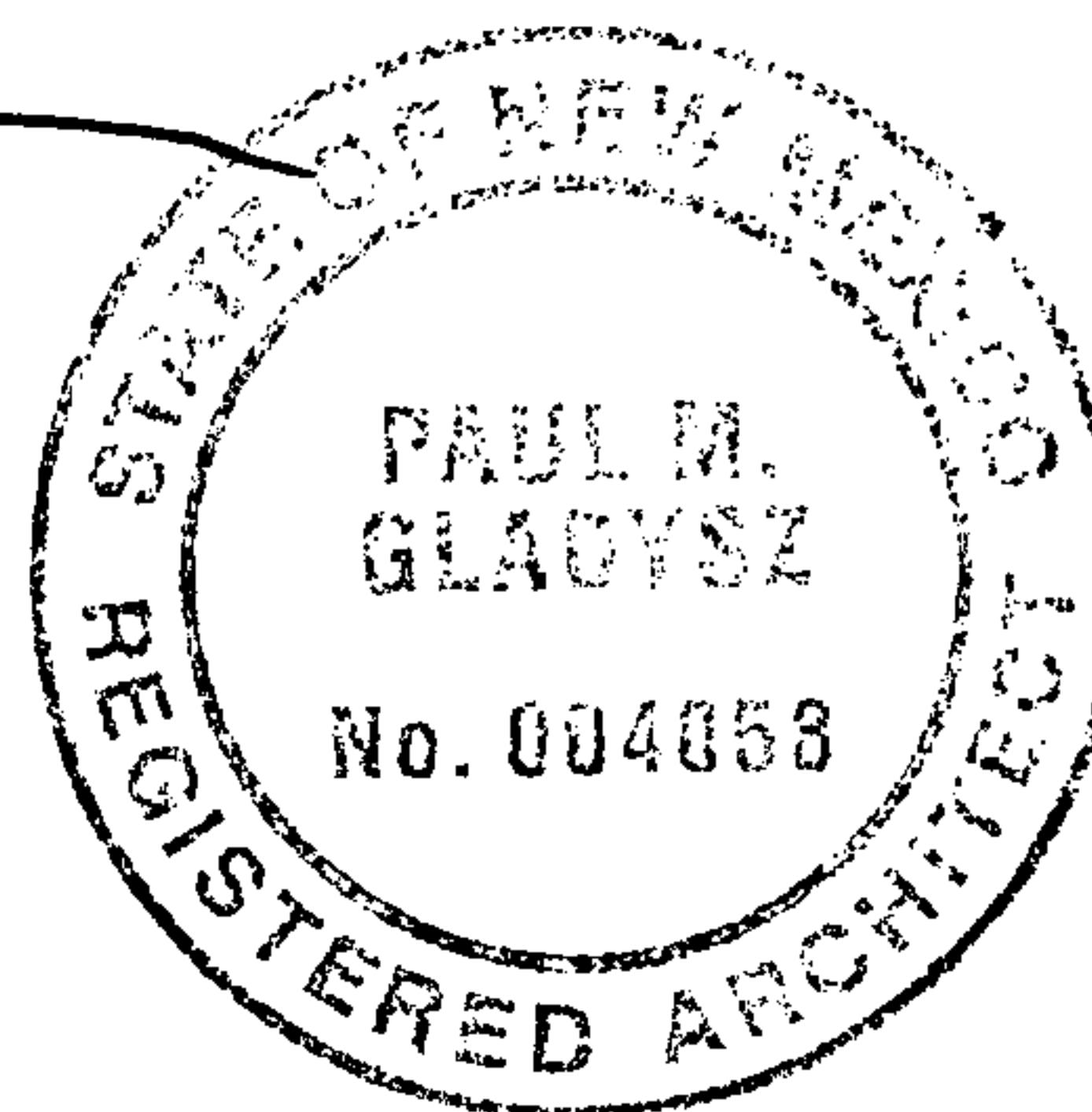
To Whom It May Concern:

I, Paul Gladysz, NM Registration #004058, of the firm BDA Architecture, PC hereby certify that the subject portion of this project has been constructed in substantial compliance with and in accordance with the design intent of the approved plan dated 05/10/05. The record information edited onto the original design document has been obtained by Paul Gladysz #004058, of the firm BDA Architecture. I further certify that I have determined by visual inspection that the provided data is representative of actual site conditions and is true and correct to the best of my knowledge and belief. This certification is submitted in support of a request for a Certificate of Occupancy.

The record information presented hereon is not necessarily complete and intended only to verify substantial compliance of the Traffic Circulation Layout aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose.

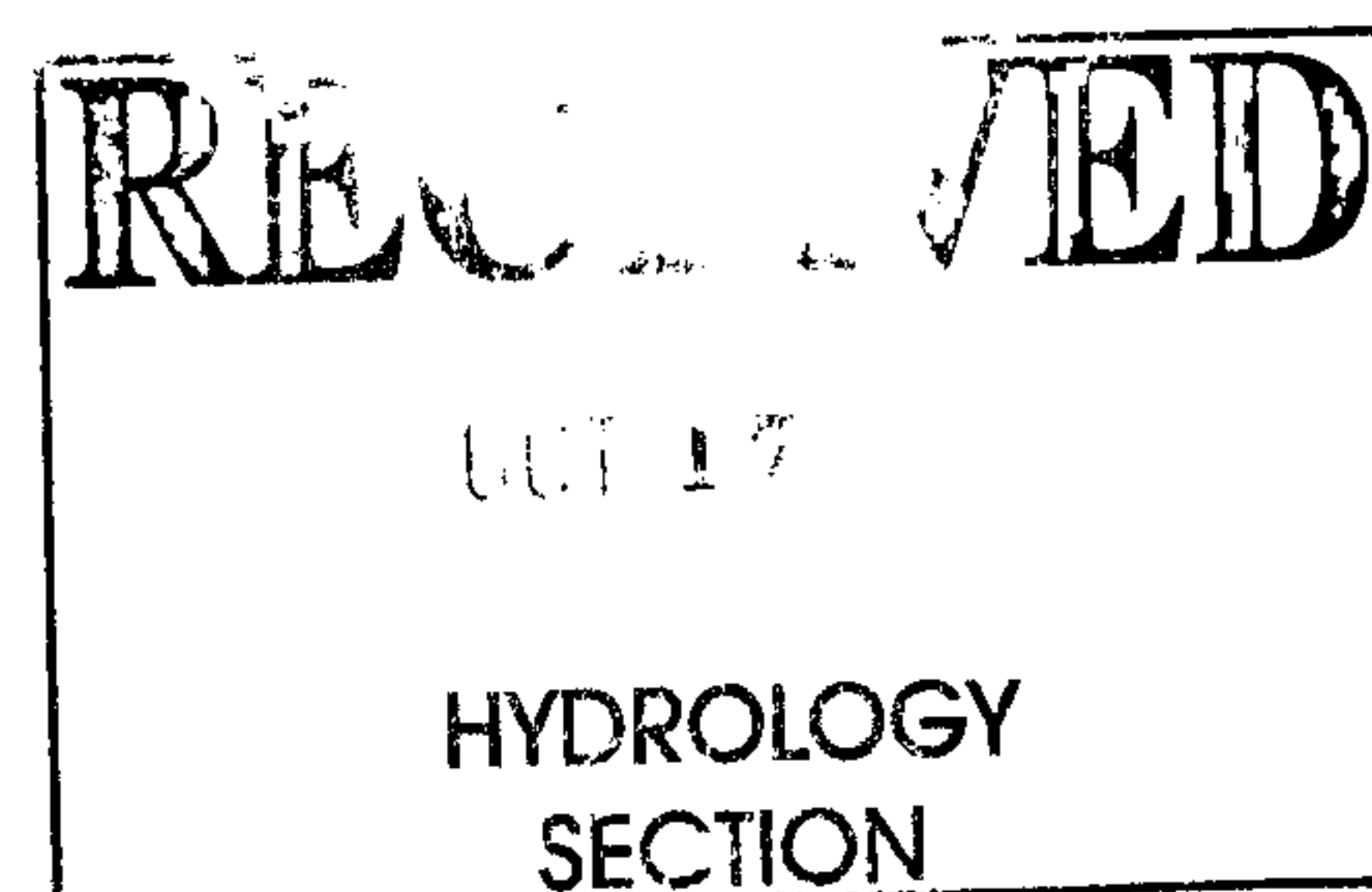
Sincerely,

Paul Gladysz, AIA, CSI, ICC
NM #004058



BDA Architecture, P.C.
901 Lambertson Place NE
Albuquerque, NM 87107

(505) 858-0180
(505) 858-0111 – Fax
info@bdaarc.com



DRAINAGE AND TRANSPORTATION INFORMATION SHEET

(REV 12/2005)

PROJECT TITLE: PARKER/DAVIS OFFICE CONDOS ZONE MAP: E-19/D005A
 DRB#: DRB-1000692 EPC#: _____ WORK ORDER#: _____

LEGAL DESCRIPTION: _____
 CITY ADDRESS: 6501 Wyoming NE Albuquerque, NM 87105

ENGINEERING FIRM: _____ CONTACT: _____
 ADDRESS: _____ PHONE: _____
 CITY, STATE: _____ ZIP CODE: _____

OWNER: PARKER/DAVIS LLC CONTACT: Christian Parker
 ADDRESS: 8409 Petaluma NE PHONE: 401 3841
 CITY, STATE: Alb, NM ZIP CODE: _____

ARCHITECT: BDH CONTACT: Paul Gladys
 ADDRESS: 901 Lambertson Pl NE PHONE: 858 0180
 CITY, STATE: Albuquerque, NM 87107 ZIP CODE: _____

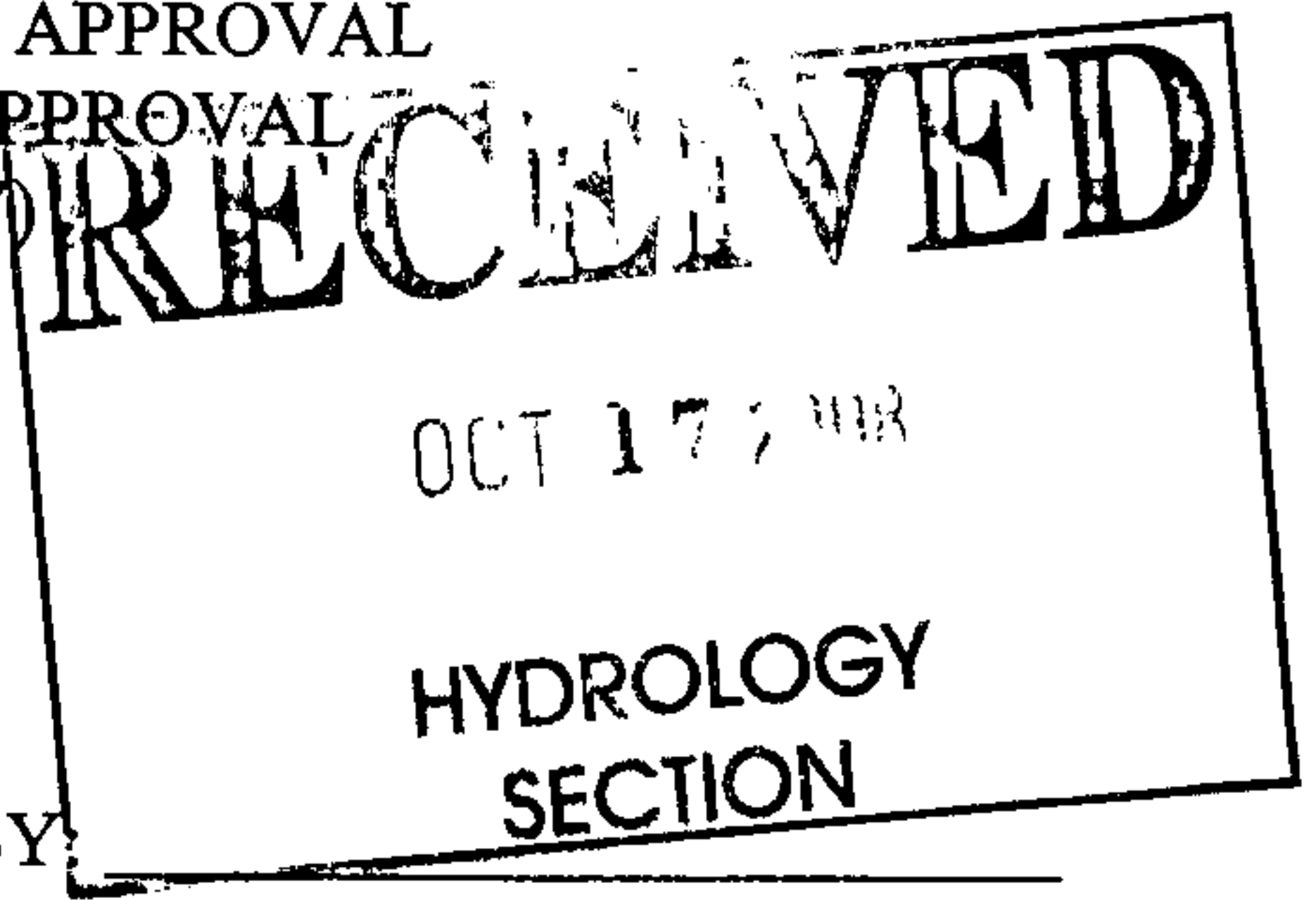
SURVEYOR: _____ CONTACT: _____
 ADDRESS: _____ PHONE: _____
 CITY, STATE: _____ ZIP CODE: _____

CONTRACTOR: SIVAD Ent CONTACT: Steve Davis
 ADDRESS: 8409 Petaluma PHONE: 980 9372
 CITY, STATE: Albuquerque, NM ZIP CODE: 87122

- | | |
|---|--|
| <p><u>TYPE OF SUBMITTAL:</u></p> <p>_____ DRAINAGE REPORT</p> <p>_____ DRAINAGE PLAN 1st SUBMITTAL</p> <p>_____ DRAINAGE PLAN RESUBMITTAL</p> <p>_____ CONCEPTUAL G & D PLAN</p> <p>_____ GRADING PLAN</p> <p>_____ EROSION CONTROL PLAN</p> <p>_____ ENGINEER'S CERT (HYDROLOGY)</p> <p>_____ CLOMR/LOMR</p> <p>☒ TRAFFIC CIRCULATION LAYOUT</p> <p>☒ ENGINEER'S CERT (TCL)</p> <p>_____ ENGINEER'S CERT (DRB SITE PLAN)</p> <p>_____ OTHER (SPECIFY) _____</p> | <p><u>CHECK TYPE OF APPROVAL SOUGHT:</u></p> <p>_____ SIA/FINANCIAL GUARANTEE RELEASE</p> <p>_____ PRELIMINARY PLAT APPROVAL</p> <p>_____ S. DEV. PLAN FOR SUB'D APPROVAL</p> <p>_____ S. DEV. FOR BLDG. PERMIT APPROVAL</p> <p>_____ SECTOR PLAN APPROVAL</p> <p>_____ FINAL PLAT APPROVAL</p> <p>_____ FOUNDATION PERMIT APPROVAL</p> <p>_____ BUILDING PERMIT APPROVAL</p> <p>☒ CERTIFICATE OF OCCUPANCY (PERM)</p> <p>_____ CERTIFICATE OF OCCUPANCY (TEMP)</p> <p>_____ GRADING PERMIT APPROVAL</p> <p>_____ PAVING PERMIT APPROVAL</p> <p>_____ WORK ORDER APPROVAL</p> <p>_____ OTHER (SPECIFY) _____</p> |
|---|--|

WAS A PRE-DESIGN CONFERENCE ATTENDED:
 _____ YES
 _____ NO
 _____ COPY PROVIDED

DATE SUBMITTED: 10/17/08 BY: _____



Requests for approvals of Site Development Plans and/or Subdivision Plats shall be accompanied by a drainage submittal. The particular nature, location, and scope to the proposed development defines the degree of drainage detail. One or more of the following levels of submittal may be required based on the following:

1. **Conceptual Grading and Drainage Plan:** Required for approval of Site Development Plans greater than five (5) acres and Sector Plans.
2. **Drainage Plans:** Required for building permits, grading permits, paving permits and site plans less than five (5) acres.
3. **Drainage Report:** Required for subdivision containing more than ten (10) lots or constituting five (5) acres or more.



Re: Parker Davis Office Condominiums
6501 Wyoming NE, Albuquerque, NM
Case # DRB-1000692

TLC CERTIFICATION (Building H only)

May 23, 2006

To Whom It May Concern:

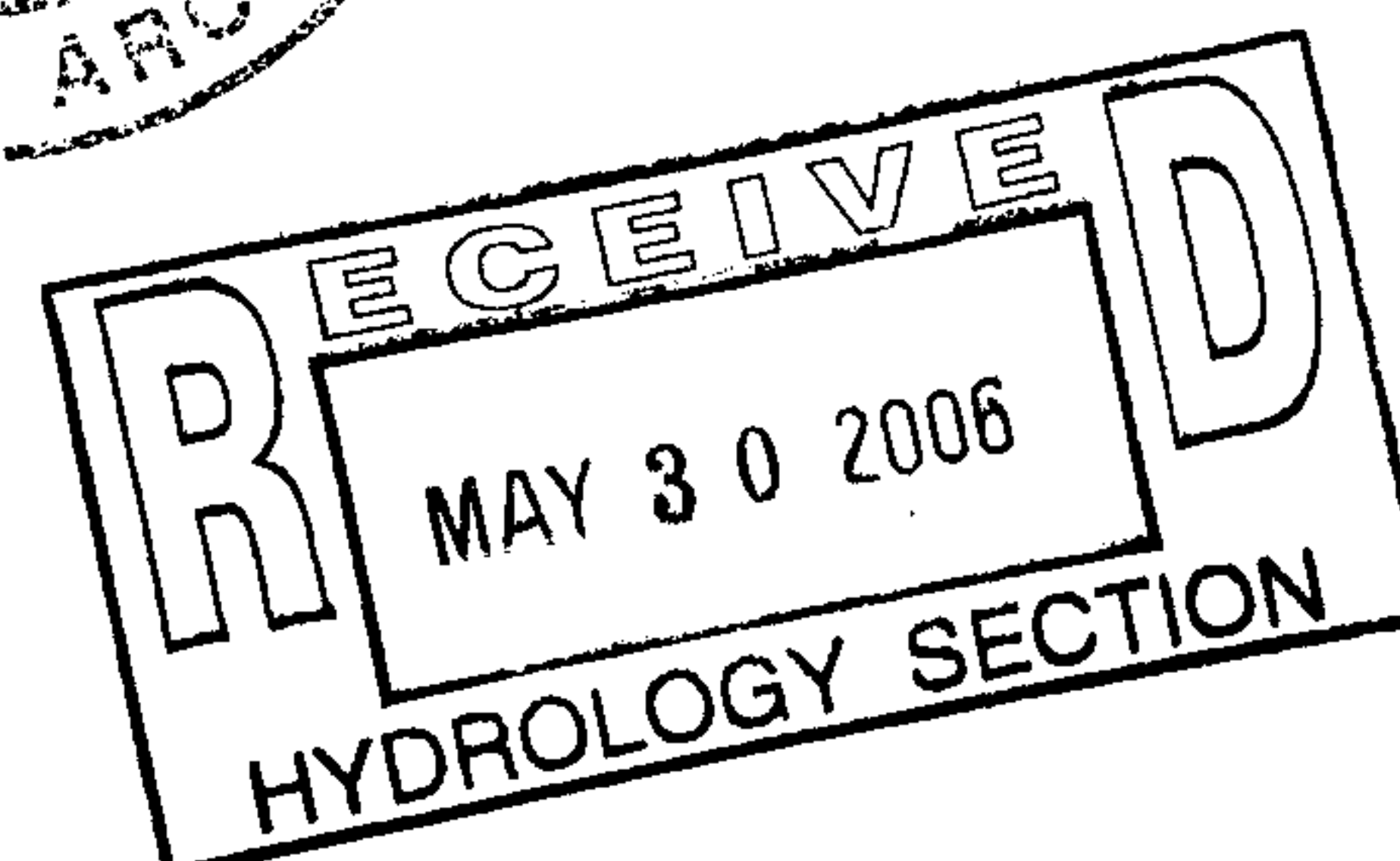
I, Paul Gladysz, NM Registration #004058, of the firm BDA Architecture, PC hereby certify that the subject portion of this project has been constructed in substantial compliance with and in accordance with the design intent of the approved plan dated 05/10/05. The record information edited onto the original design document has been obtained by Paul Gladysz #004058, of the firm BDA Architecture. I further certify that I have determined by visual inspection that the provided data is representative of actual site conditions and is true and correct to the best of my knowledge and belief (exception listed below). This certification is submitted in support of a request for a Temporary Certificate of Occupancy. Certification for the final Certificate of Occupancy will be conditioned on the proper completion of the listed exceptions, and correction of any other discrepancy that may become known to me.

Exceptions: 1. Wheelchair access ramps are to be reconstructed as so to be in compliance with the details shown on the approved plans.

The record information presented hereon is not necessarily complete and intended only to verify substantial compliance of the Traffic Circulation Layout aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose

Sincerely,

Paul M. Gladysz, AIA, CSI, ICC
NM #004058

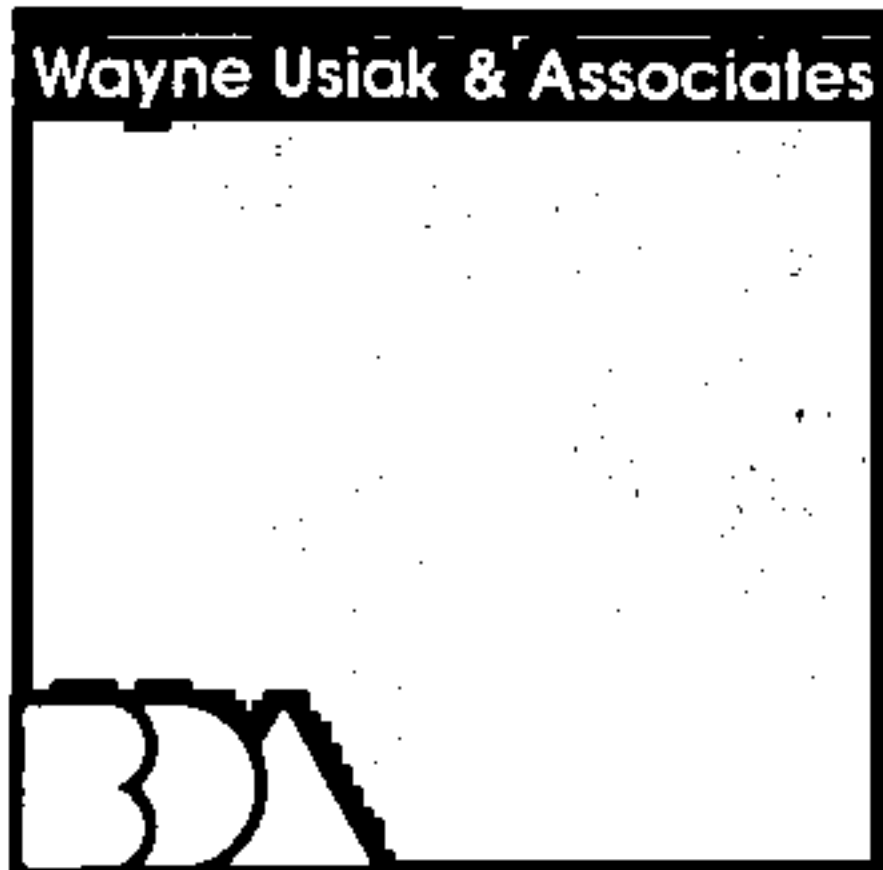


FAXED

5/23/06

BDA Architecture, P.C.
901 Lambertson PI NE
Albuquerque, NM 87107

(505) 858-0180
(505) 858-0111 – Fax
info@bdaarc.com



Re: Parker Davis Office Condominiums
6501 Wyoming NE, Albuquerque, NM
Case # DRB - 1000692

TLC CERTIFICATION (Building J only)

□ 27 June 2006

To Whom it May Concern:

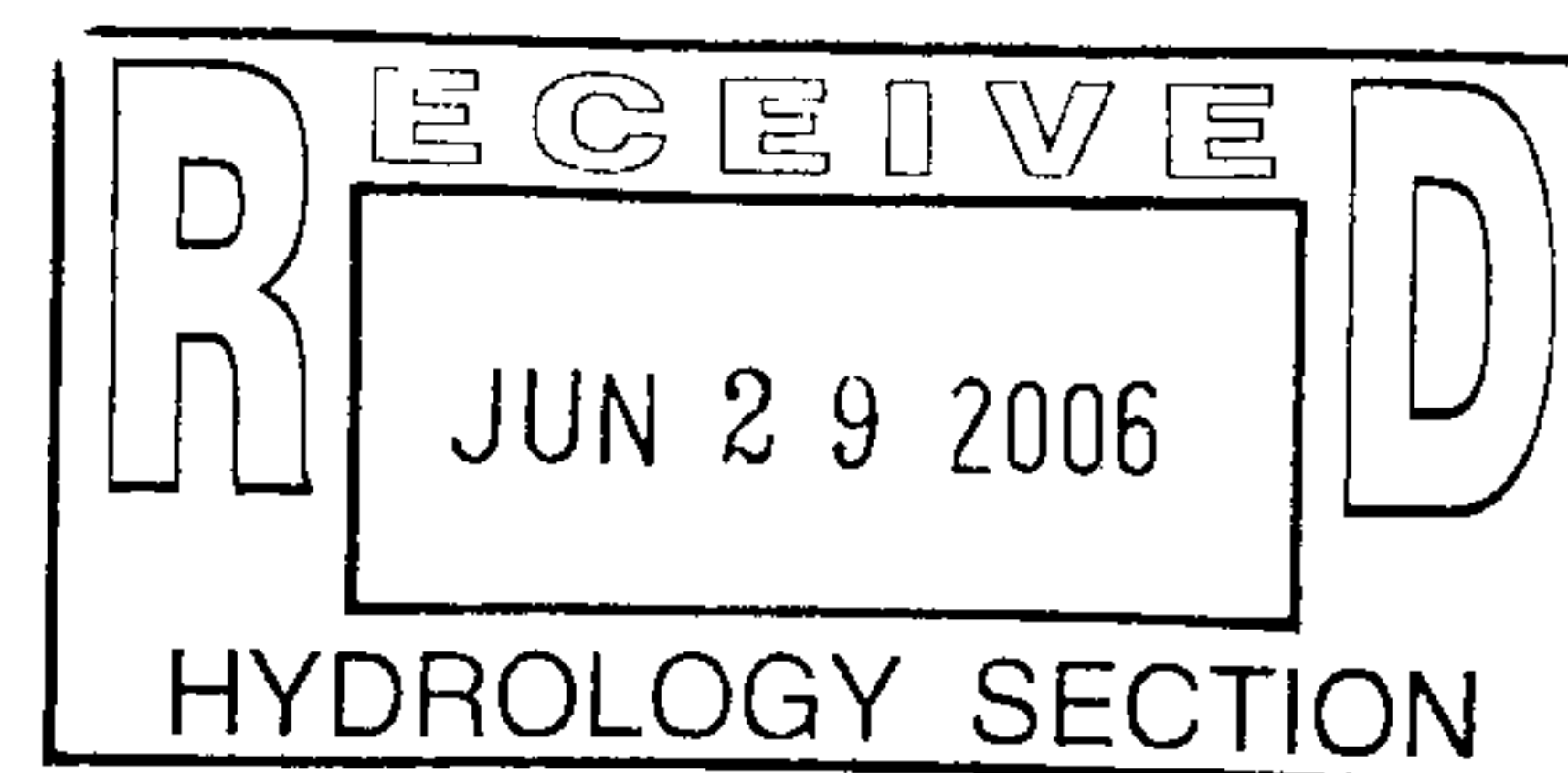
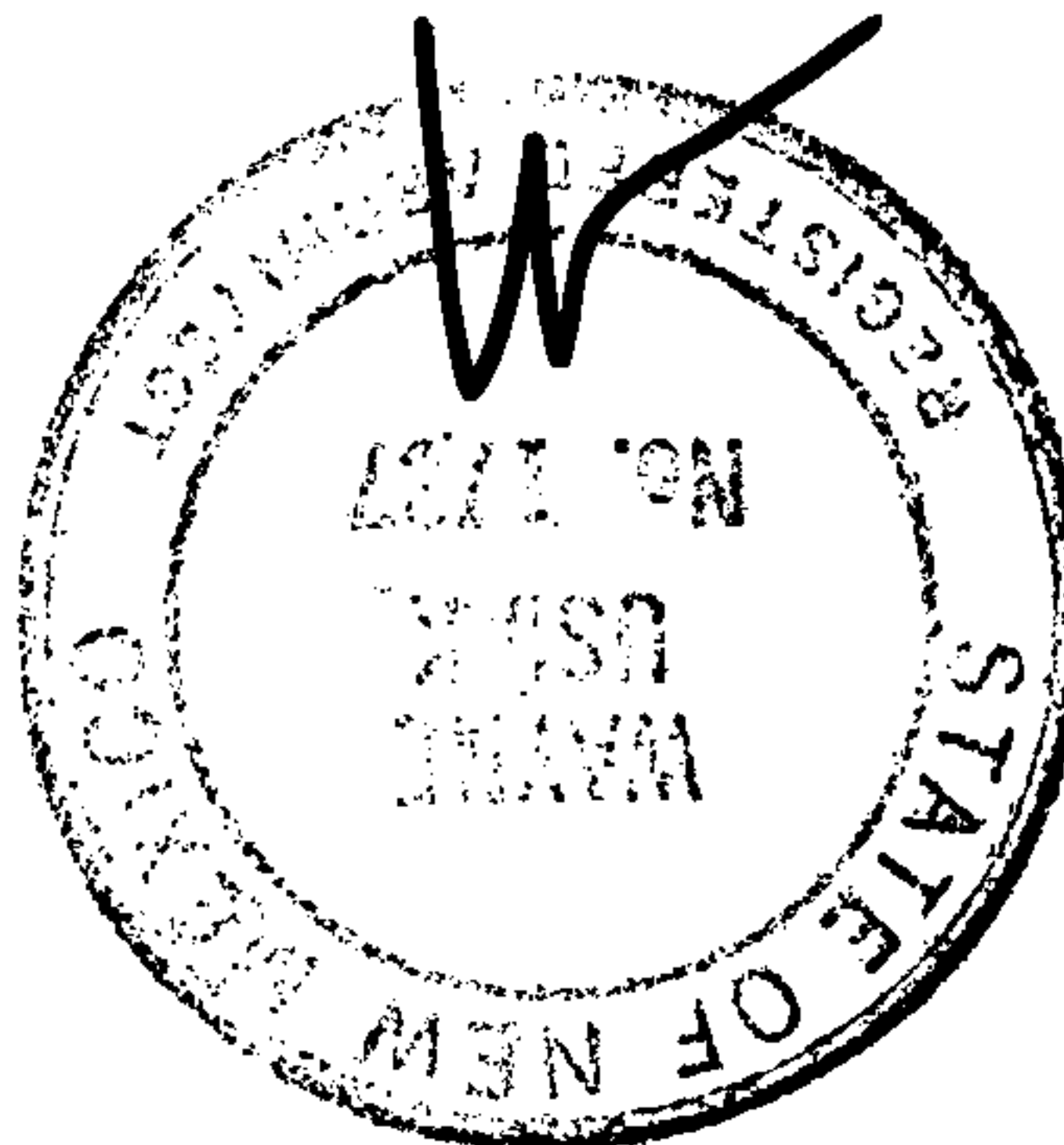
I, Wayne Usiak, NM Registration #1787, of the firm BDA Architecture, PC hereby certify that the subject portion of this project has been constructed in substantial compliance with and in accordance with the design intent of the approved plan dated 05/10/05. The record information edited onto the original design document has been obtained by Wayne Usiak #1787, of the firm BDA Architecture. I further certify that I have determined by visual inspection that the provided data is representative of actual site conditions and is true and correct to the best of my knowledge and belief (exception listed below). This certification is submitted in support of a request for a Temporary Certificate of Occupancy. Certification for the final Certification of Occupancy will be conditioned on the proper completion of the listed exceptions, and correction of any other discrepancy that may become known to me.

Exception: 1. Wheelchair access ramps are to be reconstructed as so to be in compliance with the details shown on the approved plans.

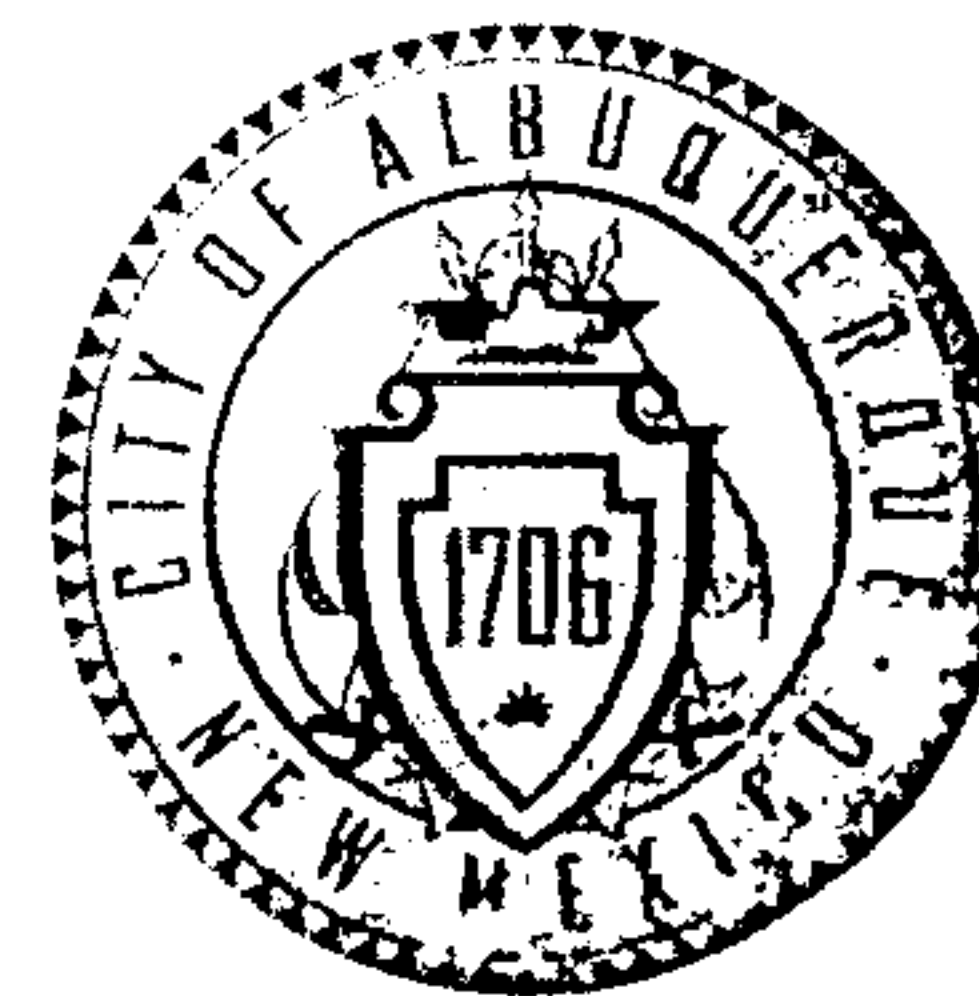
The record information presented hereon is not necessarily complete and intended only to verify substantial compliance of the Traffic Circulation Layout aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose.

Sincerely,

Wayne Usiak, AIA, NCARB
NM #1787



CITY OF ALBUQUERQUE



April 8, 2008

Celia S. Tomlinson, P.E.
Rhombus P.A., Inc.
2620-B San Mateo Pl NE
Albuquerque, NM 87110

Re: Wyoming Office Development, Building B
6501 Wyoming Blvd NE
Approval of Permanent Certificate of Occupancy (C.O.)
Engineer's Stamp dated 11/21/05 (E-19/D005A)
Certification dated 4/3/08

Ms. Tomlinson,

Based upon the information provided in your submittal received 4/4/08, the above referenced certification is approved for release of Permanent Certificate of Occupancy by Hydrology for Building B only.

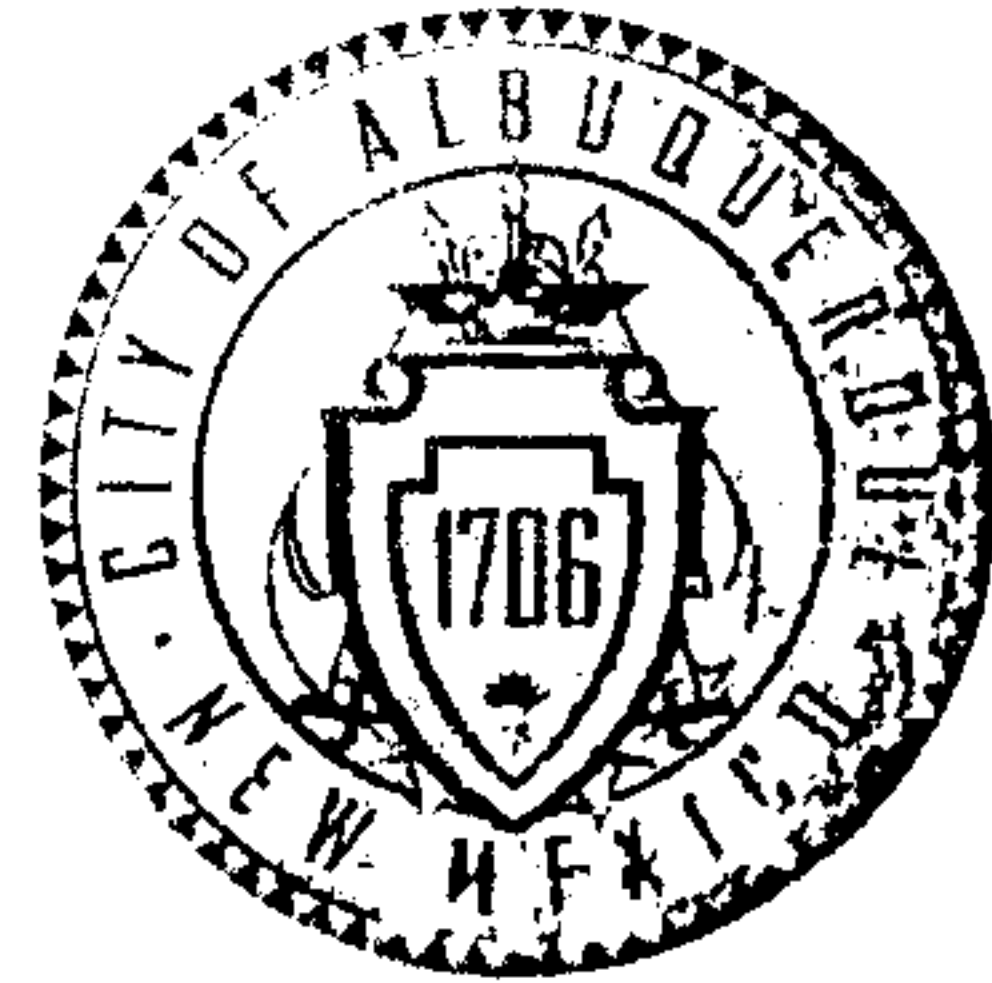
If you have any questions, you can contact me at 924-3982.

Sincerely,

Timothy E. Sims
Plan Checker-- Hydrology, Planning Dept.
Development and Building Services

C: CO Clerk—Katrina Sigala
File

CITY OF ALBUQUERQUE



April 8, 2008

Celia S. Tomlinson, P.E.
Rhombus P.A., Inc.
2620-B San Mateo Pl NE
Albuquerque, NM 87110

Re: Wyoming Office Development, Building I
6501 Wyoming Blvd NE
Approval of 90 Day Temporary Certificate of Occupancy (C.O.)
Engineer's Stamp dated 11/21/05 (E-19/D005A)
Certification dated 4/3/08

Ms. Tomlinson,

Based upon the information provided in your submittal received 4/4/08, the above referenced certification is approved for release of a 90 Day Temporary Certificate of Occupancy by Hydrology for Building I. This allows time for some corrections to be made on site:

1. The inverts on the drains east of the building will need to be adjusted.
2. Lower the southern two grates 0.1' sump.
3. All of the debris will need to be removed from the pond.
4. The rundown will need to be cleared. After a site visit there was an irrigation pipe and some filter fabric in the rundown.

Prior to Permanent Certification of Occupancy, Engineer Certification of this plan per the DPM checklist will be required.

If you have any questions, you can contact me at 924-3982.

Sincerely,

Timothy E. Sims
Plan Checker-- Hydrology, Planning Dept.
Development and Building Services

C: CO Clerk—Katrina Sigala
File

CITY OF ALBUQUERQUE



July 15, 2008

Celia S. Tomlinson, P.E.
Rhombus P.A. Inc.
10325 Karen Ave NE
Albuquerque, NM 87111

**Re: Wyoming Office Development, Building i
6501 Wyoming Blvd NE
Approval of Permanent Certificate of Occupancy (C.O.)
Engineer's Stamp dated 11/21/05 (E-19/D005A)
Certification dated 7/10/08**

Ms. Tomlinson,

Based upon the information provided in your submittal received 7/14/08, the above referenced certification is approved for release of Permanent Certificate of Occupancy by Hydrology.

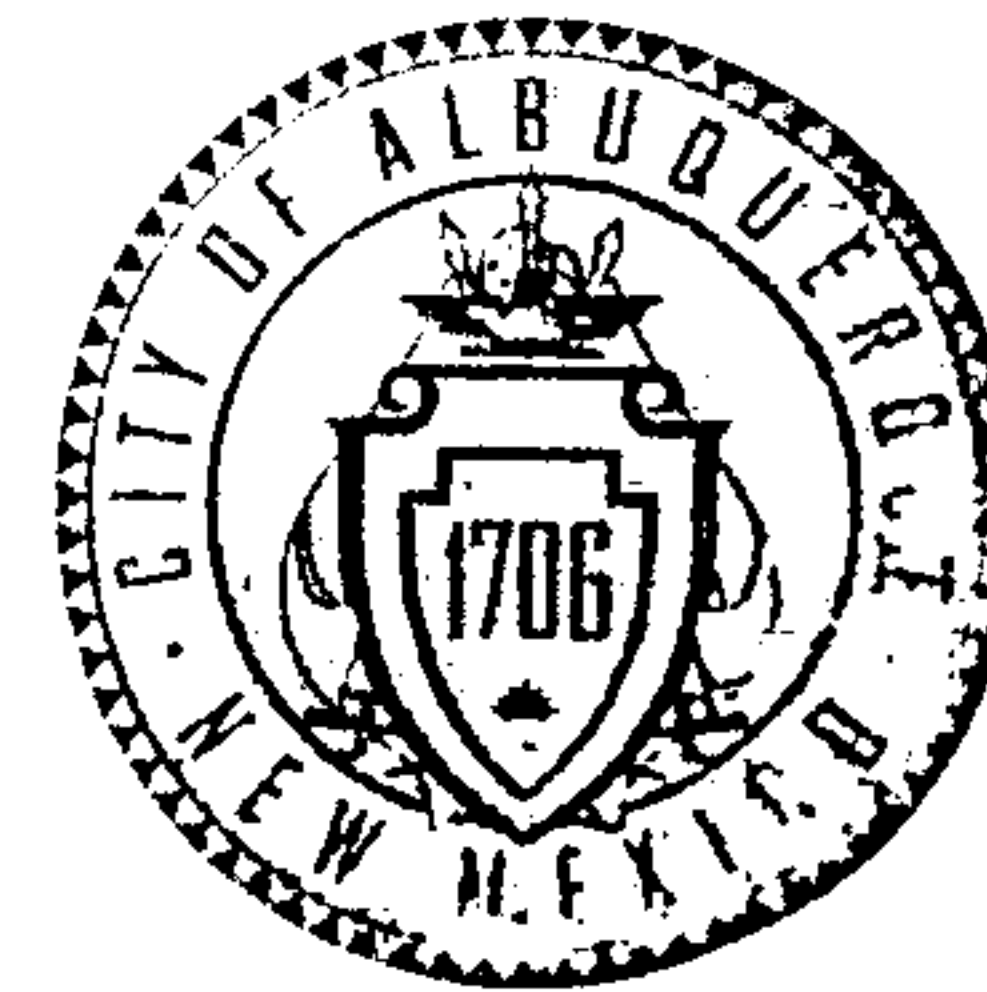
If you have any questions, you can contact me at 924-3982.

Sincerely,

Timothy E. Sims
Plan Checker-- Hydrology, Planning Dept.
Development and Building Services

C: CO Clerk—Katrina Sigala
File

CITY OF ALBUQUERQUE



September 18, 2008

Celia S. Tomlinson, P.E.
Rhombus P.A. Inc.
10325 Karen Ave NE
Albuquerque, NM 87111

**Re: Wyoming Office Development, Building H
6501 Wyoming Blvd NE
Approval of Permanent Certificate of Occupancy (C.O.)
Engineer's Stamp dated 11/21/05 (E-19/D005A)
Certification dated 9/10/08**

Ms. Tomlinson,

Based upon the information provided in your submittal received 9/18/08, the above referenced certification is approved for release of Permanent Certificate of Occupancy by Hydrology.

If you have any questions, you can contact me at 924-3695.

Sincerely,

Curtis Cherne, P.E.
Senior Engineer-- Hydrology, Planning Dept.
Development and Building Services

C: CO Clerk—Katrina Sigala
File

PO Box 1293

Albuquerque

NM 87103

www.cabq.gov

CITY OF ALBUQUERQUE



June 30, 2006

Ms. Celia Tomlinson, P.E.
RHOMBUS, PA
2620-B San Mateo Blvd. NE
Albuquerque, NM 87110

Re: WYOMING OFFICE DEVELOPMENT- BUILDING J
6501 Wyoming Blvd. NE
Approval of TEMPORARY Certificate of Occupancy (C.O.)
Approved Engineer's Stamp dated 11/21/2005 (E-19/D5A)
Certification dated 06/30/2006

Dear Celia:

Based upon the information provided in your submittal received 06/30/2006, the above referenced certification is approved for release of 60-day Temporary Certificate of Occupancy by Hydrology.

Upon completion of the deficiencies listed in your correspondence, please resubmit an updated certification for Permanent C.O.

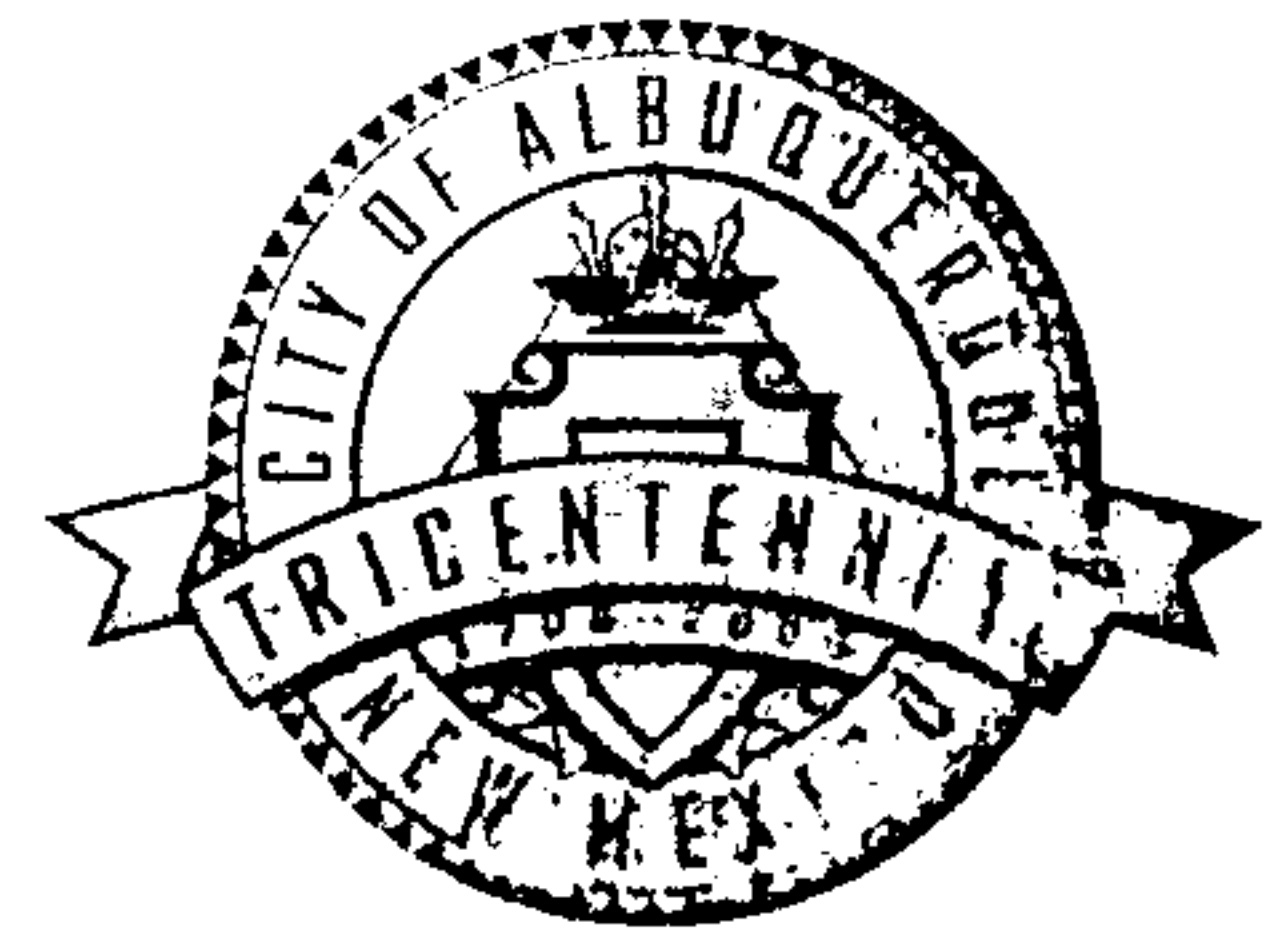
If you have any questions, you can contact me at 924-3982.

Sincerely,

Arlene V. Portillo
Plan Checker, Planning Dept. - Hydrology
Development and Building Services

C: C.O. Clerk
File

CITY OF ALBUQUERQUE



September 8, 2006

Ms. Celia Tomlinson, P.E.
RHOMBUS, PA
2620-B San Mateo Blvd. NE
Albuquerque, NM 87110

File

Re: WYOMING OFFICE DEVELOPMENT- BUILDING D
6501 Wyoming Blvd. NE
Approval of TEMPORARY Certificate of Occupancy (C.O.)
Approved Engineer's Stamp dated 11/21/2005 (E-19/D5A)
Certification dated 08/31/2006

Dear Celia:

Based upon the information provided in your submittal received 08/31/2006, the above referenced certification is approved for release of 60-day Temporary Certificate of Occupancy by Hydrology.

Upon completion of the deficiencies listed in your correspondence, please resubmit an updated certification for Permanent C.O.

If you have any questions, you can contact me at 924-3982.

Sincerely,

Arlene V. Portillo

Arlene V. Portillo
Plan Checker, Planning Dept. - Hydrology
Development and Building Services

C: C.O. Clerk
File

P.O. Box 1293

Albuquerque

New Mexico 87103

www.cabq.gov

CITY OF ALBUQUERQUE



November 3, 2006

Ms. Celia Tomlinson, P.E.
RHOMBUS, PA
2620-B San Mateo Blvd. NE
Albuquerque, NM 87110

Re: WYOMING OFFICE DEVELOPMENT- BUILDING A
6501 Wyoming Blvd. NE
Approval of TEMPORARY Certificate of Occupancy (C.O.)
Approved Engineer's Stamp dated 11/21/2005 (E-19/D5A)
Certification dated 10/31/2006

Dear Celia:

P.O. Box 1293
Albuquerque
New Mexico 87103

Based upon the information provided in your submittal received 11/02/2006, the above referenced certification is approved for release of 60-day Temporary Certificate of Occupancy by Hydrology.

Upon completion of the deficiencies listed in your correspondence, please resubmit an updated certification for Permanent C.O.

If you have any questions, you can contact me at 924-3982.

Sincerely,

Arlene V. Portillo

Arlene V. Portillo
Plan Checker, Planning Dept. - Hydrology
Development and Building Services

C: C.O. Clerk
File

www.cabq.gov

CITY OF ALBUQUERQUE

December 26, 2006

Ms. Celia Tomlinson, P.E.
RHOMBUS, PA
2620-B San Mateo Blvd. NE
Albuquerque, NM 87110

Re: WYOMING OFFICE DEVELOPMENT
6501 Wyoming Blvd. NE
Approval of Permanent Certificate of Occupancy (C.O.)
Approved Engineer's Stamp dated 11/21/2005 (E-19/D5A)
Certification dated 12/07/2006

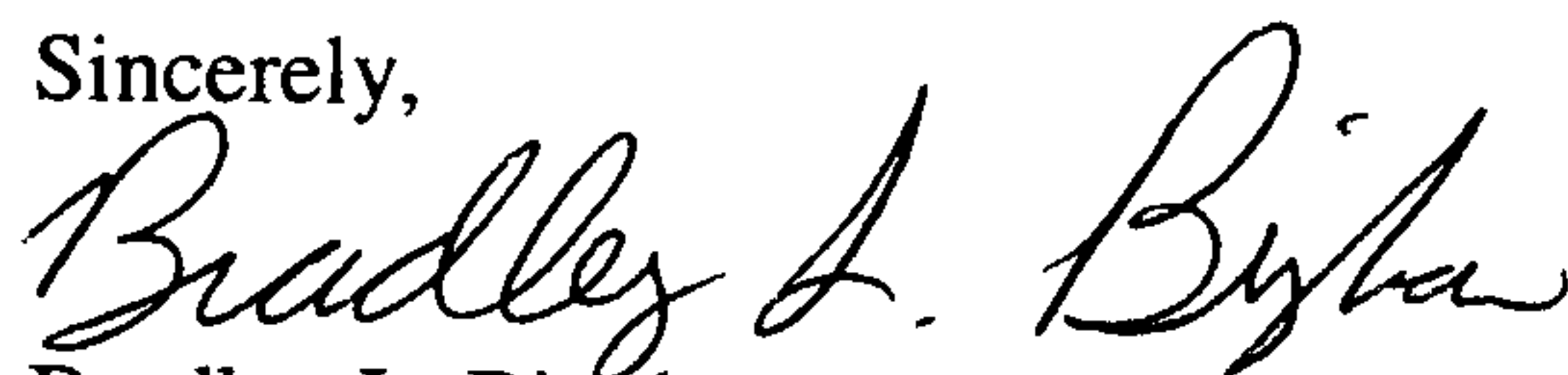
Dear Celia:

Based upon the information provided in your submittal received 12/8/2006, the above referenced certification **cannot be** approved for release of Permanent Certificate of Occupancy by Hydrology until the following items are specifically addressed on the plan.

- A site visit performed 12-19-06 showed no evidence of the 12" PVC outfall pipe from the pond to the channel. Upon resubmittal, provide inverts of both ends.
- The riprap swale on the north side was not in place. This swale is key to making sure that the drainage from pads A, B and J get to the pond and not offsite to the homes on the north. Your certification must address this as well.

If you have any questions, you can contact me at 924-39876.

Sincerely,



Bradley L. Bingham
Principal Engineer, Planning Dept. - Hydrology
Development and Building Services

C: File

P.O. Box 1293

Albuquerque

New Mexico 87103

www.cabq.gov

CITY OF ALBUQUERQUE



May 26, 2006

Ms. Celia Tomlinson, P.E.
RHOMBUS, PA
2620-B San Mateo Blvd. NE
Albuquerque, NM 87110

Re: WYOMING OFFICE DEVELOPMENT - Building H
6501 Wyoming Blvd. NE
Approval of TEMPORARY Certificate of Occupancy (C.O.)
Approved Engineer's Stamp dated 05/18/2005 (E-19/D5A)
Certification dated 05/23/2006

Dear Celia:

P.O. Box 1293

Based upon the information provided in your submittal received 05/23/2004, the above referenced certification is approved for release of 60-day Temporary Certificate of Occupancy by Hydrology.

Albuquerque

Upon completion of the deficiencies listed in your correspondence, please resubmit an updated certification.

New Mexico 87103

If you have any questions, you can contact me at 924-3982.

www.cabq.gov

Sincerely,

Arlene V. Portillo
Plan Checker, Planning Dept. - Hydrology
Development and Building Services

C: CO Clerk
File

CITY OF ALBUQUERQUE



June 22, 2006

Ms. Celia Tomlinson, PE
RHOMBUS, PA
2620-B San Mateo Blvd. NE
Albuquerque, NM 87110

Re: WYOMING OFFICE DEVELOPMENT, BUILDING H, (E-19/D5A)
6501 Wyoming Blvd. NE,
Permanent Hydrology Certificate of Occupancy, Submitted 06/21/2006,
Certification dated 06/20/2006

Dear Celia:

P.O. Box 1293

Based upon the information provided in your submittal received 06/21/2006, the above referenced Certification cannot be approved until the following is addressed:

Albuquerque

1. The approved Grading and Drainage (G/D) Plan has an Engineer Stamp date of 11/21/2005 not 05/18/2005 as indicated in your submittal. Attached, is a copy of the G/D approval letter, and a copy of the upper right hand corner of the approved G/D Plan.

New Mexico 87103

If you have any questions, please do not hesitate to contact me at 924-3982.

www.cabq.gov

Sincerely,

Arlene V. Portillo

Arlene V. Portillo
Plan Checker, Planning Dept. - Hydrology
Development and Building Services

Attachments

C: file

CITY OF ALBUQUERQUE



August 6, 2007

Celia S. Tomlinson, P.E.
Rhombus P.A., Inc.
2620-B San Mateo Pl NE
Albuquerque, NM 87110

Re: Wyoming Office Development, Building E
6501 Wyoming Blvd NE
Approval of Permanent Certificate of Occupancy (C.O.)
Engineer's Stamp dated 11/21/05 (E-19/D005A)
Certification dated 8/1/07

Based upon the information provided in your submittal received 8/2/07, the above referenced certification is approved for release of Permanent Certificate of Occupancy by Hydrology.

P.O. Box 1293

If you have any questions, you can contact me at 924-3695.

Albuquerque

Sincerely,

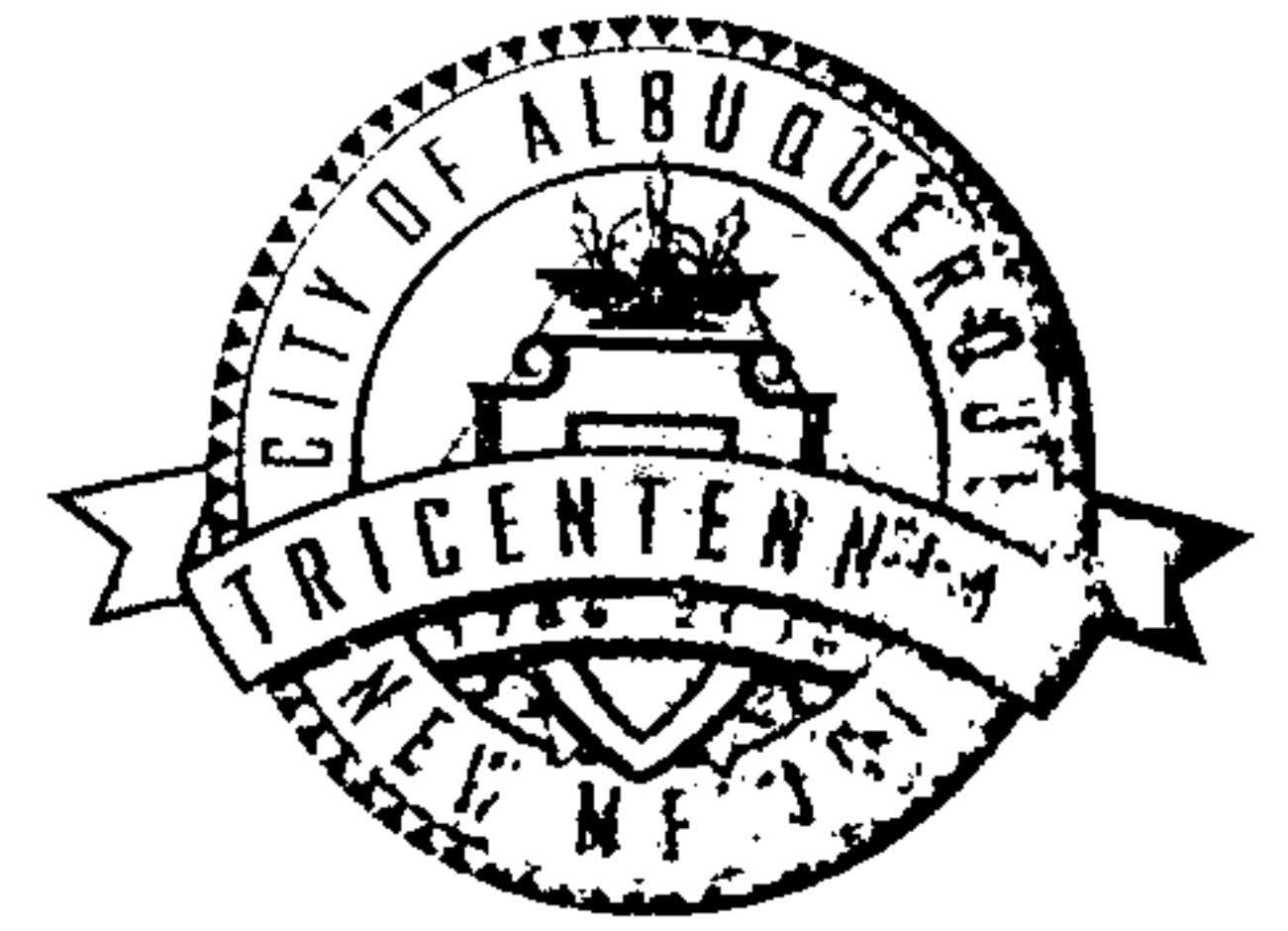
New Mexico 87103

Curtis A. Cherne, P.E.
Engineering Associate, Planning Dept.
Development and Building Services

www.cabq.gov

C: CO Clerk
File

CITY OF ALBUQUERQUE



March 29, 2007

Celia S. Tomlinson, P.E.
Rhombus P.A., Inc.
2620-B San Mateo Pl NE
Albuquerque, NM 87110

Re: Wyoming Office Development, Buildings A, C, D, F, and J
6501 Wyoming Blvd NE
Approval of Permanent Certificate of Occupancy (C.O.)
Engineer's Stamp dated 11/21/05 (E-19/D5A)
Certification dated 3/28/07

Based upon the information provided in your submittal received 3/28/07, the above referenced certification is approved for release of Permanent Certificate of Occupancy by Hydrology for buildings A, C, D, F, and J.

P.O. Box 1293

The temporary CO will be extended 90 days for Building H to complete the following deficiencies:

Albuquerque

- Build the rundown in the parking lot northwest of Building H that conveys runoff west of the dumpster enclosures.
- Complete the area between the retaining wall and garden wall on the west edge of the property south of the existing 9.5' wide concrete lined channel. Runoff should be conveyed to the existing 9.5' wide concrete lined channel with no ponding between the walls and the wall foundation should not be exposed.

New Mexico 87103

www.cabq.gov

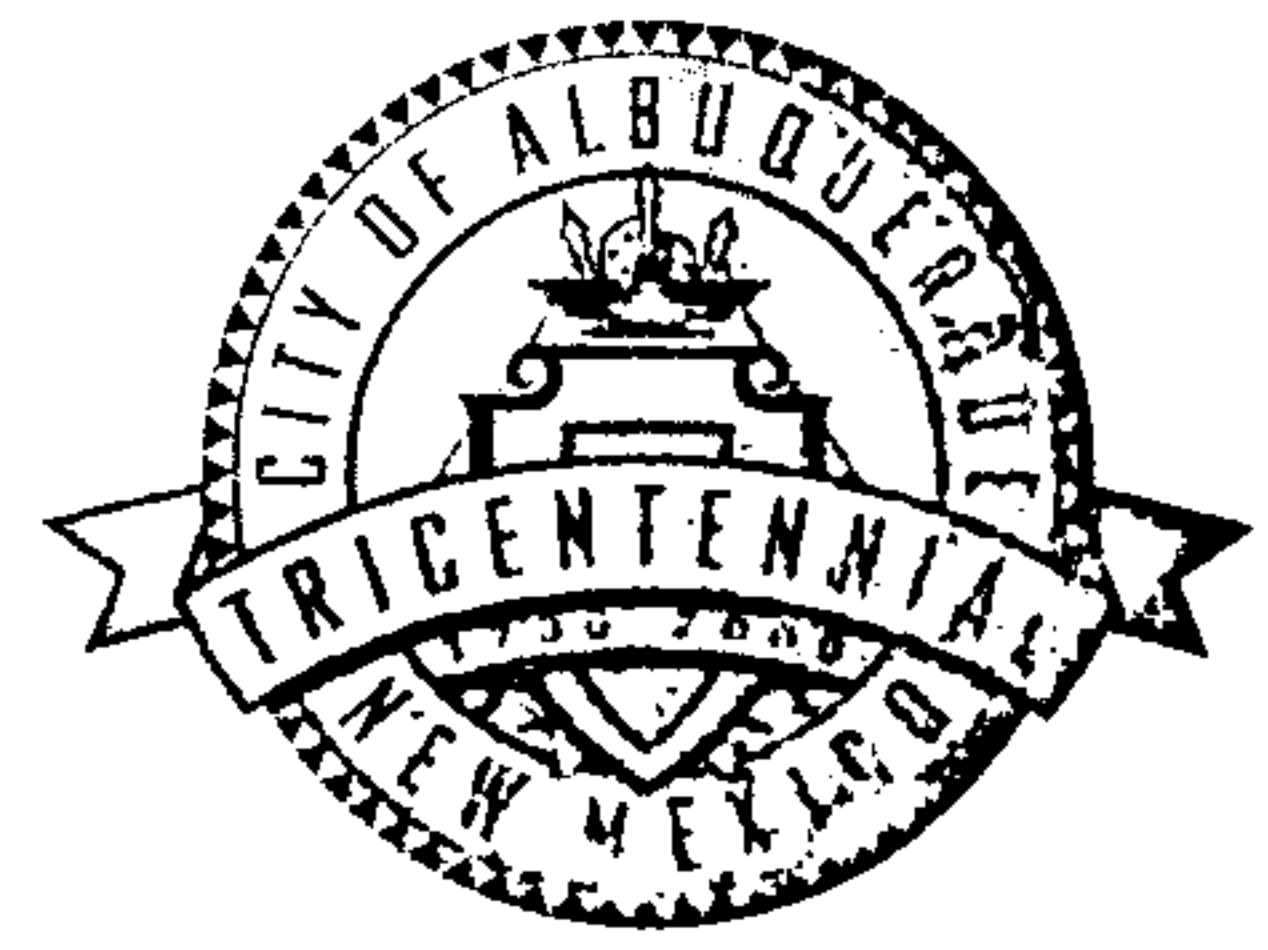
If you have any questions, you can contact me at 924-3695.

Sincerely,

Curtis A. Cherne, E.I.
Engineering Associate, Planning Dept.
Development and Building Services

C: Katrina Sigala
File

CITY OF ALBUQUERQUE



November 21, 2007

Celia S. Tomlinson, P.E.
Rhombus P.A., Inc.
2620-B San Mateo Pl NE
Albuquerque, NM 87110

Re: Wyoming Office Development, Building G
6501 Wyoming Blvd NE
Approval of Permanent Certificate of Occupancy (C.O.)
Engineer's Stamp dated 11/21/05 (E-19/D005A)
Certification dated 11/15/07

Based upon the information provided in your submittal received 8/2/07, the above referenced certification is approved for release of Permanent Certificate of Occupancy by Hydrology.

P.O. Box 1293

If you have any questions, you can contact me at 924-3982.

Albuquerque

Sincerely,

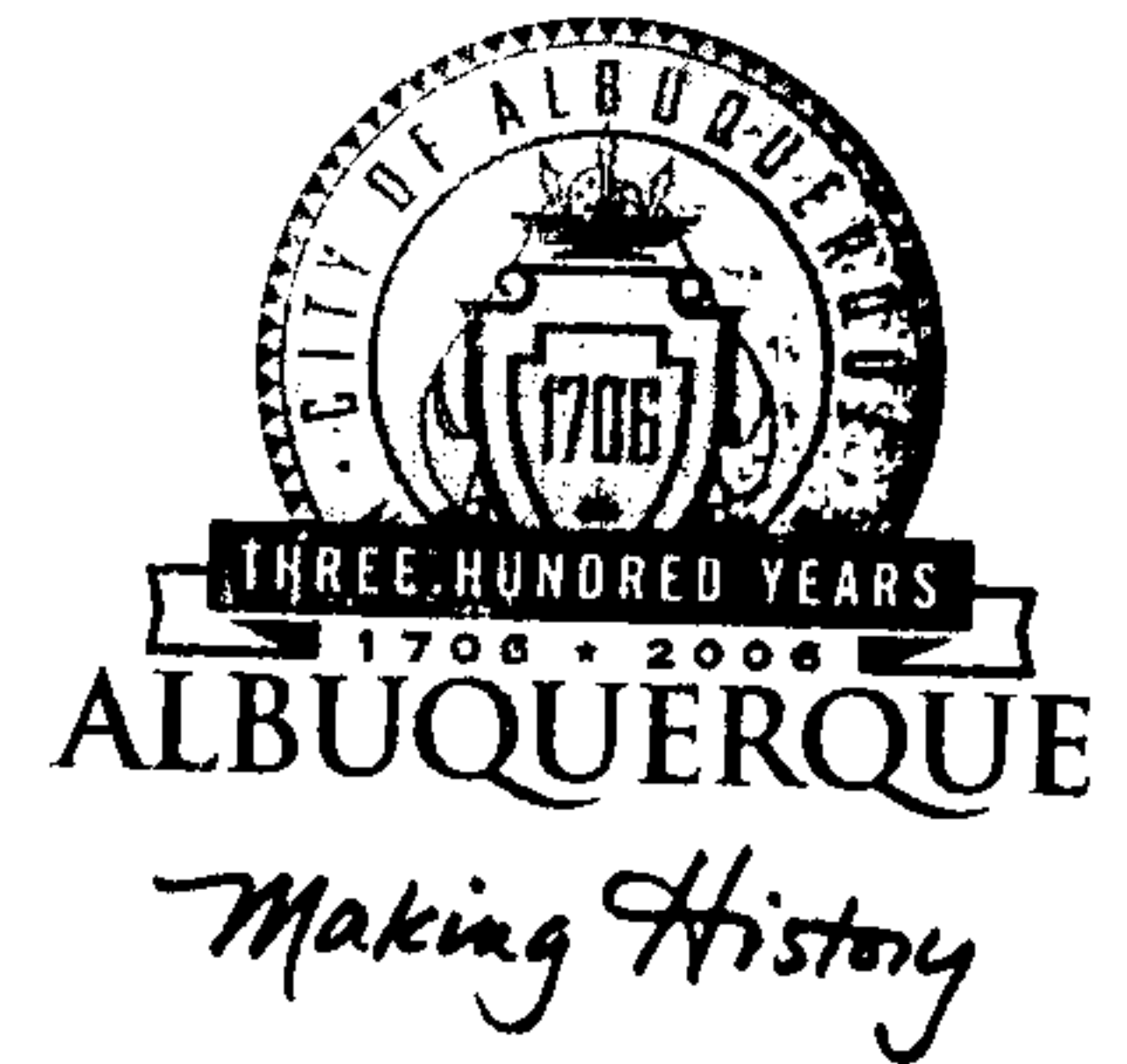

New Mexico 87103

Timothy Sims
Plan Checker, Planning Dept.
Development and Building Services

www.cabq.gov

C: CO Clerk – Katrina Sigala
File

CITY OF ALBUQUERQUE



April 20, 2005

Lawrence Read, P.E.
Larry Read & Associates Inc.
4800 Juan Tabo NE, Suite C
Albuquerque, NM 87111

Re: Wyoming Office Park, 6501 Wyoming Boulevard NE, Site Development Plan

Engineer's Stamp dated 4-04-05 (E19-D5A)

Dear Mr. Read,

Based upon the information provided in your submittal received 4-04-05, the above referenced plan is approved for Site Development Plan for Building Permit action by the DRB. However, the above referenced plan cannot be approved for Building Permit until the following comments are addressed:

1. An SO#19 permit will be required for the proposed sidewalk culverts along Burlison Drive. At the next submittal, please include 2 copies of the grading and drainage plan. The SO#19 notes (see attached) must also be included on the grading and drainage plan.
2. Please provide north and south inverts for the proposed sidewalk culverts along Burlison Drive.

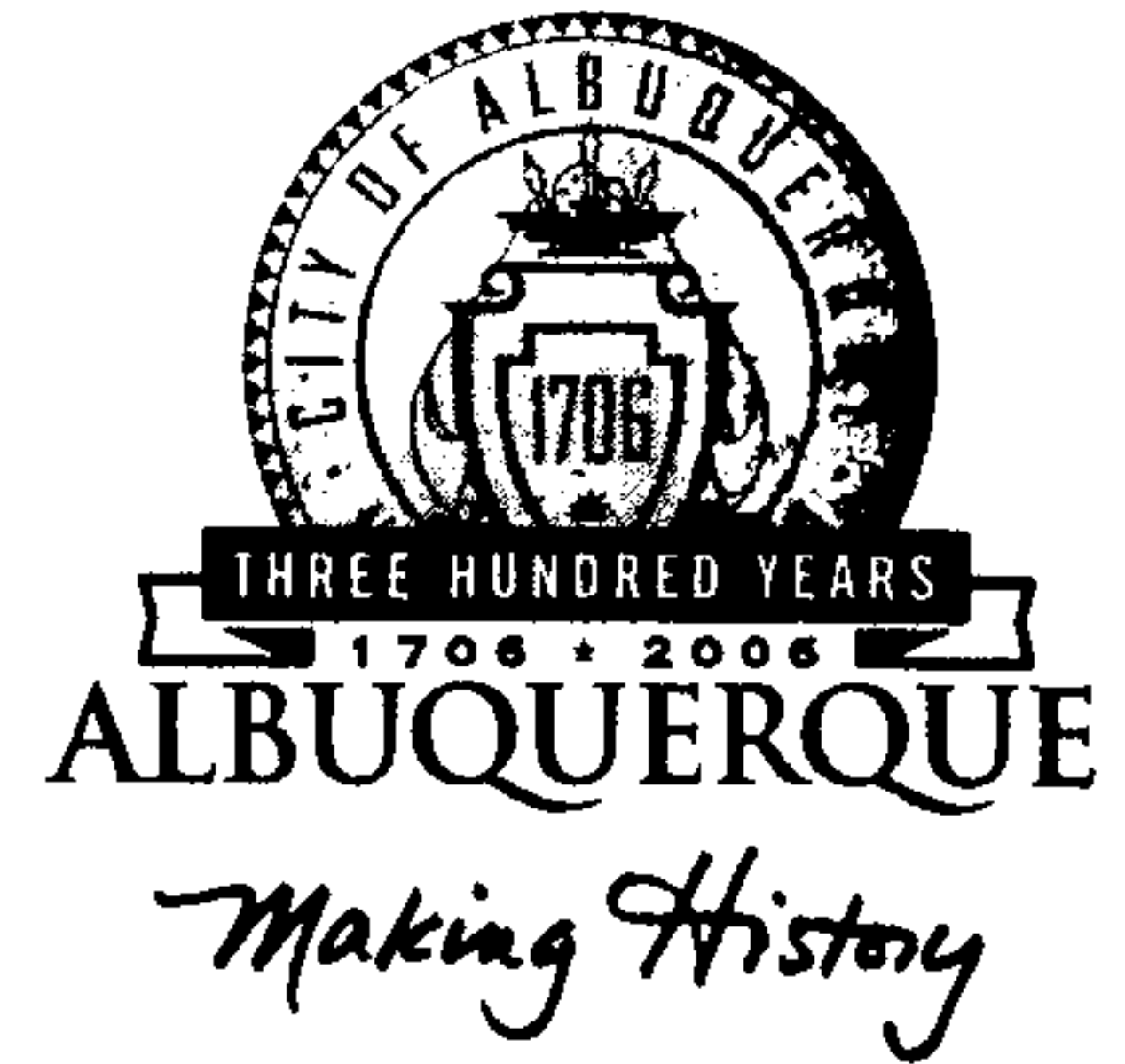
If you have any questions, you can contact me at 924-3981.

Sincerely,

Kristal D. Metro
Engineering Associate, Planning Dept.
Development and Building Services

C: File

CITY OF ALBUQUERQUE



November 29, 2005

Lawrence D. Read, P.E.
Larry Read & Associates
2430 Midtown PL. NE.
Albuquerque, NM 87107

**Re: Wyoming Office Development, 6501 Wyoming Blvd. NE.
Grading and Drainage Plan
Engineer's Stamp dated 11-21-05 (E19-D5A)**

Dear Mr. Read,

Based upon the information provided in your submittal received 11-23-05, the above referenced plan is approved for Building Permit. This plan takes precedence over all other plans submitted to this office. Please attach a copy of this approved plan to the construction sets prior to sign-off by Hydrology. **Prior to Certificate of Occupancy release, Engineer Certification per the DPM checklist will be required.**

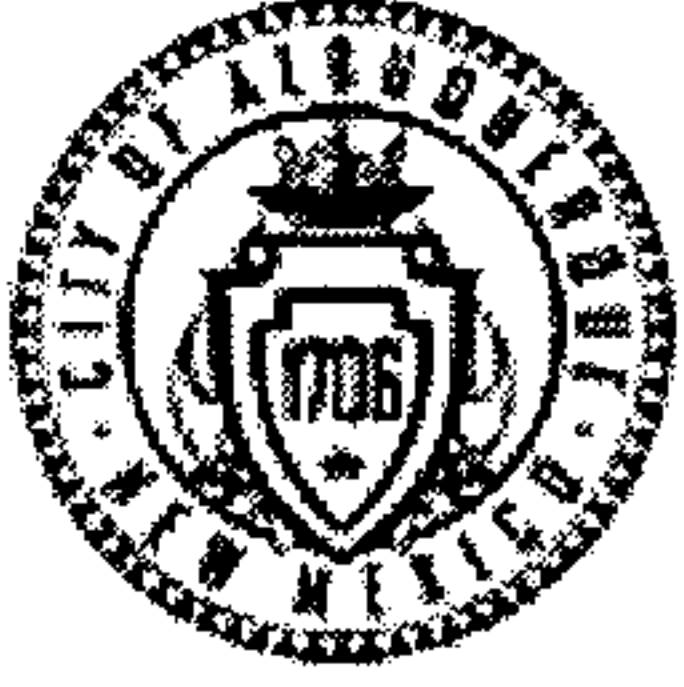
This project requires a National Pollutant Discharge Elimination System (NPDES) permit. If you have any questions regarding this permit please feel free to call the DMD Storm Drainage Design section at 768-3654 (Charles Caruso).

If you have any questions, you can contact me at 924-3695.

Sincerely,

Rudy E. Rael, Associate Engineer
Planning Department.
Development and Building Services

C: Charles Caruso, DMD Storm Drainage Design
File



Arlene V.
Portillo/PWD/CABQ
09/05/2006 10:46 AM

To info@bdaarc.com
cc nsalgado@cabq.gov@COA
bcc Arlene V. Portillo/PWD/CABQ
Subject CO, Wyoming Office Dev. E-19/D5A

To: Paul M. Gladysz, AIA, CSI, ICC:

We are in receipt of the fax sent to us, August 31, 2006. The following is needed for Temporary or Permanent Certificate of Occupancy for your project, Wyoming Office Development, Bldg A, E-19/D5A.

TRAFFIC:

1. A copy of the **DRB** Approved Site Development Plan. Redline any changes made and/or needed at the site on the copy.
2. A "Traffic Certification" (see attached **SAMPLE** of format/language). The Certification must be on Company Letterhead and must be an **ORIGINAL**; not a copy or fax.
3. A "Drainage & Transportation Information Sheet" filled out. (see attached).

Place of submittal is: City of Albuquerque, Planning Department, Development/Building Services, Suite 201, Attention: Arlene Portillo, 600 Second Street NW, Albuquerque, New Mexico 87102.

If you require further assistance, please do not hesitate to call me at 505-924-3982. Thanks!



Drainage Info Sheet.doc



CO TCL.doc

Arlene V. Portillo, Plan Checker
Planning Department, Hydrology Section
e-mail - aportillo@cabq.gov
Office Phone 505-924-3982; Fax 505-924-3864

Wayne Usick & Associates



Post-It® Fax Note	7871	Date	8-31-06	# of pages	1
To	Bradley Bingham		From	Paul Gladysz	
Co./Dept.	HYDROLOGY		Co.	BDA	
Phone #			Phone #	858-0180	
Fax #	924-3864		Fax #	858-0111	

Re: Parker Davis Office Condominiums
6501 Wyoming NE, Albuquerque, NM
Case # DRB - 1000692

TLC CERTIFICATION (Building A only)

31 August 2006

To Whom It May Concern:

I, Paul Gladysz, NM Registration #004058, of the firm BDA Architecture, PC hereby certify that the subject portion of this project has been constructed in substantial compliance with and in accordance with the design intent of the approved plan dated 05/10/05. The record information edited onto the original design document has been obtained by Paul Gladysz, #004058, of the firm BDA Architecture. I further certify that I have determined by visual inspection that the provided data is representative of actual site conditions and is true and correct to the best of my knowledge and belief (exception listed below). This certification is submitted in support of a request for a Temporary Certificate of Occupancy. Certification for the final Certification of Occupancy will be conditioned on the proper completion of the listed exceptions, and correction of any other discrepancy that may become known to me.

Exception: 1. None noted.

The record information presented hereon is not necessarily complete and intended only to verify substantial compliance of the Traffic Circulation Layout aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose.

Sincerely,

Paul Gladysz, AIA, CSI, ICC
NM #004058

BDA Architecture, P.C.
901 Lomberton Place NE
Albuquerque, NM 87107

Tel 505.858.0180
Fax 505.858.0111
info@bdaarc.com



City of Albuquerque

P.O. BOX 1293 ALBUQUERQUE, NEW MEXICO 87103

February 28, 2001

Larry Read & Associates
8100-M4 Wyoming Blvd.
Albuquerque, NM 87113

**RE: CONCEPTUAL GRADING & DRAINAGE PLAN FOR BEAR CANYON VILLAGE
(6501 Wyoming NE), (E19/D005A), ENGINEER'S PLAN STAMP DATED
02/09/01.**

Dear Mr. Read,

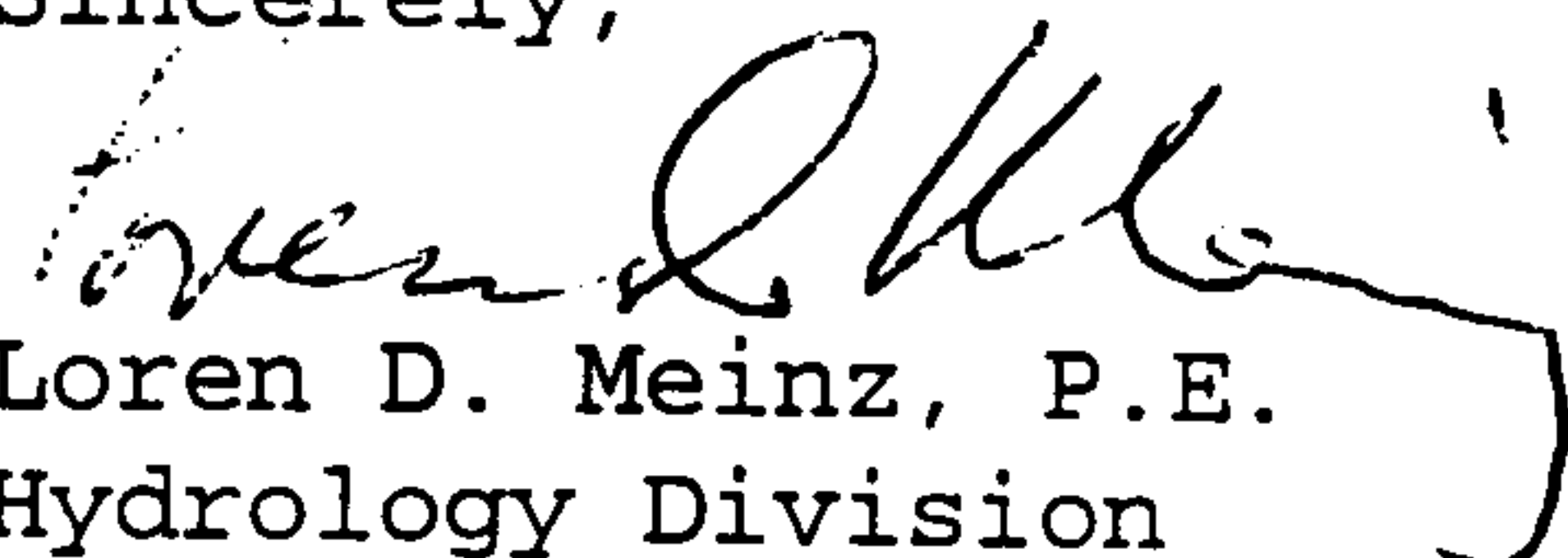
The referenced Conceptual Grading and Drainage Plan is approved for Site Plan for Building Permit action at DRB.

Final detailed grading and drainage plans will be required prior to issuance of building permits.

Prior to Certificate of Occupancy, an Engineer's Certification for completion of site grading and drainage per the plan is required for Hydrology approval.

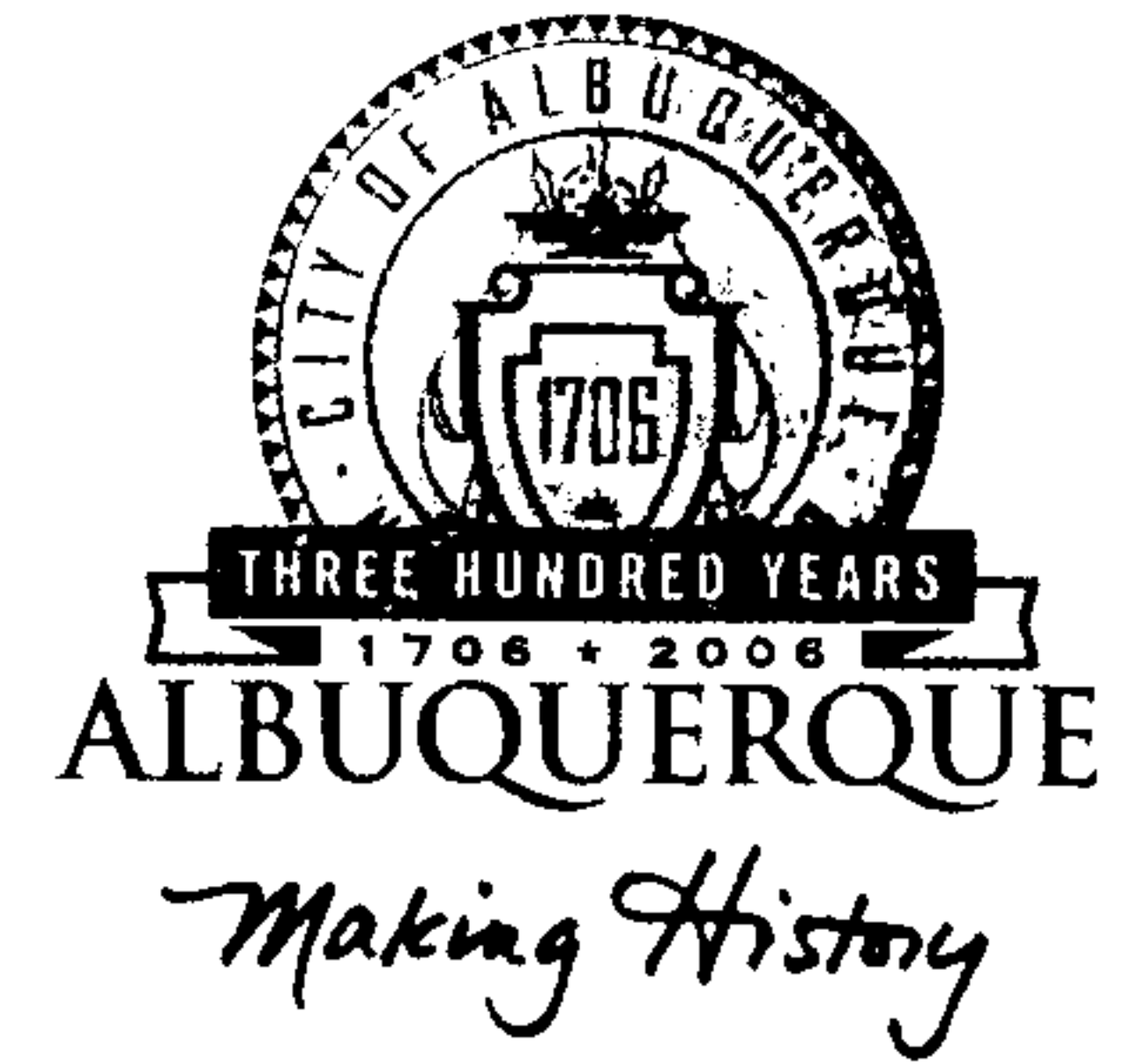
If you have any questions, please call me at 924-3980.

Sincerely,


Loren D. Mainz, P.E.
Hydrology Division

c: Terri Martin
File

CITY OF ALBUQUERQUE



August 23, 2005

Lawrence D. Read, P.E.
Larry Read & Associates, Inc.
4800 Juan Tabo NE – Suite C
Albuquerque, NM 87111

**Re: Wyoming Office Development, 6501 Wyoming Blvd. NE
Grading and Drainage Plan - Engineer's Stamp dated 5-18-05 (E19-D5A)**

Dear Mr. Read,

Based upon the information provided in your submittal dated 7-25-05, the above referenced plan is approved for Building Permit. Please attach a copy of this approved plan to the construction sets prior to sign-off by Hydrology.

Additionally, this project requires a National Pollutant Discharge Elimination System (NPDES) permit. Refer to the attachment that is provided with this letter for details. If you have any questions please feel free to call the Municipal Development Department, Hydrology section at 768-3654 (Charles Caruso).

If you have any questions, you can contact me at 924-3990.

Sincerely,

Phillip J. Lovato, E.I., C.F.M.
Engineering Associate, Hydrology,
Development and Building Services,
Planning Department

cc: file
Charles Caruso, DMD

P.O. Box 1293

Albuquerque

New Mexico 87103

www.cabq.gov



City of Albuquerque

P.O. BOX 1293 ALBUQUERQUE, NEW MEXICO 87103

July 12, 2001

Larry Read, P.E.
Larry Read & Associates, P.A.
8100-M4 Wyoming Blvd NE, #194
Albuquerque, NM 87113

**Re: 6501 Wyoming Blvd NE Grading & Drainage Plan, Engineer's stamp dated 6-18-01
(E19/D005A)**

Dear Mr. Read,

Based on the information provided in your submittal dated June 19, 2001, the above-referenced project is approved for Building Permit. Please attach a copy of this approved plan to the construction sets prior to sign-off by Hydrology.

In addition, the submittal is approved for an SO-19 permit, which is required for construction within the city right-of-way.

Prior to release of the Certificate of Occupancy, an Engineer's Certification of the grading and drainage plan, per the DPM checklist, and a copy of the grading and drainage plan, with approval sign-off by the City's field inspector for the SO-19, will be required.

If you have any questions, please call me at 924-3988.

Sincerely,

Nancy Musinski, P.E.
Hydrology/Utility Development
City of Albuquerque Public Works

xc: Pam Lujan-Permits, w/attachment

File

DRAINAGE INFORMATION SHEET

PROJECT TITLE: 6505 WYOMING

DRB #: _____ EPC#: _____

ZONE MAP/DRG. FILE #: E-19/D005A
WORK ORDER#: _____

LEGAL DESCRIPTION: _____

CITY ADDRESS: _____

ENGINEERING FIRM: LARRY READ & ASSOC.

ADDRESS: Box 194 8400-174 WYOMING
CITY, STATE: ALB, WY

CONTACT: LARRY READ
PHONE: 237-8421
ZIP CODE: 87113

OWNER: _____

ADDRESS: _____
CITY, STATE: _____

CONTACT: _____
PHONE: _____
ZIP CODE: _____

ARCHITECT: NOLBROOK DESIGN

ADDRESS: 1717 12th Street Dr SE
CITY, STATE: ALB, WY

CONTACT: GARY NOLBROOK
PHONE: 260-5721
ZIP CODE: 87108

SURVEYOR: _____

ADDRESS: _____
CITY, STATE: _____

CONTACT: _____
PHONE: _____
ZIP CODE: _____

CONTRACTOR: _____

ADDRESS: _____
CITY, STATE: _____

CONTACT: _____
PHONE: _____
ZIP CODE: _____

TYPE OF SUBMITTAL:

- ☒ DRAINAGE REPORT
- ☐ DRAINAGE PLAN
- ☐ CONCEPTUAL GRADING & DRAINAGE PLAN
- ☒ GRADING PLAN
- ☐ EROSION CONTROL PLAN
- ☐ ENGINEER'S CERTIFICATION
- ☐ CLOMR/LOMR
- ☐ OTHER

WAS A PRE-DESIGN CONFERENCE ATTENDED:

- ☒ YES
- ☒ NO
- ☐ COPY PROVIDED

CHECK TYPE OF APPROVAL SOUGHT:

- ☐ SIA / FINANCIAL GUARANTEE RELEASE
- ☐ PRELIMINARY PLAT APPROVAL
- ☐ S. DEV. PLAN FOR SUB'D. APPROVAL
- ☐ S. DEV. PLAN FOR BLDG. PERMIT APPROVAL
- ☐ SECTOR PLAN APPROVAL
- ☐ FINAL PLAT APPROVAL
- ☐ FOUNDATION PERMIT APPROVAL
- ☒ BUILDING PERMIT APPROVAL
- ☒ CERTIFICATE OF OCCUPANCY APPROVAL
- ☐ GRADING PERMIT APPROVAL
- ☐ PAVING PERMIT APPROVAL
- ☐ WORK ORDER APPROVAL
- ☒ OTHER (SPECIFY) 59719

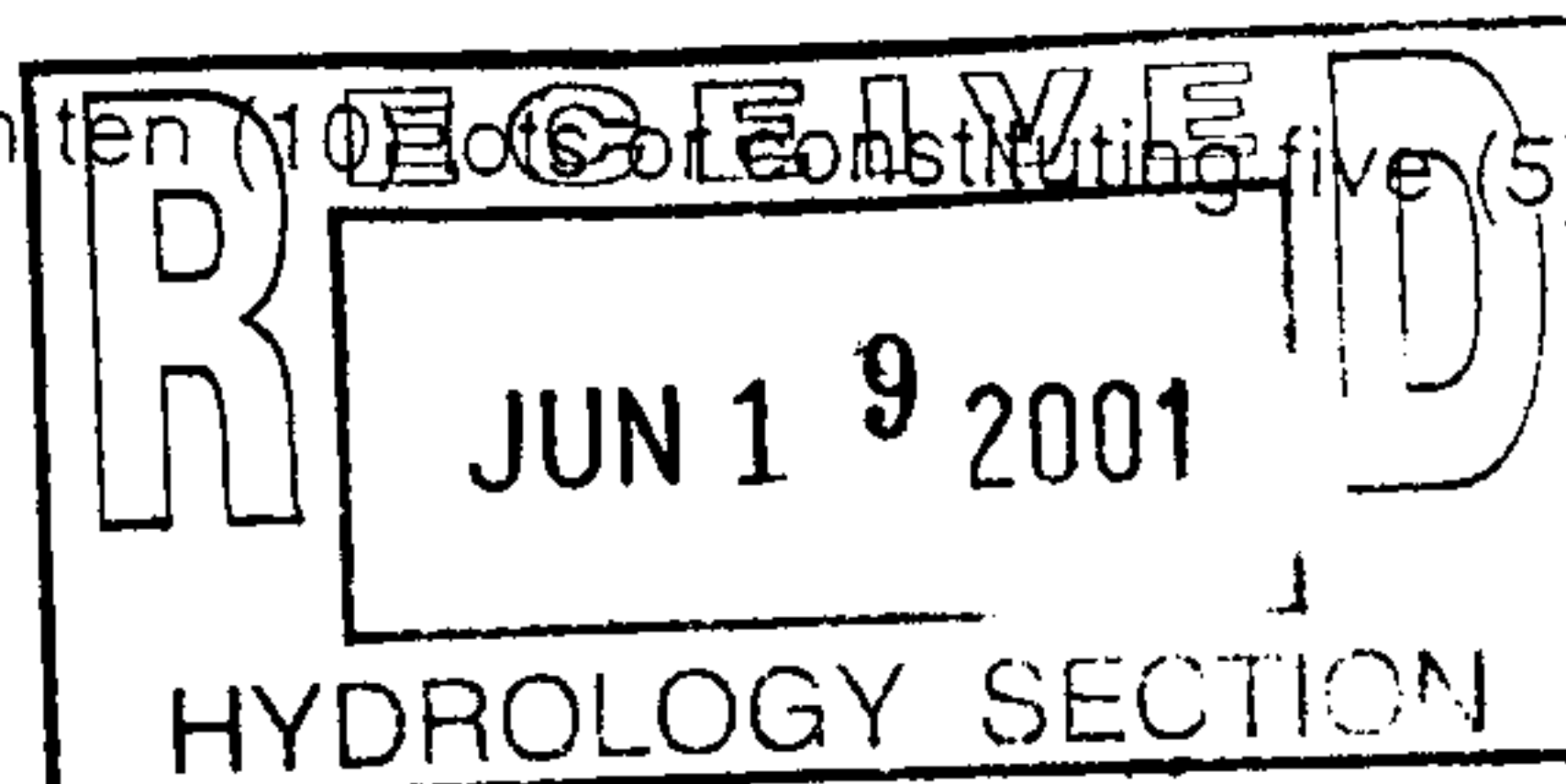
DATE SUBMITTED: 6/18/01

BY: _____

[Signature]

Requests for approvals of Site Development Plans and/or Subdivision Plats shall be accompanied by a drainage submittal. The particular nature, location and scope of the proposed development defines the degree of drainage detail. One or more of the following levels of submittal may be required based on the following:

1. Conceptual Grading and Drainage Plan: Required for approval of Site Development Plans greater than five (5) acres and Sector Plans.
2. Drainage Plans: Required for building permits, grading permits, paving permits and site plans less than five (5) acres.
3. Drainage Report: Required for subdivisions containing more than ten (10) lots or constituting five (5) acres or more.



DRAINAGE REPORT

for

***6501 WYOMING BLVD., NE
(TRACT A-1A, ACADEMY ACRES),
ALBUQUERQUE, NEW MEXICO***

June 18, 2001



Prepared by
Larry D. Read, P.E.
#194 8100-M4 Wyoming Blvd., N.E.
Albuquerque, New Mexico 87113
(505) 237-8421

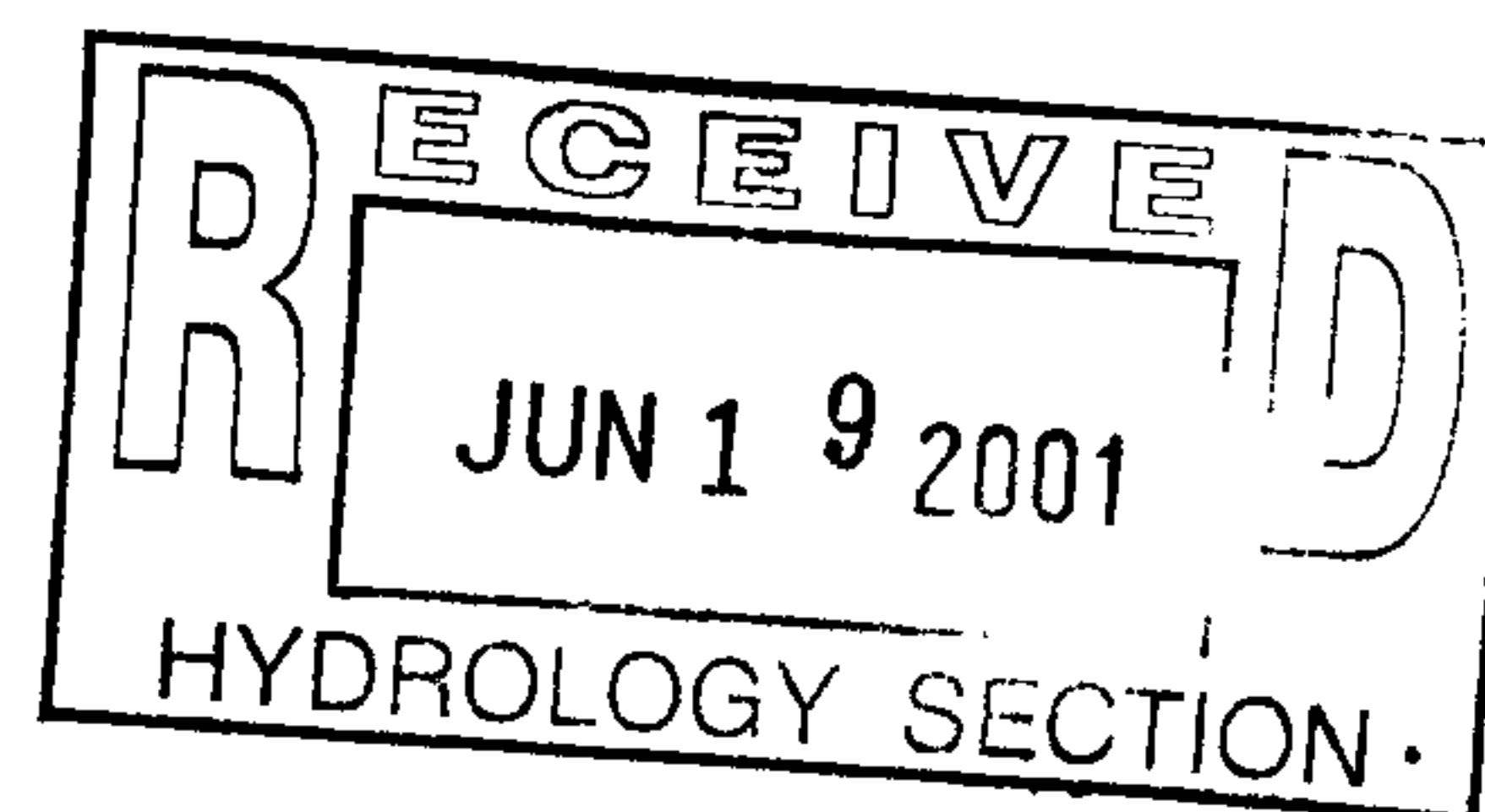


TABLE OF CONTENTS

<u>Item</u>	<u>Description</u>	<u>Page Number</u>
•	Location and Description	1
•	Floodplain Status	1
•	Methodology	1
•	Precipitation	1
•	Existing Drainage	3
•	Fully Developed Conditions	3

EXHIBITS

1	Vicinity Map	2
2	FIRM Map Panel	4
3	Drainage Basin Map - Existing Conditions	5
4	Drainage Basin Map - Developed Conditions	6
5	Grading and Drainage Plan	Pocket

APPENDICES

A	Ahymo Analysis - Existing Conditions
B	Ahymo Analysis - Developed Conditions
C	Miscellaneous Calculations

DRAINAGE REPORT

for

***6501 WYOMING BLVD., NE
(TRACT A-1A, ACADEMY ACRES),
ALBUQUERQUE, NEW MEXICO***

June 18, 2001

LOCATION & DESCRIPTION

The site is located at the northwest corner of Wyoming Blvd. NE and Burlison Drive NE as shown on **Exhibit 1**.

The proposed site was originally developed as a church facility including two buildings (Pad C and Pad f) that will remain with associated paved parking lots, sidewalks, and an internal paved drive in the south portion of the site. This portion of the site is approximately 84% (31468 sf) impervious area. Additionally, the north portion of the site has been graded and compacted such that for existing analysis, the land treatment has been considered mostly Type B.

The original planned facilities on-site are unknown because plans could not be located.

The proposed development will infill the site with eight additional buildings and associated paved parking areas, sidewalks, and drives as shown on the Grading Plan in the Pocket of this report.

FLOODPLAIN STATUS

This property, as shown on FIRM Map Panel 35001C0143-D, effective September 20, 1996, is not within a designated floodplain. **Exhibit 2** shows the subject property on this panel.

METHODOLOGY

The hydrology for this project was analyzed using the Quick Calculation Method as documented in the June 1997 release of the City of Albuquerque Development Process Manual, Section 22.2.

PRECIPITATION

The 100-yr 6-hour duration storm was used as the design storm for this analysis since free discharge is proposed. This site is within Zone 3 as identified in the City of Albuquerque Development Process

Manual, Section 22.2. Tables within this section were used to establish the 6-hour precipitation, excess precipitation, and peak discharge.

EXISTING DRAINAGE

The southern 0.86 acres (Basin A - developed) of the existing site is graded such that most of the runoff is directed southwest into Burlison.

The northern 3.48 acres (Basin B) is graded such that the runoff is directed toward the northwest corner of the site where a concrete lined channel conveys it west, between two existing residences and into Vista Del Monte Street where it combines (in the street network) with the runoff from the residential subdivision.

The site is not impacted by any off-site drainage basins since Wyoming is graded to convey all runoff within the street section to the north. A significant waterblock has been constructed on Burlison Dr. just west of Wyoming to prevent runoff in Wyoming from entering Burlison.

There are two off-site basins affected by the runoff from this site as shown on Exhibits 3 and 4. The northern portion of this site discharges into the street network in Basin C via a concrete lined channel in the northwest corner of this site. The second basin affected by this site is Basin D where the runoff from the southern portion of this site is conveyed within Burlison.

The combined runoff from all four basins ultimately is collected in a side channel spillway on Burlison just west of Harper.

FULLY DEVELOPED CONDITION

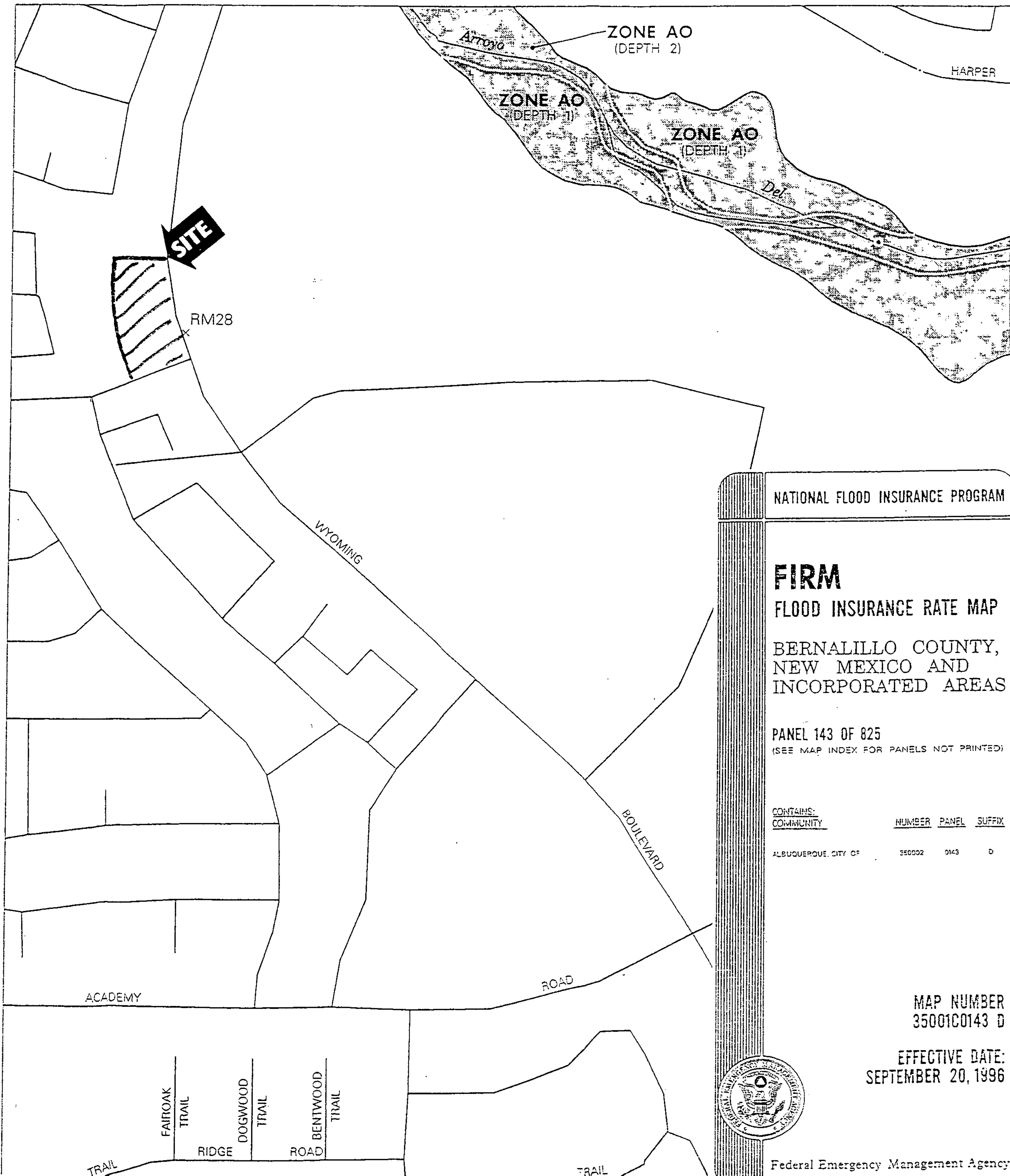
The proposed development will infill the parcel with eight additional buildings and associated paved parking, sidewalks, streets, and an open space area as shown on the Grading Plan. The proposed grading plan has moved the grade break to the north of the central roadway to avoid contributing additional runoff to the existing concrete channel (in the northwest corner of this site) and the residential subdivision (Basin C).

The remainder of the runoff is directed to the south where it will discharge into Burlison via four parallel 24" sidewalks at the southwest corner of this site.

As a result of this proposed development, the 100-year storm event runoff will increase the runoff in Burlison Drive by 5.93 cfs or about 3.5% of the total flow. As shown in the Ahymo analysis in Appendix A and B the depth of flow in Burlison is 0.72' in both the Existing and Developed conditions. In both cases, the depth of flow is such that the runoff will spill over the crown into southern portion of the street section but will remain less than the 0.87' allowable. Additionally, in both the Existing and Developed conditions during a 10-year storm, the north portion of Burlison will be flooded but the center (left turn lane) and the center thru lane on the south side of the street will remain dry.

06°33'45"

2"



NATIONAL FLOOD INSURANCE PROGRAM

FIRM

FLOOD INSURANCE RATE MAP

BERNALILLO COUNTY,
NEW MEXICO AND
INCORPORATED AREAS

PANEL 143 OF 825

(SEE MAP INDEX FOR PANELS NOT PRINTED)

CONTAINS:
COMMUNITY

NUMBER PANEL SUFFIX

ALBUQUERQUE, CITY OF

350002

0143

D

MAP NUMBER
35001C0143 D

EFFECTIVE DATE:
SEPTEMBER 20, 1996



Federal Emergency Management Agency

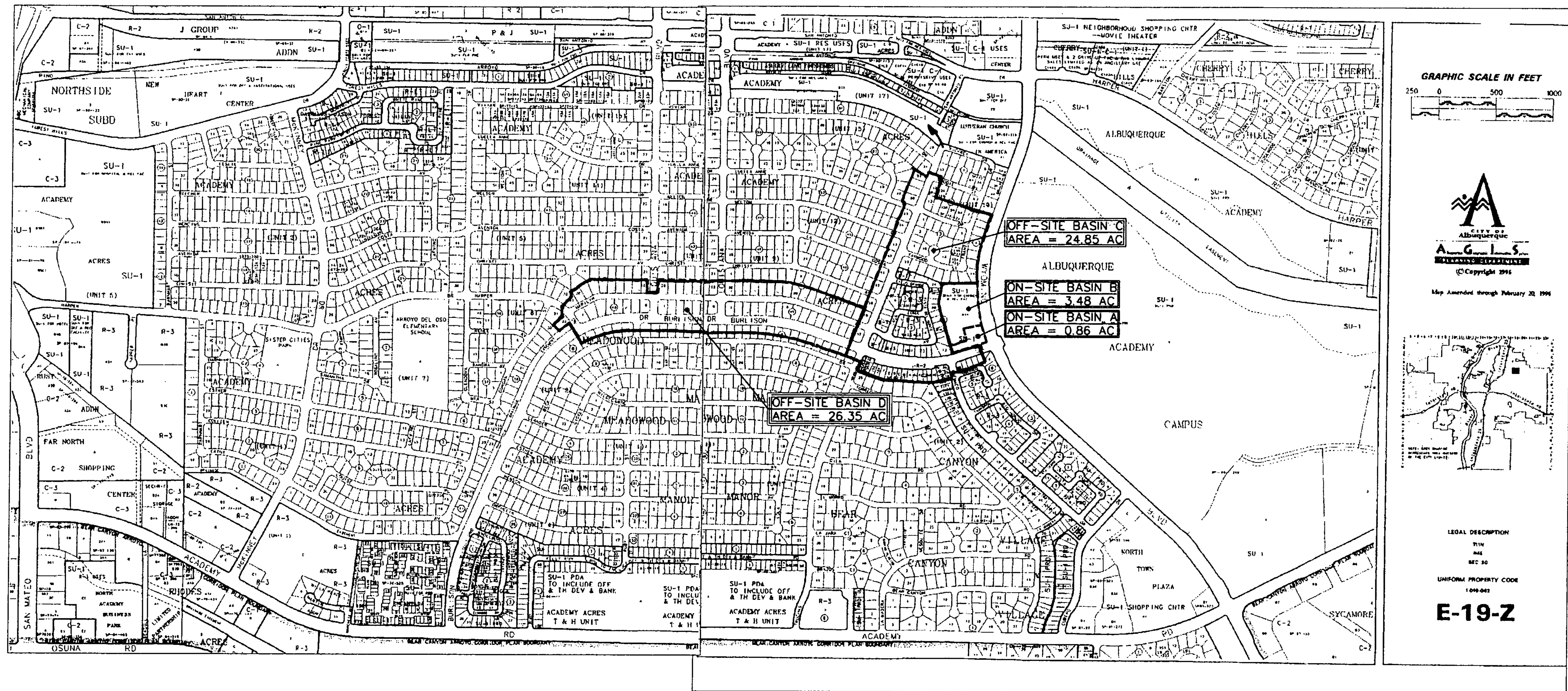


FIGURE 3
EXISTING CONDITIONS

APPENDIX A

EXISTING CONDITIONS - 100-YEAR

AHYMO PROGRAM SUMMARY TABLE (AHYMO 97) -

- VERSION: 1997.02c

RUN DATE (MON/DAY/YR) =06/18/2001

```

PROGRAM: SUMMARY TABLE (AHIMO_97) - - VERSION:
INPUT FILE = D:\ACADPR~1\JIMGR~1\COUCH~1\NEWSIT~1\SITER~1\COUCH~1.DAT

```

USER NO.= AHYMO-I-9702a0100001A-SH

[illegible]

AHYMO PROGRAM (AHYMO_97) - - Version: 1997.02c
 RUN DATE (MON/DAY/YR) = 06/18/2001
 START TIME (HR:MIN:SEC) = 20:53:47 USER NO.= AHYMO-I-9702a0100001A-SH
 INPUT FILE = D:\ACADPR~1\JIMGRE~1\COUCH~1\NEWSIT~1\SITERE~1\COUCH~1.DAT

START TIME=0.0 0 -6
 *S COMPUTE 100 YR. 6 HR. HYDROGRAPHS FOR 6501 WYOMING OFFICE PARK
 *S COUCH-EXIST.DAT - HYMO PER JAN 1993 DPM REVISIONS
 *S
 *S

RAINFALL TYPE=-1 RAIN QUAR=0 RAIN ONE=1.87 RAIN SIX=2.20
 RAIN DAY=2.66 DT=0.0333333333

COMPUTED 6-HOUR RAINFALL DISTRIBUTION BASED ON NOAA ATLAS 2 - PEAK AT 1.40 HR.
 DT = .033333 HOURS END TIME = 6.000000 HOURS

*S
 *S COMPUTE RUNOFF FOR EXISTING CONDITIONS
 *S

*S BASIN A (ON-SITE)
 COMPUTE NM HYD ID=1 HYD NO= 101.1 DA=0.001344 SQ MI
 PER A=0 PER B=0 PER C=0.16 PER D=0.84 TP=-0.133
 RAIN=-1

K = .072485HR TP = .133000HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
 UNIT PEAK = 4.4672 CFS UNIT VOLUME = .9970 B = 526.28 P60 = 1.8700
 AREA = .001129 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .105629HR TP = .133000HR K/TP RATIO = .794199 SHAPE CONSTANT, N = 4.514851
 UNIT PEAK = .62756 CFS UNIT VOLUME = .9804 B = 388.14 P60 = 1.8700
 AREA = .000215 SQ MI IA = .35000 INCHES INF = .83000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=1 CODE=10

PARTIAL HYDROGRAPH 101.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	1.0	2.667	.1	4.000	.0	5.333	.0
.333	.0	1.667	1.8	3.000	.0	4.333	.0	5.667	.0
.667	.0	2.000	.8	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.2	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = 1.81120 INCHES = .1298 ACRE-FEET
PEAK DISCHARGE RATE = 3.57 CFS AT 1.500 HOURS BASIN AREA = .0013 SQ. MI.

*S

*S

*S BASIN OFF B (ON-SITE)

COMPUTE NM HYD ID=2 HYD NO= 102.1 DA=0.005438 SQ MI
PER A=0 PER B=83.3 PER C=0 PER D=16.7 TP=-0.133
RAIN=-1

K = .072485HR TP = .133000HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
UNIT PEAK = 3.5935 CFS UNIT VOLUME = .9962 B = 526.28 P60 = 1.8700
AREA = .000908 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .130697HR TP = .133000HR K/TP RATIO = .982685 SHAPE CONSTANT, N = 3.593454
UNIT PEAK = 11.140 CFS UNIT VOLUME = .9991 B = 327.09 P60 = 1.8700
AREA = .004530 SQ MI IA = .50000 INCHES INF = 1.25000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=2 CODE=10

PARTIAL HYDROGRAPH 102.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	.9	2.667	.1	4.000	.0	5.333	.0
.333	.0	1.667	4.6	3.000	.1	4.333	.0	5.667	.0
.667	.0	2.000	1.2	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.3	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = .88438 INCHES = .2565 ACRE-FEET
PEAK DISCHARGE RATE = 8.42 CFS AT 1.500 HOURS BASIN AREA = .0054 SQ. MI.

*S

COMPUTE LT TP LCODE=1 UPLAND/TAG METHOD
NK=1 ISLOPE=-1
LENGTH=1996 FT SLOPE=0.018 K=3.0
RAIN=-1

Tc AND Tp COMPUTED BY UPLAND/LAG TIME PROCEDURE

SCS UPLAND METHOD FACTORS

	LENGTH (FT)	SLOPE (FT/FT)	COMPOSITE K
SHEET FLOW PORTION	.0	.000000	.0000
SHALLOW FLOW PORTION	.0	.000000	.0000
CHANNEL FLOW PORTION	1996.0	.018000	3.0000

TOTAL BASIN 1996.0 .018000 3.0000

TIME OF CONCENTRATION (HRS)= .1378 TIME TO PEAK (HRS)= .0918 LAG TIME (HRS)= .1033

TIME TO PEAK COMPUTED TO BE LESS THAN 0.133333 HOUR MINIMUM VALUE.

REVISED VALUES: TIME OF CONCENTRATION (HRS)= .2000 TIME TO PEAK (HRS)= .1333 LAG TIME (HRS)= .1500

*S

*S BASIN OFF C (OFF-SITE)

COMPUTE NM HYD ID=3 HYD NO= 103.1 DA=0.038828 SQ MI
PER A=0 PER B=28.62 PER C=28.62 PER D=42.76 TP=0.0
RAIN=-1

TIME TO PEAK (hrs)= .1333

K = .072666HR TP = .133333HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
UNIT PEAK = 65.533 CFS UNIT VOLUME = .9992 B = 526.28 P60 = 1.8700
AREA = .016603 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .118459HR TP = .133333HR K/TP RATIO = .888442 SHAPE CONSTANT, N = 3.992480
UNIT PEAK = 59.119 CFS UNIT VOLUME = 1.000 B = 354.67 P60 = 1.8700
AREA = .022225 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=3 CODE=10

PARTIAL HYDROGRAPH 103.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	42.4	3.333	.4	5.000	.3	6.667	.0
.333	.0	2.000	14.9	3.667	.3	5.333	.3	7.000	.0
.667	.0	2.333	3.6	4.000	.3	5.667	.3		
1.000	.0	2.667	1.5	4.333	.3	6.000	.3		
1.333	15.6	3.000	.7	4.667	.3	6.333	.0		

RUNOFF VOLUME = 1.30789 INCHES = 2.7084 ACRE-FEET
PEAK DISCHARGE RATE = 81.11 CFS AT 1.500 HOURS BASIN AREA = .0388 SQ. MI.

*S

COMPUTE LT TP

LCODE=1 UPLAND/TAG METHOD
NK=1 ISLOPE=-1
LENGTH=2828 FT SLOPE=0.021 K=3.0
RAIN=-1

Tc AND Tp COMPUTED BY UPLAND/LAG TIME PROCEDURE

SCS UPLAND METHOD FACTORS

	LENGTH (FT)	SLOPE (FT/FT)	COMPOSITE K
SHEET FLOW PORTION	.0	.000000	.0000
SHALLOW FLOW PORTION	.0	.000000	.0000
CHANNEL FLOW PORTION	2828.0	.021000	3.0000
TOTAL BASIN	2828.0	.021000	3.0000

TIME OF CONCENTRATION (HRS)= .1807 TIME TO PEAK (HRS)= .1205 LAG TIME (HRS)= .1355

TIME TO PEAK COMPUTED TO BE LESS THAN 0.133333 HOUR MINIMUM VALUE.

REVISED VALUES: TIME OF CONCENTRATION (HRS)= .2000 TIME TO PEAK (HRS)= .1333 LAG TIME (HRS)= .1500

*S

*S BASIN OFF D (OFF-SITE)

COMPUTE NM HYD ID=4 HYD NO= 104.1 DA=0.041172 SQ MI
 PER A=0 PER B=32.46 PER C=32.46 PER D=35.08 TP=0.0
 RAIN=-1

TIME TO PEAK (hrs)= .1333

K = .072666HR TP = .133333HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
 UNIT PEAK = 57.008 CFS UNIT VOLUME = .9992 B = 526.28 P60 = 1.8700
 AREA = .014443 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .118459HR TP = .133333HR K/TP RATIO = .888442 SHAPE CONSTANT, N = 3.992480
 UNIT PEAK = 71.099 CFS UNIT VOLUME = 1.000 B = 354.67 P60 = 1.8700
 AREA = .026729 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=4 CODE=10

PARTIAL HYDROGRAPH 104.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	43.2	3.333	.4	5.000	.2	6.667	.0
.333	.0	2.000	14.0	3.667	.3	5.333	.3	7.000	.0
.667	.0	2.333	3.5	4.000	.3	5.667	.3		
1.000	.0	2.667	1.4	4.333	.2	6.000	.3		
1.333	14.0	3.000	.7	4.667	.2	6.333	.0		

RUNOFF VOLUME = 1.21949 INCHES = 2.6778 ACRE-FEET
 PEAK DISCHARGE RATE = 82.09 CFS AT 1.500 HOURS BASIN AREA = .0412 SQ. MI.

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
 MIN ELEV=99.14 MAX ELEV=100
 CHNL SLP=0.0425 FP SLP=0.0425 N=0.017 DIST=40.01
 DIST ELEV DIST ELEV DIST ELEV
 0 100.00 10.0 98.80 10.81 99.14
 40.01 99.74

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.84	3.97	6.22
99.23	1.18	5.55	8.80
99.28	1.64	8.07	11.38
99.32	2.21	11.63	13.96
99.37	2.90	16.34	16.54
99.41	3.71	22.33	19.12
99.46	4.64	29.74	21.70
99.50	5.68	38.69	24.28
99.55	6.83	49.29	26.86
99.59	8.11	61.67	29.44
99.64	9.50	75.94	32.02
99.68	11.01	92.20	34.60
99.73	12.63	110.57	37.18
99.77	14.35	134.43	38.12
99.82	16.08	161.53	38.50
99.86	17.83	190.65	38.88
99.91	19.60	221.76	39.26
99.95	21.39	254.80	39.63
100.00	23.19	289.75	40.01

*S

COMPUTE TRAVEL TIME ID=63 REACH NO=1 NO VS=1 L=954 FT
 SLP=0.0425

TRAVEL TIME TABLE

REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ.FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.843	3.97	.0563
.091	1.183	5.55	.0565
.136	1.640	8.07	.0538
.181	2.213	11.63	.0505
.226	2.904	16.34	.0471
.272	3.711	22.33	.0440
.317	4.635	29.74	.0413
.362	5.676	38.69	.0389
.407	6.834	49.29	.0367
.453	8.108	61.67	.0348
.498	9.499	75.94	.0331

.543	11.007	92.20	.0316
.588	12.632	110.57	.0303
.634	14.346	134.43	.0283
.679	16.080	161.53	.0264
.724	17.831	190.65	.0248
.770	19.600	221.76	.0234
.815	21.385	254.80	.0222
.860	23.188	289.75	.0212

ROUTE ID=64 HYD=264.1 IN ID=1 DT=0.0
 PRINT HYD ID=64 CODE=10

PARTIAL HYDROGRAPH 264.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	.6	2.667	.1	4.000	.0	5.333	.0
.333	.0	1.667	2.3	3.000	.0	4.333	.0	5.667	.0
.667	.0	2.000	.9	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.2	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = 1.81138 INCHES = .1298 ACRE-FEET
 PEAK DISCHARGE RATE = 3.14 CFS AT 1.567 HOURS BASIN AREA = .0013 SQ. MI.

ADD HYD ID=60 HYD NO=160.1 ID I=64 ID II=3

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
 MIN ELEV=99.14 MAX ELEV=100
 CHNL SLP=0.019 FP SLP=0.019 N=0.017 DIST=30.01

DIST	ELEV	DIST	ELEV	DIST	ELEV
0	100.00	10.0	98.80	10.81	99.14
30.01	99.74				

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.83	2.79	5.47
99.23	1.11	3.80	7.29
99.28	1.49	5.30	9.12
99.32	1.94	7.33	10.95
99.37	2.48	9.94	12.77
99.41	3.10	13.20	14.60
99.46	3.80	17.17	16.42
99.50	4.58	21.89	18.25
99.55	5.45	27.43	20.07
99.59	6.40	33.84	21.90
99.64	7.43	41.17	23.73
99.68	8.55	49.47	25.55

99.73	9.75	58.80	27.38
99.77	11.01	70.75	28.12
99.82	12.29	84.25	28.50
99.86	13.59	98.73	28.88
99.91	14.90	114.18	29.26
99.95	16.24	130.58	29.63
100.00	17.59	147.91	30.01

*S

COMPUTE TRAVEL TIME ID=65 REACH NO=1 NO VS=1 L=1466 FT
 SLP=0.019

TRAVEL TIME TABLE
 REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ.FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.826	2.79	.1205
.091	1.114	3.80	.1193
.136	1.486	5.30	.1141
.181	1.940	7.33	.1078
.226	2.477	9.94	.1014
.272	3.096	13.20	.0955
.317	3.798	17.17	.0901
.362	4.583	21.89	.0853
.407	5.451	27.43	.0809
.453	6.401	33.84	.0770
.498	7.433	41.17	.0735
.543	8.548	49.47	.0704
.588	9.746	58.80	.0675
.634	11.009	70.75	.0634
.679	12.290	84.25	.0594
.724	13.589	98.73	.0560
.770	14.905	114.18	.0532
.815	16.238	130.58	.0506
.860	17.587	147.91	.0484

ROUTE ID=66 HYD=266.1 IN ID=2 DT=0.0
 PRINT HYD ID=66 CODE=10

PARTIAL HYDROGRAPH 266.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	5.8	3.333	.0	5.000	.0	6.667	.0
.333	.0	2.000	1.9	3.667	.0	5.333	.0		
.667	.0	2.333	.6	4.000	.0	5.667	.0		
1.000	.0	2.667	.2	4.333	.0	6.000	.0		
1.333	.3	3.000	.1	4.667	.0	6.333	.0		

RUNOFF VOLUME = .88442 INCHES = .2565 ACRE-FEET
 PEAK DISCHARGE RATE = 6.36 CFS AT 1.600 HOURS BASIN AREA = .0054 SQ. MI.

ADD HYD
PRINT HYD

ID=67 HYD NO=167.1 ID I=66 ID II=60
ID=67 CODE 10

PARTIAL HYDROGRAPH 167.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	50.5	3.333	.5	5.000	.3	6.667	.0
.333	.0	2.000	17.7	3.667	.4	5.333	.3	7.000	.0
.667	.0	2.333	4.4	4.000	.3	5.667	.4		
1.000	.0	2.667	1.8	4.333	.3	6.000	.4		
1.333	16.5	3.000	.9	4.667	.3	6.333	.0		

RUNOFF VOLUME = 1.27221 INCHES = 3.0947 ACRE-FEET
PEAK DISCHARGE RATE = 88.34 CFS AT 1.500 HOURS BASIN AREA = .0456 SQ. MI.

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
MIN ELEV=99.14 MAX ELEV=100
CHNL SLP=0.036 FP SLP=0.036 N=0.017 DIST=40.01
DIST ELEV DIST ELEV DIST ELEV
0 100.00 10.0 98.80 10.81 99.14
40.01 99.74

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.84	3.65	6.22
99.23	1.18	5.11	8.80
99.28	1.64	7.43	11.38
99.32	2.21	10.70	13.96
99.37	2.90	15.03	16.54
99.41	3.71	20.55	19.12
99.46	4.64	27.37	21.70
99.50	5.68	35.61	24.28
99.55	6.83	45.37	26.86
99.59	8.11	56.76	29.44
99.64	9.50	69.89	32.02
99.68	11.01	84.86	34.60
99.73	12.63	101.76	37.18
99.77	14.35	123.73	38.12
99.82	16.08	148.66	38.50
99.86	17.83	175.47	38.88
99.91	19.60	204.10	39.26
99.95	21.39	234.51	39.63

*S 100.00 23.19 266.68 40.01
 COMPUTE TRAVEL TIME ID=68 REACH NO=1 NO VS=1 L=2463 FT
 SLP=0.036

TRAVEL TIME TABLE
 REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ.FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.843	3.65	.1580
.091	1.183	5.11	.1584
.136	1.640	7.43	.1510
.181	2.213	10.70	.1415
.226	2.904	15.03	.1321
.272	3.711	20.55	.1235
.317	4.635	27.37	.1159
.362	5.676	35.61	.1091
.407	6.834	45.37	.1031
.453	8.108	56.76	.0977
.498	9.499	69.89	.0930
.543	11.007	84.86	.0887
.588	12.632	101.76	.0849
.634	14.346	123.73	.0793
.679	16.080	148.66	.0740
.724	17.831	175.47	.0695
.770	19.600	204.10	.0657
.815	21.385	234.51	.0624
.860	23.188	266.68	.0595

ROUTE
 PRINT HYD

ID=69 HYD=269.1 IN ID=67 DT=0.0
 ID=69 CODE=10

@ 170.44 cfs 2 - 0.72' < 0.87' ok
 26.31 - .03
 0.045 - (0.008) = .724 =

PARTIAL HYDROGRAPH 269.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	62.6	3.333	.7	5.000	.3	6.667	.0
.333	.0	2.000	23.4	3.667	.5	5.333	.3	7.000	.0
.667	.0	2.333	7.9	4.000	.4	5.667	.3	7.333	.0
1.000	.0	2.667	3.0	4.333	.3	6.000	.4		
1.333	4.8	3.000	1.3	4.667	.3	6.333	.2		

RUNOFF VOLUME = 1.27223 INCHES = 3.0947 ACRE-FEET
 PEAK DISCHARGE RATE = 72.71 CFS AT 1.567 HOURS BASIN AREA = .0456 SQ. MI.

ADD HYD ID=70 HYD NO=170.1 ID I=67 ID II=4
 PRINT HYD ID=70 CODE 10

PARTIAL HYDROGRAPH 170.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	93.6	3.333	.9	5.000	.6	6.667	.0
.333	.0	2.000	31.7	3.667	.7	5.333	.6	7.000	.0
.667	.0	2.333	7.9	4.000	.6	5.667	.6		
1.000	.0	2.667	3.2	4.333	.5	6.000	.7		
1.333	30.5	3.000	1.5	4.667	.5	6.333	.1		

RUNOFF VOLUME = 1.24720 INCHES = 5.7725 ACRE-FEET
 PEAK DISCHARGE RATE = 170.44 CFS AT 1.500 HOURS BASIN AREA = .0868 SQ. MI.

FINISH

NORMAL PROGRAM FINISH

END TIME (HR:MIN:SEC) = 20:53:47

EXISTING CONDITIONS - 10-YEAR

AHYMO PROGRAM SUMMARY TABLE (AHYMO 97) -

- VERSION: 1997.02c

RUN DATE (MON/DAY/YR) =06/18/2001
USER NO.= AHYMO-I-9702a0100001A-SH

INPUT FILE = D:\ACADPR~1\JIMGRE~1\COUCH~1\NEWSIT~1\SITERE~1\COUCH~4.DAT

[illegible]

AHYMO PROGRAM (AHYMO_97) - - Version: 1997.02c
 RUN DATE (MON/DAY/YR) = 06/18/2001
 START TIME (HR:MIN:SEC) = 20:48:47 USER NO.= AHYMO-I-9702a0100001A-SH
 INPUT FILE = D:\ACADPR~1\JIMGRE~1\COUCH~1\NEWSIT~1\SITER~1\COUCH~4.DAT

START TIME=0.0 0 -6
 *S COMPUTE 10 YR. 6 HR. HYDROGRAPHS FOR 6501 WYOMING OFFICE PARK
 *S COUCH-EXIST.DAT - HYMO PER JAN 1993 DPM REVISIONS
 *S
 *S

RAINFALL TYPE=-1 RAIN QUAR=0 RAIN ONE=1.23 RAIN SIX=1.45
 RAIN DAY=1.76 DT=0.033333333

COMPUTED 6-HOUR RAINFALL DISTRIBUTION BASED ON NOAA ATLAS 2 - PEAK AT 1.40 HR.
 DT = .033333 HOURS END TIME = 6.000000 HOURS

*S
 *S COMPUTE RUNOFF FOR EXISTING CONDITIONS
 *S

*S BASIN A (ON-SITE)
 COMPUTE NM HYD ID=1 HYD NO= 101.1 DA=0.001344 SQ MI
 PER A=0 PER B=0 PER C=0.16 PER D=0.84 TP=-0.133
 RAIN=-1

K = .072485HR TP = .133000HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
 UNIT PEAK = 4.4672 CFS UNIT VOLUME = .9970 B = 526.28 P60 = 1.2300
 AREA = .001129 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .107972HR TP = .133000HR K/TP RATIO = .811818 SHAPE CONSTANT, N = 4.405255
 UNIT PEAK = .61657 CFS UNIT VOLUME = .9791 B = 381.34 P60 = 1.2300
 AREA = .000215 SQ MI IA = .35000 INCHES INF = .83000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=1 CODE=10

PARTIAL HYDROGRAPH 101.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	.6	2.667	.0	4.000	.0	5.333	.0
.333	.0	1.667	1.1	3.000	.0	4.333	.0	5.667	.0
.667	.0	2.000	.5	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.1	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = 1.09162 INCHES = .0782 ACRE-FEET
PEAK DISCHARGE RATE = 2.27 CFS AT 1.500 HOURS BASIN AREA = .0013 SQ. MI.

*S

*S

*S BASIN OFF B (ON-SITE)

COMPUTE NM HYD ID=2 HYD NO= 102.1 DA=0.005438 SQ MI
PER A=0 PER B=83.3 PER C=0 PER D=16.7 TP=-0.133
RAIN=-1

K = .072485HR TP = .133000HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
UNIT PEAK = 3.5935 CFS UNIT VOLUME = .9962 B = 526.28 P60 = 1.2300
AREA = .000908 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .141933HR TP = .133000HR K/TP RATIO = 1.067165 SHAPE CONSTANT, N = 3.309354
UNIT PEAK = 10.427 CFS UNIT VOLUME = .9987 B = 306.14 P60 = 1.2300
AREA = .004530 SQ MI IA = .50000 INCHES INF = 1.25000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=2 CODE=10

PARTIAL HYDROGRAPH 102.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	.4	2.667	.1	4.000	.0	5.333	.0
.333	.0	1.667	1.9	3.000	.0	4.333	.0	5.667	.0
.667	.0	2.000	.6	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.2	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = .38125 INCHES = .1106 ACRE-FEET
PEAK DISCHARGE RATE = 3.71 CFS AT 1.500 HOURS BASIN AREA = .0054 SQ. MI.

*S

COMPUTE LT TP LCODE=1 UPLAND/TAG METHOD
NK=1 ISLOPE=-1
LENGTH=1996 FT SLOPE=0.018 K=3.0
RAIN=-1

Tc AND Tp COMPUTED BY UPLAND/LAG TIME PROCEDURE

SCS UPLAND METHOD FACTORS

	LENGTH (FT)	SLOPE (FT/FT)	COMPOSITE K
SHEET FLOW PORTION	.0	.000000	.0000
SHALLOW FLOW PORTION	.0	.000000	.0000
CHANNEL FLOW PORTION	1996.0	.018000	3.0000

TOTAL BASIN 1996.0 .018000 3.0000

TIME OF CONCENTRATION (HRS)= .1378 TIME TO PEAK (HRS)= .0918 LAG TIME (HRS)= .1033

TIME TO PEAK COMPUTED TO BE LESS THAN 0.133333 HOUR MINIMUM VALUE.

REVISED VALUES: TIME OF CONCENTRATION (HRS)= .2000 TIME TO PEAK (HRS)= .1333 LAG TIME (HRS)= .1500

*S

*S BASIN OFF C (OFF-SITE)

COMPUTE NM HYD ID=3 HYD NO= 103.1 DA=0.038828 SQ MI
PER A=0 PER B=28.62 PER C=28.62 PER D=42.76 TP=0.0
RAIN=-1
TIME TO PEAK (hrs)= .1333

K = .072666HR TP = .133333HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
UNIT PEAK = 65.533 CFS UNIT VOLUME = .9992 B = 526.28 P60 = 1.2300
AREA = .016603 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .125265HR TP = .133333HR K/TP RATIO = .939491 SHAPE CONSTANT, N = 3.763846
UNIT PEAK = 56.525 CFS UNIT VOLUME = 1.000 B = 339.10 P60 = 1.2300
AREA = .022225 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=3 CODE=10

PARTIAL HYDROGRAPH 103.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	22.5	3.333	.1	5.000	.1	6.667	.0
.333	.0	2.000	8.5	3.667	.1	5.333	.2	7.000	.0
.667	.0	2.333	1.9	4.000	.1	5.667	.2		
1.000	.0	2.667	.7	4.333	.1	6.000	.2		
1.333	8.0	3.000	.3	4.667	.1	6.333	.0		

RUNOFF VOLUME = .69580 INCHES = 1.4409 ACRE-FEET
PEAK DISCHARGE RATE = 45.04 CFS AT 1.500 HOURS BASIN AREA = .0388 SQ. MI.

*S

COMPUTE LT TP LCODE=1 UPLAND/TAG METHOD
NK=1 ISLOPE=-1
LENGTH=2828 FT SLOPE=0.021 K=3.0
RAIN=-1

Tc AND Tp COMPUTED BY UPLAND/LAG TIME PROCEDURE

SCS UPLAND METHOD FACTORS

	LENGTH (FT)	SLOPE (FT/FT)	COMPOSITE K
SHEET FLOW PORTION	.0	.000000	.0000
SHALLOW FLOW PORTION	.0	.000000	.0000
CHANNEL FLOW PORTION	2828.0	.021000	3.0000
TOTAL BASIN	2828.0	.021000	3.0000

TIME OF CONCENTRATION (HRS)= .1807 TIME TO PEAK (HRS)= .1205 LAG TIME (HRS)= .1355

TIME TO PEAK COMPUTED TO BE LESS THAN 0.133333 HOUR MINIMUM VALUE.

REVISED VALUES: TIME OF CONCENTRATION (HRS)= .2000 TIME TO PEAK (HRS)= .1333 LAG TIME (HRS)= .1500

*S

*S BASIN OFF D (OFF-SITE)

COMPUTE NM HYD ID=4 HYD NO= 104.1 DA=0.041172 SQ MI
 PER A=0 PER B=32.46 PER C=32.46 PER D=35.08 TP=0.0
 RAIN=-1

TIME TO PEAK (hrs)= .1333

K = .072666HR TP = .133333HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
 UNIT PEAK = 57.008 CFS UNIT VOLUME = .9992 B = 526.28 P60 = 1.2300
 AREA = .014443 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .125265HR TP = .133333HR K/TP RATIO = .939491 SHAPE CONSTANT, N = 3.763846
 UNIT PEAK = 67.979 CFS UNIT VOLUME = 1.000 B = 339.10 P60 = 1.2300
 AREA = .026729 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=4 CODE=10

PARTIAL HYDROGRAPH 104.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	22.0	3.333	.1	5.000	.1	6.667	.0
.333	.0	2.000	7.8	3.667	.1	5.333	.1		
.667	.0	2.333	1.8	4.000	.1	5.667	.2		
1.000	.0	2.667	.7	4.333	.1	6.000	.2		
1.333	7.0	3.000	.3	4.667	.1	6.333	.0		

RUNOFF VOLUME = .62558 INCHES = 1.3737 ACRE-FEET
 PEAK DISCHARGE RATE = 44.11 CFS AT 1.500 HOURS BASIN AREA = .0412 SQ. MI.

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
 MIN ELEV=99.14 MAX ELEV=100
 CHNL SLP=0.0425 FP SLP=0.0425 N=0.017 DIST=40.01
 DIST ELEV DIST ELEV DIST ELEV
 0 100.00 10.0 98.80 10.81 99.14
 40.01 99.74

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.84	3.97	6.22
99.23	1.18	5.55	8.80
99.28	1.64	8.07	11.38
99.32	2.21	11.63	13.96
99.37	2.90	16.34	16.54
99.41	3.71	22.33	19.12
99.46	4.64	29.74	21.70
99.50	5.68	38.69	24.28
99.55	6.83	49.29	26.86
99.59	8.11	61.67	29.44
99.64	9.50	75.94	32.02
99.68	11.01	92.20	34.60
99.73	12.63	110.57	37.18
99.77	14.35	134.43	38.12
99.82	16.08	161.53	38.50
99.86	17.83	190.65	38.88
99.91	19.60	221.76	39.26
99.95	21.39	254.80	39.63
100.00	23.19	289.75	40.01

*S

COMPUTE TRAVEL TIME ID=63 REACH NO=1 NO VS=1 L=954 FT
 SLP=0.0425

TRAVEL TIME TABLE

REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.843	3.97	.0563
.091	1.183	5.55	.0565
.136	1.640	8.07	.0538
.181	2.213	11.63	.0505
.226	2.904	16.34	.0471
.272	3.711	22.33	.0440
.317	4.635	29.74	.0413
.362	5.676	38.69	.0389
.407	6.834	49.29	.0367
.453	8.108	61.67	.0348
.498	9.499	75.94	.0331

.543	11.007	92.20	.0316
.588	12.632	110.57	.0303
.634	14.346	134.43	.0283
.679	16.080	161.53	.0264
.724	17.831	190.65	.0248
.770	19.600	221.76	.0234
.815	21.385	254.80	.0222
.860	23.188	289.75	.0212

ROUTE ID=64 HYD=264.1 IN ID=1 DT=0.0
 PRINT HYD ID=64 CODE=10

PARTIAL HYDROGRAPH 264.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	.3	2.667	.0	4.000	.0	5.333	.0
.333	.0	1.667	1.5	3.000	.0	4.333	.0	5.667	.0
.667	.0	2.000	.6	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.1	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = 1.09176 INCHES = .0783 ACRE-FEET
 PEAK DISCHARGE RATE = 1.99 CFS AT 1.567 HOURS BASIN AREA = .0013 SQ. MI.

ADD HYD ID=60 HYD NO=160.1 ID I=64 ID II=3

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
 MIN ELEV=99.14 MAX ELEV=100
 CHNL SLP=0.019 FP SLP=0.019 N=0.017 DIST=30.01

DIST	ELEV	DIST	ELEV	DIST	ELEV
0	100.00	10.0	98.80	10.81	99.14
30.01	99.74				

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.83	2.79	5.47
99.23	1.11	3.80	7.29
99.28	1.49	5.30	9.12
99.32	1.94	7.33	10.95
99.37	2.48	9.94	12.77
99.41	3.10	13.20	14.60
99.46	3.80	17.17	16.42
99.50	4.58	21.89	18.25
99.55	5.45	27.43	20.07
99.59	6.40	33.84	21.90
99.64	7.43	41.17	23.73
99.68	8.55	49.47	25.55

99.73	9.75	58.80	27.38
99.77	11.01	70.75	28.12
99.82	12.29	84.25	28.50
99.86	13.59	98.73	28.88
99.91	14.90	114.18	29.26
99.95	16.24	130.58	29.63
100.00	17.59	147.91	30.01

*S

COMPUTE TRAVEL TIME ID=65 REACH NO=1 NO VS=1 L=1466 FT
SLP=0.019

TRAVEL TIME TABLE
REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.826	2.79	.1205
.091	1.114	3.80	.1193
.136	1.486	5.30	.1141
.181	1.940	7.33	.1078
.226	2.477	9.94	.1014
.272	3.096	13.20	.0955
.317	3.798	17.17	.0901
.362	4.583	21.89	.0853
.407	5.451	27.43	.0809
.453	6.401	33.84	.0770
.498	7.433	41.17	.0735
.543	8.548	49.47	.0704
.588	9.746	58.80	.0675
.634	11.009	70.75	.0634
.679	12.290	84.25	.0594
.724	13.589	98.73	.0560
.770	14.905	114.18	.0532
.815	16.238	130.58	.0506
.860	17.587	147.91	.0484

ROUTE ID=66 HYD=266.1 IN ID=2 DT=0.0
PRINT HYD ID=66 CODE=10

PARTIAL HYDROGRAPH 266.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	.1	2.667	.1	4.000	.0	5.333	.0
.333	.0	1.667	2.5	3.000	.0	4.333	.0	5.667	.0
.667	.0	2.000	.9	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.3	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = .38129 INCHES = .1106 ACRE-FEET
PEAK DISCHARGE RATE = 2.65 CFS AT 1.600 HOURS BASIN AREA = .0054 SQ. MI.

ADD HYD ID=67 HYD NO=167.1 ID I=66 ID II=60
PRINT HYD ID=67 CODE 10

PARTIAL HYDROGRAPH 167.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	26.4	3.333	.2	5.000	.1	6.667	.0
.333	.0	2.000	10.0	3.667	.1	5.333	.2	7.000	.0
.667	.0	2.333	2.3	4.000	.1	5.667	.2		
1.000	.0	2.667	.8	4.333	.1	6.000	.2		
1.333	8.4	3.000	.3	4.667	.1	6.333	.0		

RUNOFF VOLUME = .66994 INCHES = 1.6296 ACRE-FEET
PEAK DISCHARGE RATE = 48.54 CFS AT 1.500 HOURS BASIN AREA = .0456 SQ. MI.

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
MIN ELEV=99.14 MAX ELEV=100
CHNL SLP=0.036 FP SLP=0.036 N=0.017 DIST=40.01
DIST ELEV DIST ELEV DIST ELEV
0 100.00 10.0 98.80 10.81 99.14
40.01 99.74

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.84	3.65	6.22
99.23	1.18	5.11	8.80
99.28	1.64	7.43	11.38
99.32	2.21	10.70	13.96
99.37	2.90	15.03	16.54
99.41	3.71	20.55	19.12
99.46	4.64	27.37	21.70
99.50	5.68	35.61	24.28
99.55	6.83	45.37	26.86
99.59	8.11	56.76	29.44
99.64	9.50	69.89	32.02
99.68	11.01	84.86	34.60
99.73	12.63	101.76	37.18
99.77	14.35	123.73	38.12
99.82	16.08	148.66	38.50
99.86	17.83	175.47	38.88
99.91	19.60	204.10	39.26
99.95	21.39	234.51	39.63
100.00	23.19	266.68	40.01

*S

COMPUTE TRAVEL TIME ID=68 REACH NO=1 NO VS=1 L=2463 FT
SLP=0.036

TRAVEL TIME TABLE
REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.843	3.65	.1580
.091	1.183	5.11	.1584
.136	1.640	7.43	.1510
.181	2.213	10.70	.1415
.226	2.904	15.03	.1321
.272	3.711	20.55	.1235
.317	4.635	27.37	.1159
.362	5.676	35.61	.1091
.407	6.834	45.37	.1031
.453	8.108	56.76	.0977
.498	9.499	69.89	.0930
.543	11.007	84.86	.0887
.588	12.632	101.76	.0849
.634	14.346	123.73	.0793
.679	16.080	148.66	.0740
.724	17.831	175.47	.0695
.770	19.600	204.10	.0657
.815	21.385	234.51	.0624
.860	23.188	266.68	.0595

ROUTE ID=69 HYD=269.1 IN ID=67 DT=0.0
PRINT HYD ID=69 CODE=10

PARTIAL HYDROGRAPH 269.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	33.3	3.333	.3	5.000	.1	6.667	.0
.333	.0	2.000	13.3	3.667	.1	5.333	.2	7.000	.0
.667	.0	2.333	4.8	4.000	.1	5.667	.2	7.333	.0
1.000	.0	2.667	1.6	4.333	.1	6.000	.2		
1.333	1.9	3.000	.6	4.667	.1	6.333	.1		

RUNOFF VOLUME = .66995 INCHES = 1.6297 ACRE-FEET
PEAK DISCHARGE RATE = 37.67 CFS AT 1.600 HOURS BASIN AREA = .0456 SQ. MI.

ADD HYD ID=70 HYD NO=170.1 ID I=67 ID II=4
PRINT HYD ID=70 CODE 10

PARTIAL HYDROGRAPH 170.10

TIME	FLOW	TIME	FLOW	TIME	FLOW	TIME	FLOW	TIME	FLOW
------	------	------	------	------	------	------	------	------	------

HRS	CFS	HRS	CFS	HRS	CFS	HRS	CFS	HRS	CFS
.000	.0	1.667	48.4	3.333	.3	5.000	.3	6.667	.0
.333	.0	2.000	17.8	3.667	.2	5.333	.3	7.000	.0
.667	.0	2.333	4.1	4.000	.2	5.667	.4		
1.000	.0	2.667	1.5	4.333	.2	6.000	.4		
1.333	15.4	3.000	.6	4.667	.2	6.333	.1		

RUNOFF VOLUME = .64889 INCHES = 3.0033 ACRE-FEET
 PEAK DISCHARGE RATE = 92.65 CFS AT 1.500 HOURS BASIN AREA = .0868 SQ. MI.

FINISH

NORMAL PROGRAM FINISH END TIME (HR:MIN:SEC) = 20:48:47

APPENDIX B

DEVELOPED CONDITIONS - 100-YEAR

AHYMO PROGRAM SUMMARY TABLE (AHYMO 97) -

- VERSION: 1997.02c

RUN DATE (MON/DAY/YR) =06/18/2001

```

INPUT FILE = D:\ACADPR~1\JIMGRE~1\COUCH~1\NEWSIT~1\SITERE~1\COUCH~2.DAT

```

USER NO.= AHYMO-I-9702a0100001A-SH

[illegible]

AHYMO PROGRAM (AHYMO_97) - - Version: 1997.02c
 RUN DATE (MON/DAY/YR) = 06/18/2001
 START TIME (HR:MIN:SEC) = 21:02:37 USER NO.= AHYMO-I-9702a0100001A-SH
 INPUT FILE = D:\ACADPR~1\JIMGRE~1\COUCH~1\NEWSIT~1\SITERE~1\COUCH~2.DAT

START TIME=0.0 0 -6
 *S COMPUTE 100 YR. 6 HR. HYDROGRAPHS FOR 6501 WYOMING OFFICE PARK
 *S COUCH-EXIST.DAT - HYMO PER JAN 1993 DPM REVISIONS
 *S
 *S

RAINFALL TYPE=-1 RAIN QUAR=0 RAIN ONE=1.87 RAIN SIX=2.20
 RAIN DAY=2.66 DT=0.0333333333

COMPUTED 6-HOUR RAINFALL DISTRIBUTION BASED ON NOAA ATLAS 2 - PEAK AT 1.40 HR.
 DT = .033333 HOURS END TIME = 6.000000 HOURS

*S
 *S COMPUTE RUNOFF FOR DEVELOPED CONDITIONS
 *S

*S BASIN A (ON-SITE)
 COMPUTE NM HYD ID=1 HYD NO= 101.1 DA=0.003578 SQ MI
 PER A=0 PER B=6.04 PER C=6.04 PER D=87.92 TP=-0.133
 RAIN=-1

K = .072485HR TP = .133000HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
 UNIT PEAK = 12.448 CFS UNIT VOLUME = .9985 B = 526.28 P60 = 1.8700
 AREA = .003146 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .118163HR TP = .133000HR K/TP RATIO = .888442 SHAPE CONSTANT, N = 3.992480
 UNIT PEAK = 1.1526 CFS UNIT VOLUME = .9886 B = 354.67 P60 = 1.8700
 AREA = .000432 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=1 CODE=10

PARTIAL HYDROGRAPH 101.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	4.8	3.333	.1	5.000	.1	6.667	.0
.333	.0	2.000	2.3	3.667	.1	5.333	.1		
.667	.0	2.333	.5	4.000	.1	5.667	.1		
1.000	.0	2.667	.2	4.333	.1	6.000	.1		
1.333	2.8	3.000	.1	4.667	.1	6.333	.0		

RUNOFF VOLUME = 1.82774 INCHES = .3488 ACRE-FEET
PEAK DISCHARGE RATE = 9.50 CFS AT 1.500 HOURS BASIN AREA = .0036 SQ. MI.

*S

*S

*S BASIN OFF B (ON-SITE)

COMPUTE NM HYD ID=2 HYD NO= 102.1 DA=0.003203 SQ MI
PER A=0 PER B=7.36 PER C=7.36 PER D=85.28 TP=-0.133
RAIN=-1

K = .072485HR TP = .133000HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
UNIT PEAK = 10.809 CFS UNIT VOLUME = .9983 B = 526.28 P60 = 1.8700
AREA = .002732 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .118163HR TP = .133000HR K/TP RATIO = .888442 SHAPE CONSTANT, N = 3.992480
UNIT PEAK = 1.2573 CFS UNIT VOLUME = .9897 B = 354.67 P60 = 1.8700
AREA = .000471 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=2 CODE=10

PARTIAL HYDROGRAPH 102.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	4.3	3.333	.1	5.000	.0	6.667	.0
.333	.0	2.000	2.0	3.667	.1	5.333	.0		
.667	.0	2.333	.4	4.000	.0	5.667	.1		
1.000	.0	2.667	.2	4.333	.0	6.000	.1		
1.333	2.4	3.000	.1	4.667	.0	6.333	.0		

RUNOFF VOLUME = 1.79735 INCHES = .3070 ACRE-FEET
PEAK DISCHARGE RATE = 8.40 CFS AT 1.500 HOURS BASIN AREA = .0032 SQ. MI.

*S

COMPUTE LT TP LCODE=1 UPLAND/TAG METHOD
NK=1 ISLOPE=-1
LENGTH=1996 FT SLOPE=0.018 K=3.0
RAIN=-1

Tc AND Tp COMPUTED BY UPLAND/LAG TIME PROCEDURE

SCS UPLAND METHOD FACTORS

	LENGTH (FT)	SLOPE (FT/FT)	COMPOSITE K
SHEET FLOW PORTION	.0	.000000	.0000
SHALLOW FLOW PORTION	.0	.000000	.0000

CHANNEL FLOW PORTION 1996.0 .018000 3.0000
TOTAL BASIN 1996.0 .018000 3.0000

TIME OF CONCENTRATION (HRS)= .1378 TIME TO PEAK (HRS)= .0918 LAG TIME (HRS)= .1033

TIME TO PEAK COMPUTED TO BE LESS THAN 0.133333 HOUR MINIMUM VALUE.
REVISED VALUES: TIME OF CONCENTRATION (HRS)= .2000

TIME TO PEAK (HRS)= .1333 LAG TIME (HRS)= .1500

*S

*S BASIN OFF C (OFF-SITE)

COMPUTE NM HYD ID=3 HYD NO= 103.1 DA=0.038828 SQ MI
PER A=0 PER B=28.62 PER C=28.62 PER D=42.76 TP=0.0
RAIN=-1

TIME TO PEAK (hrs)= .1333

K = .072666HR TP = .133333HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
UNIT PEAK = 65.533 CFS UNIT VOLUME = .9992 B = 526.28 P60 = 1.8700
AREA = .016603 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .118459HR TP = .133333HR K/TP RATIO = .888442 SHAPE CONSTANT, N = 3.992480
UNIT PEAK = 59.119 CFS UNIT VOLUME = 1.000 B = 354.67 P60 = 1.8700
AREA = .022225 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=3 CODE=10

PARTIAL HYDROGRAPH 103.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	42.4	3.333	.4	5.000	.3	6.667	.0
.333	.0	2.000	14.9	3.667	.3	5.333	.3	7.000	.0
.667	.0	2.333	3.6	4.000	.3	5.667	.3		
1.000	.0	2.667	1.5	4.333	.3	6.000	.3		
1.333	15.6	3.000	.7	4.667	.3	6.333	.0		

RUNOFF VOLUME = 1.30789 INCHES = 2.7084 ACRE-FEET
PEAK DISCHARGE RATE = 81.11 CFS AT 1.500 HOURS BASIN AREA = .0388 SQ. MI.

*S

COMPUTE LT TP

LCODE=1 UPLAND/TAG METHOD
NK=1 ISLOPE=-1
LENGTH=2828 FT SLOPE=0.021 K=3.0
RAIN=-1

Tc AND Tp COMPUTED BY UPLAND/LAG TIME PROCEDURE

SCS UPLAND METHOD FACTORS

	LENGTH (FT)	SLOPE (FT/FT)	COMPOSITE K
SHEET FLOW PORTION	.0	.000000	.0000
SHALLOW FLOW PORTION	.0	.000000	.0000
CHANNEL FLOW PORTION	2828.0	.021000	3.0000
TOTAL BASIN	2828.0	.021000	3.0000

TIME OF CONCENTRATION (HRS)= .1807 TIME TO PEAK (HRS)= .1205 LAG TIME (HRS)= .1355

TIME TO PEAK COMPUTED TO BE LESS THAN 0.133333 HOUR MINIMUM VALUE.

REVISED VALUES: TIME OF CONCENTRATION (HRS)= .2000 TIME TO PEAK (HRS)= .1333 LAG TIME (HRS)= .1500

*S

*S BASIN OFF D (OFF-SITE)

COMPUTE NM HYD ID=4 HYD NO= 104.1 DA=0.041172 SQ MI
PER A=0 PER B=32.46 PER C=32.46 PER D=35.08 TP=0.0
RAIN=-1
TIME TO PEAK (hrs)= .1333

K = .072666HR TP = .133333HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
UNIT PEAK = 57.008 CFS UNIT VOLUME = .9992 B = 526.28 P60 = 1.8700
AREA = .014443 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .118459HR TP = .133333HR K/TP RATIO = .888442 SHAPE CONSTANT, N = 3.992480
UNIT PEAK = 71.099 CFS UNIT VOLUME = 1.000 B = 354.67 P60 = 1.8700
AREA = .026729 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=4 CODE=10

PARTIAL HYDROGRAPH 104.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	43.2	3.333	.4	5.000	.2	6.667	.0
.333	.0	2.000	14.0	3.667	.3	5.333	.3	7.000	.0
.667	.0	2.333	3.5	4.000	.3	5.667	.3		
1.000	.0	2.667	1.4	4.333	.2	6.000	.3		
1.333	14.0	3.000	.7	4.667	.2	6.333	.0		

RUNOFF VOLUME = 1.21949 INCHES = 2.6778 ACRE-FEET
PEAK DISCHARGE RATE = 82.09 CFS AT 1.500 HOURS BASIN AREA = .0412 SQ. MI.

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
MIN ELEV=99.14 MAX ELEV=100
CHNL SLP=0.0425 FP SLP=0.0425 N=0.017 DIST=40.01
DIST ELEV DIST ELEV DIST ELEV
0 100.00 10.0 98.80 10.81 99.14
40.01 99.74

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.84	3.97	6.22
99.23	1.18	5.55	8.80
99.28	1.64	8.07	11.38
99.32	2.21	11.63	13.96
99.37	2.90	16.34	16.54
99.41	3.71	22.33	19.12
99.46	4.64	29.74	21.70
99.50	5.68	38.69	24.28
99.55	6.83	49.29	26.86
99.59	8.11	61.67	29.44
99.64	9.50	75.94	32.02
99.68	11.01	92.20	34.60
99.73	12.63	110.57	37.18
99.77	14.35	134.43	38.12
99.82	16.08	161.53	38.50
99.86	17.83	190.65	38.88
99.91	19.60	221.76	39.26
99.95	21.39	254.80	39.63
100.00	23.19	289.75	40.01

*S

COMPUTE TRAVEL TIME ID=63 REACH NO=1 NO VS=1 L=954 FT
SLP=0.0425

TRAVEL TIME TABLE

REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.843	3.97	.0563
.091	1.183	5.55	.0565
.136	1.640	8.07	.0538
.181	2.213	11.63	.0505
.226	2.904	16.34	.0471
.272	3.711	22.33	.0440
.317	4.635	29.74	.0413
.362	5.676	38.69	.0389
.407	6.834	49.29	.0367

.453	8.108	61.67	.0348
.498	9.499	75.94	.0331
.543	11.007	92.20	.0316
.588	12.632	110.57	.0303
.634	14.346	134.43	.0283
.679	16.080	161.53	.0264
.724	17.831	190.65	.0248
.770	19.600	221.76	.0234
.815	21.385	254.80	.0222
.860	23.188	289.75	.0212

ROUTE ID=64 HYD=264.1 IN ID=1 DT=0.0
 PRINT HYD ID=64 CODE=10

PARTIAL HYDROGRAPH 264.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	6.0	3.333	.1	5.000	.1	6.667	.0
.333	.0	2.000	2.5	3.667	.1	5.333	.1		
.667	.0	2.333	.6	4.000	.1	5.667	.1		
1.000	.0	2.667	.2	4.333	.1	6.000	.1		
1.333	1.5	3.000	.1	4.667	.1	6.333	.0		

RUNOFF VOLUME = 1.82780 INCHES = .3488 ACRE-FEET
 PEAK DISCHARGE RATE = 8.52 CFS AT 1.533 HOURS BASIN AREA = .0036 SQ. MI.

ADD HYD ID=60 HYD NO=160.1 ID I=64 ID II=3
 *S
 *S
 COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
 MIN ELEV=99.14 MAX ELEV=100
 CHNL SLP=0.019 FP SLP=0.019 N=0.017 DIST=30.01

DIST	ELEV	DIST	ELEV	DIST	ELEV
0	100.00	10.0	98.80	10.81	99.14
30.01	99.74				

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.83	2.79	5.47
99.23	1.11	3.80	7.29
99.28	1.49	5.30	9.12
99.32	1.94	7.33	10.95
99.37	2.48	9.94	12.77
99.41	3.10	13.20	14.60
99.46	3.80	17.17	16.42
99.50	4.58	21.89	18.25
99.55	5.45	27.43	20.07

99.59	6.40	33.84	21.90
99.64	7.43	41.17	23.73
99.68	8.55	49.47	25.55
99.73	9.75	58.80	27.38
99.77	11.01	70.75	28.12
99.82	12.29	84.25	28.50
99.86	13.59	98.73	28.88
99.91	14.90	114.18	29.26
99.95	16.24	130.58	29.63
100.00	17.59	147.91	30.01

*S

COMPUTE TRAVEL TIME ID=65 REACH NO=1 NO VS=1 L=1466 FT
SLP=0.019

TRAVEL TIME TABLE

REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.826	2.79	.1205
.091	1.114	3.80	.1193
.136	1.486	5.30	.1141
.181	1.940	7.33	.1078
.226	2.477	9.94	.1014
.272	3.096	13.20	.0955
.317	3.798	17.17	.0901
.362	4.583	21.89	.0853
.407	5.451	27.43	.0809
.453	6.401	33.84	.0770
.498	7.433	41.17	.0735
.543	8.548	49.47	.0704
.588	9.746	58.80	.0675
.634	11.009	70.75	.0634
.679	12.290	84.25	.0594
.724	13.589	98.73	.0560
.770	14.905	114.18	.0532
.815	16.238	130.58	.0506
.860	17.587	147.91	.0484

ROUTE
PRINT HYD

ID=66 HYD=266.1 IN ID=2 DT=0.0
ID=66 CODE=10

PARTIAL HYDROGRAPH 266.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	5.5	3.333	.1	5.000	.0		
.333	.0	2.000	2.6	3.667	.1	5.333	.0	6.667	.0
.667	.0	2.333	.8	4.000	.0	5.667	.1		
1.000	.0	2.667	.3	4.333	.0	6.000	.1		
1.333	.8	3.000	.1	4.667	.0	6.333	.0		

RUNOFF VOLUME = 1.79742 INCHES = .3070 ACRE-FEET
 PEAK DISCHARGE RATE = 6.41 CFS AT 1.567 HOURS BASIN AREA = .0032 SQ. MI.

ADD HYD ID=67 HYD NO=167.1 ID I=66 ID II=60
 PRINT HYD ID=67 CODE 10

PARTIAL HYDROGRAPH 167.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	53.9	3.333	.6	5.000	.4	6.667	.0
.333	.0	2.000	20.0	3.667	.4	5.333	.4	7.000	.0
.667	.0	2.333	5.1	4.000	.4	5.667	.4		
1.000	.0	2.667	2.0	4.333	.4	6.000	.5		
1.333	18.0	3.000	.9	4.667	.4	6.333	.1		

RUNOFF VOLUME = 1.38303 INCHES = 3.3642 ACRE-FEET
 PEAK DISCHARGE RATE = 93.97 CFS AT 1.500 HOURS BASIN AREA = .0456 SQ. MI.

*S
 *S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
 MIN ELEV=99.14 MAX ELEV=100
 CHNL SLP=0.036 FP SLP=0.036 N=0.017 DIST=40.01
 DIST ELEV DIST ELEV DIST ELEV
 0 100.00 10.0 98.80 10.81 99.14
 40.01 99.74

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.84	3.65	6.22
99.23	1.18	5.11	8.80
99.28	1.64	7.43	11.38
99.32	2.21	10.70	13.96
99.37	2.90	15.03	16.54
99.41	3.71	20.55	19.12
99.46	4.64	27.37	21.70
99.50	5.68	35.61	24.28
99.55	6.83	45.37	26.86
99.59	8.11	56.76	29.44
99.64	9.50	69.89	32.02
99.68	11.01	84.86	34.60
99.73	12.63	101.76	37.18
99.77	14.35	123.73	38.12
99.82	16.08	148.66	38.50

99.86	17.83	175.47	38.88
99.91	19.60	204.10	39.26
99.95	21.39	234.51	39.63
100.00	23.19	266.68	40.01

*S
 COMPUTE TRAVEL TIME ID=68 REACH NO=1 NO VS=1 L=2463 FT
 SLP=0.036

TRAVEL TIME TABLE
 REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.843	3.65	.1580
.091	1.183	5.11	.1584
.136	1.640	7.43	.1510
.181	2.213	10.70	.1415
.226	2.904	15.03	.1321
.272	3.711	20.55	.1235
.317	4.635	27.37	.1159
.362	5.676	35.61	.1091
.407	6.834	45.37	.1031
.453	8.108	56.76	.0977
.498	9.499	69.89	.0930
.543	11.007	84.86	.0887
.588	12.632	101.76	.0849
.634	14.346	123.73	.0793
.679	16.080	148.66	.0740
.724	17.831	175.47	.0695
.770	19.600	204.10	.0657
.815	21.385	234.51	.0624
.860	23.188	266.68	.0595

$$176.06 \delta =$$

$$\frac{28.63}{0.046} = \frac{0.59}{X}$$

$$X = 0.000948 \div 0.724 - 0.731$$

ROUTE
 PRINT HYD ID=69 HYD=269.1 IN ID=67 DT=0.0
 ID=69 CODE=10

PARTIAL HYDROGRAPH 269.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	66.9	3.333	.8	5.000	.4	6.667	.0
.333	.0	2.000	25.7	3.667	.5	5.333	.4	7.000	.0
.667	.0	2.333	8.9	4.000	.4	5.667	.4	7.333	.0
1.000	.0	2.667	3.4	4.333	.4	6.000	.4		
1.333	5.3	3.000	1.5	4.667	.4	6.333	.2		

RUNOFF VOLUME = 1.38304 INCHES = 3.3642 ACRE-FEET
 PEAK DISCHARGE RATE = 78.03 CFS AT 1.567 HOURS BASIN AREA = .0456 SQ. MI.

ADD HYD ID=70 HYD NO=170.1 ID I=67 ID II=4

PRINT HYD

ID=70 CODE 10

PARTIAL HYDROGRAPH 170.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	97.1	3.333	1.0	5.000	.6	6.667	.0
.333	.0	2.000	34.0	3.667	.7	5.333	.7	7.000	.0
.667	.0	2.333	8.6	4.000	.6	5.667	.7		
1.000	.0	2.667	3.4	4.333	.6	6.000	.8		
1.333	32.0	3.000	1.6	4.667	.6	6.333	.1		

RUNOFF VOLUME = 1.30544 INCHES = 6.0419 ACRE-FEET
PEAK DISCHARGE RATE = 176.06 CFS AT 1.500 HOURS BASIN AREA = .0868 SQ. MI.

FINISH

NORMAL PROGRAM FINISH

END TIME (HR:MIN:SEC) = 21:02:38

DEVELOPED CONDITIONS - 10-YEAR

AHYMO PROGRAM SUMMARY TABLE (AHYMO 97) -

- VERSION: 1997.02c

RUN DATE (MON/DAY/YR) =06/18/2001

INPUT FILE = D:\ACADPR~1\JIMGRE~1\COUCH-~1\NEWSIT~1\SITERE~1\COUCH-~3.DAT

USER NO.= AHYMO-I-9702a0100001A-SH

[illegible]

AHYMO PROGRAM (AHYMO_97) - - Version: 1997.02c
 RUN DATE (MON/DAY/YR) = 06/18/2001
 START TIME (HR:MIN:SEC) = 20:58:38 USER NO. = AHYMO-I-9702a0100001A-SH
 INPUT FILE = D:\ACADPR~1\JIMGRE~1\COUCH~1\NEWSIT~1\SITERE~1\COUCH~1\COUCH--3.DAT

START TIME=0.0 0 -6
 *S COMPUTE 10 YR. 6 HR. HYDROGRAPHS FOR 6501 WYOMING OFFICE PARK
 *S COUCH-EXIST.DAT - HYMO PER JAN 1993 DPM REVISIONS
 *S
 *S

RAINFALL TYPE=-1 RAIN QUAR=0 RAIN ONE=1.23 RAIN SIX=1.45
 RAIN DAY=1.76 DT=0.0333333333

COMPUTED 6-HOUR RAINFALL DISTRIBUTION BASED ON NOAA ATLAS 2 - PEAK AT 1.40 HR.
 DT = .033333 HOURS END TIME = 6.000000 HOURS

*S
 *S COMPUTE RUNOFF FOR DEVELOPED CONDITIONS
 *S

*S
 *S
 *S BASIN A (ON-SITE)
 COMPUTE NM HYD ID=1 HYD NO= 101.1 DA=0.003578 SQ MI
 PER A=0 PER B=6.04 PER C=6.04 PER D=87.92 TP=-0.133
 RAIN=-1

K = .072485HR TP = .133000HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
 UNIT PEAK = 12.448 CFS UNIT VOLUME = .9985 B = 526.28 P60 = 1.2300
 AREA = .003146 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .124952HR TP = .133000HR K/TP RATIO = .939491 SHAPE CONSTANT, N = 3.763843
 UNIT PEAK = 1.1020 CFS UNIT VOLUME = .9883 B = 339.10 P60 = 1.2300
 AREA = .000432 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=1 CODE=10

PARTIAL HYDROGRAPH 101.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	1.5	2.667	.1	4.000	.0	5.333	.0
.333	.0	1.667	3.0	3.000	.0	4.333	.0	5.667	.0
.667	.0	2.000	1.4	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.3	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = 1.10872 INCHES = .2116 ACRE-FEET
 PEAK DISCHARGE RATE = 6.03 CFS AT 1.500 HOURS BASIN AREA = .0036 SQ. MI.

*S

*S

*S BASIN OFF B (ON-SITE)

COMPUTE NM HYD ID=2 HYD NO= 102.1 DA=0.003203 SQ MI
 PER A=0 PER B=7.36 PER C=7.36 PER D=85.28 TP=-0.133
 RAIN=-1

K = .072485HR TP = .133000HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
 UNIT PEAK = 10.809 CFS UNIT VOLUME = .9983 B = 526.28 P60 = 1.2300
 AREA = .002732 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .124952HR TP = .133000HR K/TP RATIO = .939491 SHAPE CONSTANT, N = 3.763843
 UNIT PEAK = 1.2021 CFS UNIT VOLUME = .9893 B = 339.10 P60 = 1.2300
 AREA = .000471 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=2 CODE=10

PARTIAL HYDROGRAPH 102.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.333	1.3	2.667	.1	4.000	.0	5.333	.0
.333	.0	1.667	2.7	3.000	.0	4.333	.0	5.667	.0
.667	.0	2.000	1.2	3.333	.0	4.667	.0	6.000	.0
1.000	.0	2.333	.2	3.667	.0	5.000	.0	6.333	.0

RUNOFF VOLUME = 1.08458 INCHES = .1853 ACRE-FEET
 PEAK DISCHARGE RATE = 5.30 CFS AT 1.500 HOURS BASIN AREA = .0032 SQ. MI.

*S

COMPUTE LT TP LCODE=1 UPLAND/TAG METHOD
 NK=1 ISLOPE=-1
 LENGTH=1996 FT SLOPE=0.018 K=3.0
 RAIN=-1

Tc AND Tp COMPUTED BY UPLAND/LAG TIME PROCEDURE

SCS UPLAND METHOD FACTORS

	LENGTH (FT)	SLOPE (FT/FT)	COMPOSITE K
SHEET FLOW PORTION	.0	.000000	.0000
SHALLOW FLOW PORTION	.0	.000000	.0000
CHANNEL FLOW PORTION	1996.0	.018000	3.0000

TOTAL BASIN 1996.0 .018000 3.0000

TIME OF CONCENTRATION (HRS)= .1378 TIME TO PEAK (HRS)= .0918 LAG TIME (HRS)= .1033

TIME TO PEAK COMPUTED TO BE LESS THAN 0.133333 HOUR MINIMUM VALUE.

REVISED VALUES: TIME OF CONCENTRATION (HRS)= .2000 TIME TO PEAK (HRS)= .1333 LAG TIME (HRS)= .1500

*S

*S BASIN OFF C (OFF-SITE)

COMPUTE NM HYD ID=3 HYD NO= 103.1 DA=0.038828 SQ MI
PER A=0 PER B=28.62 PER C=28.62 PER D=42.76 TP=0.0
RAIN=-1

TIME TO PEAK (hrs)= .1333

K = .072666HR TP = .133333HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
UNIT PEAK = 65.533 CFS UNIT VOLUME = .9992 B = 526.28 P60 = 1.2300
AREA = .016603 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .125265HR TP = .133333HR K/TP RATIO = .939491 SHAPE CONSTANT, N = 3.763846
UNIT PEAK = 56.525 CFS UNIT VOLUME = 1.000 B = 339.10 P60 = 1.2300
AREA = .022225 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=3 CODE=10

PARTIAL HYDROGRAPH 103.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	22.5	3.333	.1	5.000	.1	6.667	.0
.333	.0	2.000	8.5	3.667	.1	5.333	.2	7.000	.0
.667	.0	2.333	1.9	4.000	.1	5.667	.2		
1.000	.0	2.667	.7	4.333	.1	6.000	.2		
1.333	8.0	3.000	.3	4.667	.1	6.333	.0		

RUNOFF VOLUME = .69580 INCHES = 1.4409 ACRE-FEET
PEAK DISCHARGE RATE = 45.04 CFS AT 1.500 HOURS BASIN AREA = .0388 SQ. MI.

*S

COMPUTE LT TP LCODE=1 UPLAND/TAG METHOD
NK=1 ISLOPE=-1
LENGTH=2828 FT SLOPE=0.021 K=3.0
RAIN=-1

Tc AND Tp COMPUTED BY UPLAND/LAG TIME PROCEDURE

SCS UPLAND METHOD FACTORS

	LENGTH (FT)	SLOPE (FT/FT)	COMPOSITE K
SHEET FLOW PORTION	.0	.000000	.0000
SHALLOW FLOW PORTION	.0	.000000	.0000
CHANNEL FLOW PORTION	2828.0	.021000	3.0000
TOTAL BASIN	2828.0	.021000	3.0000

TIME OF CONCENTRATION (HRS)= .1807 TIME TO PEAK (HRS)= .1205 LAG TIME (HRS)= .1355

TIME TO PEAK COMPUTED TO BE LESS THAN 0.133333 HOUR MINIMUM VALUE.

REVISED VALUES: TIME OF CONCENTRATION (HRS)= .2000 TIME TO PEAK (HRS)= .1333 LAG TIME (HRS)= .1500

*S

*S BASIN OFF D (OFF-SITE)

COMPUTE NM HYD ID=4 HYD NO= 104.1 DA=0.041172 SQ MI
 PER A=0 PER B=32.46 PER C=32.46 PER D=35.08 TP=0.0
 RAIN=-1
 TIME TO PEAK (hrs)= .1333

K = .072666HR TP = .133333HR K/TP RATIO = .545000 SHAPE CONSTANT, N = 7.106420
 UNIT PEAK = 57.008 CFS UNIT VOLUME = .9992 B = 526.28 P60 = 1.2300
 AREA = .014443 SQ MI IA = .10000 INCHES INF = .04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

K = .125265HR TP = .133333HR K/TP RATIO = .939491 SHAPE CONSTANT, N = 3.763846
 UNIT PEAK = 67.979 CFS UNIT VOLUME = 1.000 B = 339.10 P60 = 1.2300
 AREA = .026729 SQ MI IA = .42500 INCHES INF = 1.04000 INCHES PER HOUR
 RUNOFF COMPUTED BY INITIAL ABSTRACTION/INFILTRATION NUMBER METHOD - DT = .033333

PRINT HYD ID=4 CODE=10

PARTIAL HYDROGRAPH 104.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	22.0	3.333	.1	5.000	.1	6.667	.0
.333	.0	2.000	7.8	3.667	.1	5.333	.1		
.667	.0	2.333	1.8	4.000	.1	5.667	.2		
1.000	.0	2.667	.7	4.333	.1	6.000	.2		
1.333	7.0	3.000	.3	4.667	.1	6.333	.0		

RUNOFF VOLUME = .62558 INCHES = 1.3737 ACRE-FEET
 PEAK DISCHARGE RATE = 44.11 CFS AT 1.500 HOURS BASIN AREA = .0412 SQ. MI.

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
 MIN ELEV=99.14 MAX ELEV=100
 CHNL SLP=0.0425 FP SLP=0.0425 N=0.017 DIST=40.01
 DIST ELEV DIST ELEV DIST ELEV
 0 100.00 10.0 98.80 10.81 99.14
 40.01 99.74

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.84	3.97	6.22
99.23	1.18	5.55	8.80
99.28	1.64	8.07	11.38
99.32	2.21	11.63	13.96
99.37	2.90	16.34	16.54
99.41	3.71	22.33	19.12
99.46	4.64	29.74	21.70
99.50	5.68	38.69	24.28
99.55	6.83	49.29	26.86
99.59	8.11	61.67	29.44
99.64	9.50	75.94	32.02
99.68	11.01	92.20	34.60
99.73	12.63	110.57	37.18
99.77	14.35	134.43	38.12
99.82	16.08	161.53	38.50
99.86	17.83	190.65	38.88
99.91	19.60	221.76	39.26
99.95	21.39	254.80	39.63
100.00	23.19	289.75	40.01

*S

COMPUTE TRAVEL TIME ID=63 REACH NO=1 NO VS=1 L=954 FT
 SLP=0.0425

TRAVEL TIME TABLE

REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.843	3.97	.0563
.091	1.183	5.55	.0565
.136	1.640	8.07	.0538
.181	2.213	11.63	.0505
.226	2.904	16.34	.0471
.272	3.711	22.33	.0440
.317	4.635	29.74	.0413
.362	5.676	38.69	.0389
.407	6.834	49.29	.0367
.453	8.108	61.67	.0348
.498	9.499	75.94	.0331

	.543	11.007	92.20	.0316
	.588	12.632	110.57	.0303
	.634	14.346	134.43	.0283
	.679	16.080	161.53	.0264
	.724	17.831	190.65	.0248
	.770	19.600	221.76	.0234
	.815	21.385	254.80	.0222
	.860	23.188	289.75	.0212

ROUTE ID=64 HYD=264.1 IN ID=1 DT=0.0
 PRINT HYD ID=64 CODE=10

PARTIAL HYDROGRAPH 264.10

TIME	FLOW	TIME	FLOW	TIME	FLOW	TIME	FLOW	TIME	FLOW
HRS	CFS	HRS	CFS	HRS	CFS	HRS	CFS	HRS	CFS
.000	.0	1.667	3.9	3.333	.0	5.000	.0	6.667	.0
.333	.0	2.000	1.6	3.667	.0	5.333	.0		
.667	.0	2.333	.4	4.000	.0	5.667	.0		
1.000	.0	2.667	.1	4.333	.0	6.000	.0		
1.333	.7	3.000	.0	4.667	.0	6.333	.0		

RUNOFF VOLUME = 1.10878 INCHES = .2116 ACRE-Feet
 PEAK DISCHARGE RATE = 5.29 CFS AT 1.567 HOURS BASIN AREA = .0036 SQ. MI.

ADD HYD ID=60 HYD NO=160.1 ID I=64 ID II=3
 *S
 *S
 COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
 MIN ELEV=99.14 MAX ELEV=100
 CHNL SLP=0.019 FP SLP=0.019 N=0.017 DIST=30.01

DIST	ELEV	DIST	ELEV	DIST	ELEV
0	100.00	10.0	98.80	10.81	99.14
30.01	99.74				

RATING CURVE VALLEY SECTION 11.0

WATER	FLOW	FLOW	TOP
SURFACE	AREA	RATE	WIDTH
ELEV	SQ FT	CFS	FT
99.14	.00	.00	3.65
99.19	.83	2.79	5.47
99.23	1.11	3.80	7.29
99.28	1.49	5.30	9.12
99.32	1.94	7.33	10.95
99.37	2.48	9.94	12.77
99.41	3.10	13.20	14.60
99.46	3.80	17.17	16.42
99.50	4.58	21.89	18.25
99.55	5.45	27.43	20.07
99.59	6.40	33.84	21.90
99.64	7.43	41.17	23.73

99.68	8.55	49.47	25.55
99.73	9.75	58.80	27.38
99.77	11.01	70.75	28.12
99.82	12.29	84.25	28.50
99.86	13.59	98.73	28.88
99.91	14.90	114.18	29.26
99.95	16.24	130.58	29.63
100.00	17.59	147.91	30.01

*S

COMPUTE TRAVEL TIME ID=65 REACH NO=1 NO VS=1 L=1466 FT
SLP=0.019

TRAVEL TIME TABLE

REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.826	2.79	.1205
.091	1.114	3.80	.1193
.136	1.486	5.30	.1141
.181	1.940	7.33	.1078
.226	2.477	9.94	.1014
.272	3.096	13.20	.0955
.317	3.798	17.17	.0901
.362	4.583	21.89	.0853
.407	5.451	27.43	.0809
.453	6.401	33.84	.0770
.498	7.433	41.17	.0735
.543	8.548	49.47	.0704
.588	9.746	58.80	.0675
.634	11.009	70.75	.0634
.679	12.290	84.25	.0594
.724	13.589	98.73	.0560
.770	14.905	114.18	.0532
.815	16.238	130.58	.0506
.860	17.587	147.91	.0484

ROUTE
PRINT HYD

ID=66 HYD=266.1 IN ID=2 DT=0.0
ID=66 CODE=10

PARTIAL HYDROGRAPH 266.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	3.5	3.333	.0	5.000	.0	6.667	.0
.333	.0	2.000	1.6	3.667	.0	5.333	.0		
.667	.0	2.333	.5	4.000	.0	5.667	.0		
1.000	.0	2.667	.1	4.333	.0	6.000	.0		
1.333	.4	3.000	.1	4.667	.0	6.333	.0		

RUNOFF VOLUME = 1.08465 INCHES = .1853 ACRE-FEET
PEAK DISCHARGE RATE = 3.86 CFS AT 1.600 HOURS BASIN AREA = .0032 SQ. MI.

ADD HYD
PRINT HYD

ID=67 HYD NO=167.1 ID I=66 ID II=60
ID=67 CODE 10

PARTIAL HYDROGRAPH 167.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	29.9	3.333	.2	5.000	.2	6.667	.0
.333	.0	2.000	11.8	3.667	.1	5.333	.2	7.000	.0
.667	.0	2.333	2.8	4.000	.1	5.667	.3		
1.000	.0	2.667	1.0	4.333	.1	6.000	.3		
1.333	9.1	3.000	.4	4.667	.1	6.333	.0		

RUNOFF VOLUME = .75548 INCHES = 1.8377 ACRE-FEET
PEAK DISCHARGE RATE = 52.80 CFS AT 1.500 HOURS BASIN AREA = .0456 SQ. MI.

*S

*S

COMPUTE RATING CURVE CID=1 VS NO=11 NO SEGS=1
MIN ELEV=99.14 MAX ELEV=100
CHNL SLP=0.036 FP SLP=0.036 N=0.017 DIST=40.01
DIST ELEV DIST ELEV DIST ELEV
0 100.00 10.0 98.80 10.81 99.14
40.01 99.74

RATING CURVE VALLEY SECTION 11.0

WATER SURFACE ELEV	FLOW AREA SQ FT	FLOW RATE CFS	TOP WIDTH FT
99.14	.00	.00	3.65
99.19	.84	3.65	6.22
99.23	1.18	5.11	8.80
99.28	1.64	7.43	11.38
99.32	2.21	10.70	13.96
99.37	2.90	15.03	16.54
99.41	3.71	20.55	19.12
99.46	4.64	27.37	21.70
99.50	5.68	35.61	24.28
99.55	6.83	45.37	26.86
99.59	8.11	56.76	29.44
99.64	9.50	69.89	32.02
99.68	11.01	84.86	34.60
99.73	12.63	101.76	37.18
99.77	14.35	123.73	38.12
99.82	16.08	148.66	38.50
99.86	17.83	175.47	38.88
99.91	19.60	204.10	39.26
99.95	21.39	234.51	39.63

100.00 23.19 266.68 40.01
*S
COMPUTE TRAVEL TIME ID=68 REACH NO=1 NO VS=1 L=2463 FT
SLP=0.036

TRAVEL TIME TABLE
REACH= 1.0

WATER DEPTH FEET	AVERAGE AREA SQ. FT.	FLOW RATE CFS	TRAVEL TIME HRS
.045	.843	3.65	.1580
.091	1.183	5.11	.1584
.136	1.640	7.43	.1510
.181	2.213	10.70	.1415
.226	2.904	15.03	.1321
.272	3.711	20.55	.1235
.317	4.635	27.37	.1159
.362	5.676	35.61	.1091
.407	6.834	45.37	.1031
.453	8.108	56.76	.0977
.498	9.499	69.89	.0930
.543	11.007	84.86	.0887
.588	12.632	101.76	.0849
.634	14.346	123.73	.0793
.679	16.080	148.66	.0740
.724	17.831	175.47	.0695
.770	19.600	204.10	.0657
.815	21.385	234.51	.0624
.860	23.188	266.68	.0595

ROUTE ID=69 HYD=269.1 IN ID=67 DT=0.0
PRINT HYD ID=69 CODE=10

PARTIAL HYDROGRAPH 269.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	37.1	3.333	.3	5.000	.2	6.667	.0
.333	.0	2.000	15.3	3.667	.2	5.333	.2	7.000	.0
.667	.0	2.333	5.6	4.000	.1	5.667	.2	7.333	.0
1.000	.0	2.667	1.9	4.333	.1	6.000	.3		
1.333	2.1	3.000	.7	4.667	.1	6.333	.1		

RUNOFF VOLUME = .75549 INCHES = 1.8377 ACRE-FEET
PEAK DISCHARGE RATE = 41.74 CFS AT 1.600 HOURS BASIN AREA = .0456 SQ. MI.

ADD HYD ID=70 HYD NO=170.1 ID I=67 ID II=4
PRINT HYD ID=70 CODE 10

PARTIAL HYDROGRAPH 170.10

TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS	TIME HRS	FLOW CFS
.000	.0	1.667	51.9	3.333	.3	5.000	.3	6.667	.0
.333	.0	2.000	19.6	3.667	.2	5.333	.4	7.000	.0
.667	.0	2.333	4.6	4.000	.2	5.667	.4		
1.000	.0	2.667	1.6	4.333	.2	6.000	.5		
1.333	16.1	3.000	.7	4.667	.2	6.333	.1		

RUNOFF VOLUME = .69384 INCHES = 3.2113 ACRE-FEET
 PEAK DISCHARGE RATE = 96.91 CFS AT 1.500 HOURS BASIN AREA = .0868 SQ. MI.

FINISH

NORMAL PROGRAM FINISH

END TIME (HR:MIN:SEC) = 20:58:38

APPENDIX C

EXISTING LAND TREATMENTS

BASIN C

A = 24.85 ac

103 homes

→ 4.1 du/acre

$$7 / ((4.1)^2 + (4.1) + (5 \times 4.1))$$

42.76% - Type D

28.62% - Type B

28.62% - Type C

BASIN D

26.35 ac

81 homes

3.1 du/acre

$$7 / ((3.1)^2 + (5 \times 3.1))$$

35.08% - Type D

32.46% - Type B

32.46% - Type C

PROJECT: _____

LARRY READ & ASSOCIATES
Civil Engineers

CALCULATIONS

DATE: _____

By: _____ Pg: _____ of _____

SIDEWALK CULVERT CAPACITY

- WEST SW/C TO BULLIDON 4-24" WIDE CULVERTS

$$Q_{100} = 9.5 \text{ cfs}$$

$$Q = CLH^{3/2} \quad C = 2.67$$

$$L = 2'$$

$$H < 0.67'$$

$$Q = 2.67 * 2 * (.67)^{3/2} = 2.93 \text{ cfs}$$

$$\text{OPENINGS REQUIRED} = 9.5 / 2.9 = 3.3 \text{ OK}$$

4 are provided

SOUTH SIDE CHANNEL TO BURLISON CULVERTS
Worksheet for Rectangular Channel

Project Description	
Project File	c:\haestad\fmw\couch_so.fm2
Worksheet	SOUTH CHANNEL TO BURLISON
Flow Element	Rectangular Channel
Method	Manning's Formula
Solve For	Discharge

Input Data	
Mannings Coefficient	0.013
Channel Slope	0.011945 ft/ft
Depth	0.50 ft
Bottom Width	10.00 ft

Results	
Discharge	36.93 cfs
Flow Area	5.00 ft ²
Wetted Perimeter	11.00 ft
Top Width	10.00 ft
Critical Depth	0.75 ft
Critical Slope	0.003265 ft/ft
Velocity	7.39 ft/s
Velocity Head	0.85 ft
Specific Energy	1.35 ft
Froude Number	1.84
Flow is supercritical.	

OK $Q_{100} = 9.5 \text{ cfs}$

hope nothing's in the channel

NORTH CHANNEL - EXISTING CAPACITY
Worksheet for Rectangular Channel

Project Description	
Project File	c:\haestad\fmw\couch1.fm2
Worksheet	NORTH CHANNEL
Flow Element	Rectangular Channel
Method	Manning's Formula
Solve For	Channel Depth

Input Data	
Mannings Coefficient	0.013
Channel Slope	0.035000 ft/ft
Bottom Width	9.50 ft
Discharge	12.60 cfs

Results		
Depth	0.19	ft
Flow Area	1.82	ft ²
Wetted Perimeter	9.88	ft
Top Width	9.50	ft
Critical Depth	0.38	ft
Critical Slope	0.003768	ft/ft
Velocity	6.92	ft/s
Velocity Head	0.74	ft
Specific Energy	0.94	ft
Froude Number	2.79	
Flow is supercritical.		