HYDROLOGY

L20/D27

FLINCHEM-BEALL

WAREHOUSE

L20/D27

1 PLAN

CITY OF ALBUQUERQUE
MUNICIPAL DEVELOPMENT DEPARTMENT
ENGINEERING DIVISION/DESIGN HYDROLOGY SECTION

PRE-DESIGN CONFERENCE RECAP

HYDROLOGY SECTION PROJECT NO.: L-20 DATE: 12/5/84

PLANNING DIVISION NOS. EPC: _____ DRB: _____

SUBJECT: Flancham - Beall Warehouses

LEGAL DESCRIP.: Lots 3 & 4 Skyline Heights

APPROVAL REQUESTED

____ PRELIMINARY PLAT ____ FINAL PLAT

____ SITE DEVELOPMENT PLAN X BUILDING PERMIT

____ ROUGH GRADING

	WHO:	REPRESENTING:
ATTENDANCE:	Richard Millard	A/A
	Elvidio Diniz	Resourse Tech
	Billy Goolsby	City

____ ~~Unapproved~~ Drainage Plan/Report required for Preliminary Plat and/or Site Development Plan sign-off.

X Approved Drainage Plan/Report required for Final Plat and/or Building Permit sign-off.

____ Subdivision Improvements Agreement or Financial Security required.

FINDINGS: Discharge determined by analysis of downstream capacity
City approved street grades for Garcia
Lot drainage to be kept seperate or covenant required.

The undersigned agrees that the above findings are summarized accurately and are only subject to change if further investigation reveals that they are not reasonable or that they are based on inaccurate information.

SIGNED: Billy J. Goolsby SIGNED: [illegible]

TITLE: CE/Hydrology TITLE: Res. Tech

DATE: 12/5/84 DATE: 12/5/84

NOTE PLEASE PROVIDE A COPY OF THIS RECAP WITH THE DRAINAGE SUBMITTAL

DRAINAGE INFORMATION SHEET

PROJECT TITLE: FLINCHEM-BEALL WAREHOUSES ZONE ATLAS/DRNG. FILE #: L-20

LEGAL DESCRIPTION: LOTS 3 and 4 SKYLINE HEIGHTS

CITY ADDRESS: 9910 TRUMBULL AVE. S.E. (LOT 3), 9901 TRUMBULL AVE. S.E. (LOT 4)

ENGINEERING FIRM: RESOURCE TECHNOLOGY INC. CONTACT: ELVIDIO DINIZ

ADDRESS: 7800 MARBLE AVE. N.E. ALB. N.M. 87110 PHONE: 266-3320

OWNER: CHOCTAW CONSTRUCTION CO. CONTACT: BOBBY BEALL, JIM FLINCHEM

ADDRESS: P.O. BOX 13750 ALB. N.M. 87192 PHONE: 293-0301

ARCHITECT: R.L. MILLARD CO. INC. CONTACT: RICHARD MILLARD

ADDRESS: 5345 WYOMING N.E. SUITE 102 ALB. N.M. 87109 PHONE: 822-8888

SURVEYOR: RESOURCE TECHNOLOGY INC. CONTACT: ELVIDIO DINIZ

ADDRESS: 7800 MARBLE AVE. N.E. ALB. N.M. 87110 PHONE: 266-3320

CONTRACTOR: CHOCTAW CONSTRUCTION CO. CONTACT: BOBBY BEALL, JIM FLINCHEM

ADDRESS: P.O. BOX 13750 ALB. N.M. 87192 PHONE: 293-0301

PRE-DESIGN MEETING:

✓ YES

___ NO

✓ COPY OF CONFERENCE RECAP SHEET PROVIDED

DRB NO. —

EPC NO. ___

PROJ. NO. ___

RECEIVED FEB 21 1985 HYDROLOGY SECTION

TYPE OF SUBMITTAL:

___ DRAINAGE REPORT

✓ DRAINAGE PLAN

___ CONCEPTUAL GRADING & DRAINAGE PLAN

✓ GRADING PLAN

___ EROSION CONTROL PLAN

___ ENGINEER'S CERTIFICATION

CHECK TYPE OF APPROVAL SOUGHT:

___ SKETCH PLAT APPROVAL

___ PRELIMINARY PLAT APPROVAL

___ SITE DEVELOPMENT PLAN APPROVAL

___ FINAL PLAT APPROVAL

✓ BUILDING PERMIT APPROVAL

___ FOUNDATION PERMIT APPROVAL

___ CERTIFICATE OF OCCUPANCY APPROVAL

___ ROUGH GRADING PERMIT APPROVAL

___ GRADING/PAVING PERMIT APPROVAL

___ OTHER ___ (SPECIFY)

DATE SUBMITTED: ___

BY: ELVIDIO DINIZ

City of Albuquerque
P.O. BOX 1293 ALBUQUERQUE, NEW MEXICO 87103

DESIGN HYDROLOGY SECTION
123 Central NW, Albuquerque, NM 87102
(505) 766-7644

March 11, 1985

Elvidio Diniz
Resource Technology, Inc.
7800 Marble Avenue, NE
Albuquerque, New Mexico 87110

RE: DRAINAGE PLAN FOR FLINCHEM-BEALL WAREHOUSE
(L-20/D27) RECEIVED FEBRUARY 21, 1985

Dear Mr. Diniz:

I have reviewed the referenced plan and forward these comments:

1. Please submit city approved street grades for Garcia Street.

2. Grading a berm in Lot 5 will require written concurrence from the property owner.

3. Require drainage easements for the following areas:

   a. Drainage easement for the flows between Lots 2 & 3.

   b. Drainage easement for the flows between Lots 3 & 4 and Lots 5 & 6.

4. Swale 4 should discharge to the street through a sidewalk culvert.

If you have any questions or comments regarding this project, please call me at 766-7644.

Cordially,

Carlos A. Montoya

Carlos A. Montoya, P.E.
City/County Floodplain Administrator

CAM/bsj

RESUBMITTAL DRAINAGE INFORMATION SHEET

PROJECT TITLE: FLINCHEM-BEALL WAREHOUSES ZONE ATLAS/DRNG. FILE #: L-20/D27

LEGAL DESCRIPTION: LOTS 3 and 4 SKYLINE HEIGHTS

CITY ADDRESS: 9910 TRUMBULL AVE. S.E. (LOT 3), 9900 TRUMBULL AVE. S.E. (LOT 4)

ENGINEERING FIRM: RESOURCE TECHNOLOGY INC. CONTACT: ELVIDIO DINIZ

ADDRESS: 7800 MARBLE AVE. N.E. ALB. N.M. 87110 PHONE: 266-3320

OWNER: CHOCTAW CONSTRUCTION CO. CONTACT: BOBBY BEALL, JIM FLINCHEM

ADDRESS: P.O. BOX 13750 ALB. N.M. 87192 PHONE: 293-0301

ARCHITECT: R.L. MILLARD CO. INC. CONTACT: RICHARD MILLARD

ADDRESS: 5345 WYOMING N.E. SUITE 102 ALB. N.M. 87109 PHONE: 822-8888

SURVEYOR: RESOURCE TECHNOLOGY INC. CONTACT: ELVIDIO DINIZ

ADDRESS: 7800 MARBLE AVE. N.E. ALB. N.M. 87110 PHONE: 266-3320

CONTRACTOR: CHOCTAW CONSTRUCTION CO. CONTACT: BOBBY BEALL, JIM FLINCHEM

ADDRESS: P.O. BOX 13750 ALB. N.M. 87192 PHONE: 293-0301

RECEIVED MAR 18 1985 HYDROLOGY SECTION

PRE-DESIGN MEETING:

✓ YES

___ NO

✓ COPY OF CONFERENCE RECAP SHEET PROVIDED

DRB NO. _____

EPC NO. _____

PROJ. NO. _____

TYPE OF SUBMITTAL:

___ DRAINAGE REPORT

✓ DRAINAGE PLAN

___ CONCEPTUAL GRADING & DRAINAGE PLAN

✓ GRADING PLAN

___ EROSION CONTROL PLAN

___ ENGINEER'S CERTIFICATION

CHECK TYPE OF APPROVAL SOUGHT:

___ SKETCH PLAT APPROVAL

___ PRELIMINARY PLAT APPROVAL

___ SITE DEVELOPMENT PLAN APPROVAL

___ FINAL PLAT APPROVAL

✓ BUILDING PERMIT APPROVAL

___ FOUNDATION PERMIT APPROVAL

___ CERTIFICATE OF OCCUPANCY APPROVAL

___ ROUGH GRADING PERMIT APPROVAL

___ GRADING/PAVING PERMIT APPROVAL

___ OTHER _____ (SPECIFY)

DATE SUBMITTED: _____

BY: ELVIDIO DINIZ

City of Albuquerque
P.O. BOX 1293 ALBUQUERQUE, NEW MEXICO 87103

DESIGN HYDROLOGY SECTION
123 Central NW, Albuquerque, NM 87102
(505) 766-7644

March 25, 1985

Elvidio Diniz
Resource Technology, Inc.
7800 Marble Avenue, NE
Albuquerque, New Mexico 87110

RE: DRAINAGE PLAN FOR FLINCHEM-BEALL WAREHOUSE
(L-20/D27) RECEIVED MARCH 19, 1985

Dear Mr. Diniz:

The referenced plan dated March 15, 1985, is approved.

However, prior to sign-off by Hydrology for the Certificate of Occupancy, a plat must be submitted to show the appropriate easements.

Please attach a copy of this approved plan along with the appropriately approved "Drainage Facilities Within City Right-of-Way" document to the construction set prior to Hydrology sign-off.

If you have any questions or comments regarding this project, please call me at 766-7644.

Cordially,

Carlos A. Montoya

Carlos A. Montoya, P.E.
City/County Floodplain Administrator

CAM/bsj

cc: Greg Olson
Design Section

DRAINAGE INFORMATION SHEET

PROJECT TITLE: FLINCHEM-BEALL WAREHOUSES ZONE ATLAS/DRNG. FILE #: L-20/D27 redev

LEGAL DESCRIPTION: LOTS 3 and 4 SKYLINE HEIGHTS

CITY ADDRESS: 9910 TRUMBULL AVE. S.E. (LOT 3), 9900 TRUMBULL AVE. S.E. (LOT 4)

ENGINEERING FIRM: RESOURCE TECHNOLOGY INC. CONTACT: ELVIDIO DINIZ

ADDRESS: 7800 MARBLE AVE. N.E. ALB. N.M. 87110 PHONE: 266-3320

OWNER: CHOCTAW CONSTRUCTION CO. CONTACT: BOBBY BEALL, JIM FLINCHEM

ADDRESS: P.O. BOX 13750 ALB. N.M. 87192 PHONE: 293-0301

ARCHITECT: R.L. MILLARD CO. INC. CONTACT: RICHARD MILLARD

ADDRESS: 5345 WYOMING N.E. SUITE 102 ALB. N.M. 87109 PHONE: 822-8888

SURVEYOR: RESOURCE TECHNOLOGY INC. CONTACT: ELVIDIO DINIZ

ADDRESS: 7800 MARBLE AVE. N.E. ALB. N.M. 87110 PHONE: 266-3320

CONTRACTOR: CHOCTAW CONSTRUCTION CO. CONTACT: BOBBY BEALL, JIM FLINCHEM

ADDRESS: P.O. BOX 13750 ALB. N.M. 87192 PHONE: 293-0301

PRE-DESIGN MEETING:

✓ YES

___ NO

✓ COPY OF CONFERENCE RECAP SHEET PROVIDED

DRN. NO. ___

ECC NO. ___

FPDM NO. ___

RECEIVED MAY 09 1985 HYDROLOGY SECTION

TYPE OF SUBMITTAL:

___ DRAINAGE REPORT

✓ DRAINAGE PLAN

___ CONCEPTUAL GRADING & DRAINAGE PLAN

✓ GRADING PLAN

___ EROSION CONTROL PLAN

___ ENGINEER'S CERTIFICATION

CHECK TYPE OF APPROVAL SOUGHT:

___ SKETCH PLAT APPROVAL

___ PRELIMINARY PLAT APPROVAL

___ SITE DEVELOPMENT PLAN APPROVAL

___ FINAL PLAT APPROVAL

✓ BUILDING PERMIT APPROVAL

___ FOUNDATION PERMIT APPROVAL

___ CERTIFICATE OF OCCUPANCY APPROVAL

___ ROUGH GRADING PERMIT APPROVAL

___ GRADING/PAVING PERMIT APPROVAL

___ OTHER ___ (SPECIFY)

DATE SUBMITTED: ___

BY: ELVIDIO DINIZ

RECEIVED
MAY 09 1985
HYDROLOGY SECTION

INTRODUCTION

The Grading and Drainage Plan for Flinchem-Beall Warehouses's was previously approved, however, the owner recently decided to change the original grading and drainage plan. The proposed physical and hydraulic changes are shown on the attached Revised Grading and Drainage Plan.

OFF-SITE FLOWS

An earth berm will be located across the swale between lots 3 and 6 to divert flows from off-site areas A and B into the swale between lots 2 and 3. This swale (Swale 3) will be asphalt lined (see Revised Grading and Drainage Plan). The extent of the 100-yr. peak flow water surface will vary with available flow depth in Swale 3; ranging from 54 feet (about 15 feet up the asphalt parking lots for lots 2 and 3 near the top of Swale 3) near the top of Swale 3 and decreasing to 20 feet between the parking lots for lots 2 and 3 near Trumbull Ave. SE..

Swale 3 will discharge through a 10-foot wide depressed sidewalk section into Trumbull Ave. SE..

ON-SITE FLOWS

Flows from Lot 3 will drain into Swale 3 between lots 2 and 3 along with flow from off-site Lot 2.

Flows from Lot 4 will drain down a swale in the center of the parking lot and will discharge through the driveway into Trumbull Ave. SE..

HYDRAULICS

	Top Swale 3	Section 3A	Section 3B	Swale 4
Flow width (ft.)	50	20.4	10	11.10
Flow depth (ft.)	0.40	0.47	0.55	0.20
Slope (ft./ft.)	0.0046	0.0046	0.05	0.0038
Velocity (ft./sec.)	2.18	3.48	5.0	1.45
Design Q (cfs.)	26.20	29.10	35	2.53
Actual Q (cfs.)	24.12	29.10	29.10	2.53
Freeboard (ft.)	0.64	1.40	---	0.60

City of Albuquerque
P.O. BOX 1293 ALBUQUERQUE, NEW MEXICO 87103

DESIGN HYDROLOGY SECTION
123 Central NW, Albuquerque, NM 87102
(505) 766-7644

May 22, 1985

Elvidio Diniz
Resource Technology, Inc.
7800 Marble Avenue, NE
Albuquerque, New Mexico 87110

REF: REVISED DRAINAGE PLAN FOR FLINCHEM-BEALL WAREHOUSE
(L20/D27) RECEIVED MAY 9, 1985

Dear Mr. Dinez:

Based on the information provided on your May 9, 1985 resubmittal, listed below you will find certain comments that will need to be addressed before final approval is granted :

1. New information sheet designating resubmittal.
2. Engineers stamp with signature and resubmittal date.
3. Revised Special Order 19 required for the proposed depressed sidewalk transition.
4. Replat showing the required easements indicated on your plan.
5. Section showing proposed berm for construction purposes.
6. Please be advised that no developed flows will be allowed across public sidewalks.

7. Permit already been issued on the old plan, please coordinate with contractor.

If you have any questions or comments, please feel free to contact me at 766-7644.

Sincerely,

Carlos A Montoya
City/County Flood Plain Admin.

CAM/BJM/cl

DRAINAGE INFORMATION SHEET

PROJECT TITLE: Flinchum-Beall Warehouses ZONE ATLAS/DRNG. FILE #: L-20/D27

LEGAL DESCRIPTION: Lots 3 + 4 Skyline Heights

CITY ADDRESS: 9910 and 9900 Trumbull Ave. SE.

ENGINEERING FIRM: Resource Tech. Inc. CONTACT: E. Diniz

ADDRESS: 2620 San Mateo NE #B PHONE: 266-3320

OWNER: Choctaw Const. Co. CONTACT: Jim Flinchem

ADDRESS: P.O. Box 13750 Albuq PHONE: 293-0301

ARCHITECT: R.L. Millard Co. CONTACT: Richard Millard

ADDRESS: 5345 Wyoming NE #102 PHONE: 822-8888

SURVEYOR: Resource Tech. Inc CONTACT: —

ADDRESS: — PHONE: —

CONTRACTOR: Choctaw Const. Co CONTACT: —

ADDRESS: — PHONE: —

RECEIVED
OCT 31 1985
HYDROLOGY SECTION

PRE-DESIGN MEETING:

___ YES

X NO

___ COPY OF CONFERENCE RECAP SHEET PROVIDED

DRB NO. _____

EPC NO. _____

PROJ. NO. _____

TYPE OF SUBMITTAL:

___ DRAINAGE REPORT

___ DRAINAGE PLAN

___ CONCEPTUAL GRADING & DRAINAGE PLAN

___ GRADING PLAN

___ EROSION CONTROL PLAN

✓ ENGINEER'S CERTIFICATION

CHECK TYPE OF APPROVAL SOUGHT:

___ SKETCH PLAT APPROVAL

___ PRELIMINARY PLAT APPROVAL

___ SITE DEVELOPMENT PLAN APPROVAL

___ FINAL PLAT APPROVAL

___ BUILDING PERMIT APPROVAL

___ FOUNDATION PERMIT APPROVAL

✓ CERTIFICATE OF OCCUPANCY APPROVAL

___ ROUGH GRADING PERMIT APPROVAL

___ GRADING/PAVING PERMIT APPROVAL

___ OTHER _____ (SPECIFY)

DATE SUBMITTED: 31 October 1985

BY: Elvidio Diniz

x. C.

City of Albuquerque

P.O. BOX 1293 ALBUQUERQUE, NEW MEXICO 87103

DESIGN HYDROLOGY SECTION
123 Central NW, Albuquerque, NM 87102
(505) 766-7644

November 4, 1985

Elvidio V. Diniz
Resource Technology, Inc.
2620 San Mateo Blvd., NE Suite B
Albuquerque, New Mexico 87110

RE: CERTIFICATION FOR FLINCHEM-BEALL WAREHOUSE
RECEIVED OCTOBER 31, 1985 (L-20/D27)

Dear Mr. Diniz:

Based on the information provided on your October 31, 1985 submittal, listed you will find certain concerns that will need to be addressed before certification can be accepted:

1. Complete information sheet designating certification resubmittal

2. Provide copies of construction approval from the appropriate government agencies for construction within their rights-of-way and/or easements for:

   a. The side walk culvert with steel plate.

   b. Concrete drivepads per City Standard P113.

3. Plat showing the appropriate easements for flows across lot lines.

4. Approved street grades for Garcia Street.

If I can be of further assistance, please feel free to contact me at 766-7644.

Cordially,

Bernie J. Montoya

Bernie J. Montoya, C.E.
Engineering Assistant

BJM/bsj

RESOURCE TECHNOLOGY, INCORPORATED

~~7800 MARBLE AVENUE NE, SUITE 5~~
~~ALBUQUERQUE, NEW MEXICO 87110~~
~~(505) 266-3520~~

2620 SAN MATEO NE, SUITE B
ALBUQUERQUE, NM 87110
(505) 884-0059

November 12, 1985

RECEIVED
NOV 15 1985
HYDROLOGY SECTION

Mr. Bernie J. Montoya, C.E.
Engineering Assistant
Design Hydrology Section
City of Albuquerque
P.O. Box 1293
Albuquerque, NM 87103

Dear Bernie:

In response to your letter dated November 4, 1985, we submit the following:

1. Completed information sheet

2. Explanation -

   a - The entire east side of Lot 3 has been paved and is being used as a parking lot. The low point in the parking lot is a swale to direct all flows through a drive cut and into Trumbull Avenue SE. Therefore sidewalk culverts are not needed and have not been constructed.

   b - It is my understanding that the concrete drivepads have been inspected and approved by Mr. Barry Simmons.

3. Appropriate documentary easements for flows along the east boundary of Lot 3 are attached.

4. Street grades for Garcia Street SE were prepared by the City of Albuquerque; a copy is attached.

I believe that this information will be satisfactory and that the certification will be accepted. Please call if you have any questions.

Very truly yours,

Elvidio V. Diniz

Elvidio V. Diniz, P.E.
Principal Engineer

EVD/ec

DRAINAGE INFORMATION SHEET

PROJECT TITLE: Flinchem-Beall Warehouses ZONE ATLAS/DRNG. FILE #: L-20/27

LEGAL DESCRIPTION: Lots 3 + 4 Skyline Heights

CITY ADDRESS: 9910 and 9900 Trumbull Ave SE.

ENGINEERING FIRM: Resource Tech. Inc. CONTACT: E. Diniz

ADDRESS: 2620 San Mateo NE #B PHONE: 266-3320

OWNER: Choctaw Const. Co. CONTACT: Jim Flinchem

ADDRESS: P.O. Box 13750 Alb. NM PHONE: 293-0301

ARCHITECT: R.L. Millard Co. CONTACT: Richard Millard

ADDRESS: 5345 Wyoming NE #102 PHONE: 822-8888

SURVEYOR: Resource Tech. Inc CONTACT: –

ADDRESS: – PHONE: –

CONTRACTOR: Choctaw Const. Co CONTACT: –

ADDRESS: – PHONE: –

RECEIVED NOV 15 1985 HYDROLOGY SECTION

PRE-DESIGN MEETING:

___ YES

X NO

___ COPY OF CONFERENCE RECAP SHEET PROVIDED

DRB NO. _____

EPC NO. _____

PROJ. NO. _____

TYPE OF SUBMITTAL:

___ DRAINAGE REPORT

___ DRAINAGE PLAN

___ CONCEPTUAL GRADING & DRAINAGE PLAN

___ GRADING PLAN

___ EROSION CONTROL PLAN

✓ ENGINEER'S CERTIFICATION

responses to letter by B. Montoya

CHECK TYPE OF APPROVAL SOUGHT:

___ SKETCH PLAT APPROVAL

___ PRELIMINARY PLAT APPROVAL

___ SITE DEVELOPMENT PLAN APPROVAL

___ FINAL PLAT APPROVAL

___ BUILDING PERMIT APPROVAL

___ FOUNDATION PERMIT APPROVAL

✓ CERTIFICATE OF OCCUPANCY APPROVAL

___ ROUGH GRADING PERMIT APPROVAL

___ GRADING/PAVING PERMIT APPROVAL

___ OTHER _____ (SPECIFY)

DATE SUBMITTED: 31 October 1985 resubmitted 11/15/85

BY: Elvidio Diniz

4

85 95855

U 953

GRANT OF EASEMENT
FOR
DRAINAGE

As owner of Lot 3, Block 54A Skyline Addition, Albuquerque, NM, I James Flinchem, agree to provide a permanent drainage easement to the owner of Lot 2, Block 54A Skyline Heights Addition, Albuquerque, NM as described below:

A strip of land along the entire east property line of Lot 3, Block 54A Skyline Heignts Addition, Albuquerque, NM being 28 feet wide at the south end and 10 feet wide at the north end.

IN WITNESS WHEREOF, the parties have set their hands and seals this 12 day of NOVEMBER, 1985.

James L. Flinchem

STATE OF NEW MEXICO)
) ss.
COUNTY OF BERNALILLO)

The foregoing instrument was acknowledged before me this 12th day of November, 1985, by James L. Flinchem

OFFICIAL SEAL
MARLENE TURNER
NOTARY PUBLIC, STATE OF NEW MEXICO
My Commission Expires 7-3-89

Marlene Turner
Notary Public

STATE OF NEW MEXICO
COUNTY OF BERNALILLO
FILED FOR RECORD
1985 NOV 13 PM 2:48
953
PG
DOLORES C. WALLER
CLERK & RECORDER

My Commission Expires:

7-3-89

M-290A

85 95854

0 952

GRANT OF EASEMENT
FOR
DRAINAGE

As owner of Lot 2, Block 54A Skyline Addition, Albuquerque, NM, I Sandra Byran, agree to provide a permanent drainage easement to the owner of Lot 3, Block 54A Skyline Heights Addition, Albuquerque, NM as described below:

A strip of land along the entire west property line of Lot 2, Block 54A Skyline Heights Addition, Albuquerque, NM being 28 feet wide at the south end and 10 feet wide at the north end.

IN WITNESS WHEREOF, the parties have set their hands and seals this 12 day of November, 1985.

Sandra Bryan

STATE OF NEW MEXICO)
) ss.
COUNTY OF BERNALILLO)

The foregoing instrument was acknowledged before me this 12th day of November, 1985, by Sandra Bryan

OFFICIAL SEAL
MARLENE TUTHILL
NOTARY PUBLIC - STATE OF NEW MEXICO
My Commission Expires 7-3-89

Marlene Tuthill
Notary Public

STATE OF NEW MEXICO
COUNTY OF BERNALILLO
FILED FOR RECORD
1985 NOV 13 PM 2:48
952
M-2204
JAMES C. WALLER
CLERK & RECORDER

My Commission Expires:

7-3-89

City of Albuquerque
P.O. BOX 1293 ALBUQUERQUE, NEW MEXICO 87103

DESIGN HYDROLOGY SECTION
123 Central NW, Albuquerque, NM 87102
(505) 766-7644

December 6, 1985

Elvidio V. Diniz
Resource Technology, Inc.
2620 San Mateo Blvd., NE Suite B
Albuquerque, New Mexico 87110

RE: REVISED CERTIFICATION FOR FLINCHEM-BEALL WAREHOUSE
ENGINEERS STAMP DATED OCTOBER 30, 1985 (L-20/D27)

Dear Mr. Diniz:

Based on the information provided on your November 15, 1985 resubmittal, certification for the referenced drainage plan is acceptable.

Please provide our office with a copy of the filed addendum to the Grant of Easement as soon as it becomes available.

If I can be of further assistance, please call me at 766-7644.

Cordially,

Bernie J. Montoya

Bernie J. Montoya, C.E.
Engineering Assistant

BJM/bsj

DRAINAGE INFORMATION SHEET

PROJECT TITLE: Flinchem-Beal Warehouse ZONE ATLAS/DRNG. FILE #: L-20-D-27

LEGAL DESCRIPTION: Lots 3 + 4 Skyline Heights

CITY ADDRESS: 9910 and 9900 Trumbull Ave

ENGINEERING FIRM: Resource Tech CONTACT: ~~884-0020~~ E. Diniz

ADDRESS: 2620 San Mateo #B PHONE: 884-0020

OWNER: Choctaw Const. Co CONTACT: Jim Flinchem

ADDRESS: P.O. Box 13750 Alb. NM PHONE: 293-0301

ARCHITECT: R. L. Millard CONTACT: R. Millard

ADDRESS: 5345 Wyoming NE #102 PHONE: 822-8888

SURVEYOR: Resource Tech. CONTACT: —

ADDRESS: — PHONE: —

CONTRACTOR: Choctaw Const. Co CONTACT: —

ADDRESS: — PHONE: —

PRE-DESIGN MEETING:

___ YES

X NO

___ COPY OF CONFERENCE RECAP SHEET PROVIDED

DRB NO. ___

EPC NO. ___

PROJ. NO. ___

RECEIVED DEC 12 1985 HYDROLOGY SECTION

TYPE OF SUBMITTAL:

___ DRAINAGE REPORT

___ DRAINAGE PLAN

___ CONCEPTUAL GRADING & DRAINAGE PLAN

___ GRADING PLAN

___ EROSION CONTROL PLAN

✓ ENGINEER'S CERTIFICATION

CHECK TYPE OF APPROVAL SOUGHT:

___ SKETCH PLAT APPROVAL

___ PRELIMINARY PLAT APPROVAL

___ SITE DEVELOPMENT PLAN APPROVAL

___ FINAL PLAT APPROVAL

___ BUILDING PERMIT APPROVAL

___ FOUNDATION PERMIT APPROVAL

✓ CERTIFICATE OF OCCUPANCY APPROVAL

___ ROUGH GRADING PERMIT APPROVAL

___ GRADING/PAVING PERMIT APPROVAL

___ OTHER ___ (SPECIFY)

DATE SUBMITTED: ___

BY: ___

L20/027

85 51257

RECEIVED DEC 12 1985 HYDROLOGY SECTION

853

ADDENDUM
TO
GRANT OF EASEMENTS

This addendum to Grant of Easements for Drainage recorded in Book M-290A page 952 and Book M-290A page 953 is as follows:

Said Easement is intended to be permanent in nature for the uses and purposes recited in the approved drainage report filed with the City of Albuquerque, its successors and assigns, until such time as the Easement is no longer necessary as determined by the City Engineer or his representative.

The benefits and obligations of the owners set forth in said Drainage Easements shall be binding upon the owners, their heirs and assigns.

IN WITNESS WHEREOF, the parties have set their hands and seals this 3rd day of December, 1985.

James L. Flinchum
Owner Lot 3

Sandra J. Bryan
Owner Lot 2

STATE OF NEW MEXICO)
)ss.
COUNTY OF BERNALILLO)

The foregoing instrument was acknowledged before me this 3rd day of December, 1985, by James L. Flinchum and Sandra J. Bryan

7-3-89

Marlene Toothe
Notary Public

My Commission Expires:

7-3-89

STATE OF NEW MEXICO
COUNTY OF BERNALILLO
FILED FOR RECORD

1985 DEC 12 PM 3:45

mm 300A 853

RECEIVED
FEB 21 1985
HYDROLOGY SECTION

GENERAL

Zone Atlas page L-20; Flood Hazard Zone C

LAND USE

Present - Lots 3 and 4 are undeveloped with no structures and are bounded on the north by Trumbull Avenue S.E. which is paved with sidewalks, curbs and gutters. Lot 4 is bounded on the west by Garcia Street S.E., which is unpaved and without sidewalk, curb or gutter. Lots 5 and 6 are developed with a commercial building and are south of lots 4 and 3, respectively. Lot 2 is east of Lot 3 and is also developed with a commercial building.

Proposed - Lots 3 and 4 will each be developed for a commercial building.

SOIL TYPE

Embudo series - Gravelly fine sandy loam which also covers all off-site contributing areas.

Hydrologic Soil Group B.

TOTAL AREA

Lot 3 - approximately 240 ft. x 107 ft. = 25,526 sq. ft. (0.586 acres)
Lot 4 - approximately 240 ft. x 112 ft. = 26,833 sq. ft. (0.616 acres)
Total area of lots 3 and 4 is 52,359 sq. ft. (1.202 acres)

Off-Site Area A draining to southeast corner of Lot 3 = 4.682 acres
Off-Site Area B draining to southeast corner of Lot 3 = 1.006 acres
Off-Site Lot 2 draining to swale common to Lot 3
= approximately 25,526 sq. ft. (0.586 acres)

HYDROLOGY

TIME OF CONCENTRATION

Lot 4 - Largest on-site subarea
Flow length = 280 ft.
Elevation difference = 3 ft.
Time of concentration = 4.85 minutes; use Tc = 10 minutes

Area A - Largest off-site subarea
Flow length = 653 ft.
Elevation difference = 10 ft.
Time of concentration = 5.73 minutes; use Tc = 10 minutes

6-HR RAINFALL DEPTH

10-yr. = 1.58 in.
100-yr. = 2.40 in.

RAINFALL INTENSITY

10-yr. = 3.34 in./hr.
100-yr. = 5.07 in./hr.

RUNOFF COEFFICIENTS

Undeveloped conditions - lots 3 and 4:
impervious area 0%; c = 0.34
Developed conditions -
Lot 3 impervious area 81%; c = 0.84
Lot 4 impervious area 76%; c = 0.81

Off-Site areas A and B developed condition:
impervious area 81%; c = 0.84

RUNOFF RATES

	10-yr. (cfs.)	100-yr. (cfs.)
Peak Discharge; On-Site		
Undeveloped conditions		
Lot 3	0.67	1.01
Lot 4	0.70	1.06
Developed conditions		
Lot 3	1.64	2.49
Lot 4	1.66	2.53
Peak Discharge; Off-Site		
Developed conditions		
Drainage Area A	13.14	19.93
Drainage Area B	2.82	4.28
Combined drainage areas A and B	15.96	24.21
Lot 2	1.64	2.49
Combined lots 2 and 3	3.28	4.98

where?

RUNOFF VOLUMES

	10-yr. (cu.ft.)	100-yr. (cu.ft.)
Total Volume; On-Site		
Undeveloped conditions		
Lot 3	1,143	1,736
Lot 4	1,201	1,825
Developed conditions		
Lot 3	2,823	4,288
Lot 4	2,862	4,347
Total Volume; Off-Site		
Developed conditions		
Drainage Area A	22,576	34,292
Drainage Area B	4,847	7,362
Total drainage areas A and B	27,423	41,654
Lot 2	2,823	4,288
Total lots 2 and 3	5,646	8,576

OFF-SITE FLOWS

Three off-site drainage areas exist, and are named off-site drainage areas A, B and Lot 2 in this drainage plan. Drainage Area A includes lots 1, 8 and the large truck yard east of lots 1 and 8 and bounded by Trumbull Ave. S.E., Conchas St. S.E. and Southern Ave. S.E.. Drainage Area B includes lots 6 and 7. Swale A carries flow from Off-Site Area A which drains from east to west, and enters the southeast corner of Lot 3. Swale B carries flow from Off-Site Area B which drains from south to north and also enters the southeast corner of Lot 3. These swales intersect at the southeast corner of Lot 3. Swale AB drains along the southern property line of lots 3 and 4 and discharges through a transition onto Garcia St. S.E.. These flows move north along Garcia St. S.E. to Trumbull Ave. S.E.. Low flows in Swale AB are diverted into Swale 4 which is located inside the property line of Lot 4 and parellel with Garcia St. S.E.. The flows in Swale 4 discharge into Garcia St. S.E. near Trumbull Ave. S.E.. The flow from Lot 2 is directed to Swale 3 located along the property boundary between lots 2 and 3, and which generally drains north to Trumbull Ave. S.E..

STREET FLOWS

The basin area considered in determining 100-year street flows is bounded by Central Ave. S.E., Eubank Blvd. S.E., Southern Ave. S.E. and Moon . S.E., with the outlet at Central Ave. S.E. and Moon St. S.E.. Street flow capacities are discussed with due consideration to inlet grates, storm sewer locations and pipe sizes.

Figure 1 shows the locations of the R.C. pipes and inlet grates discussed in the following paragraphs. A 36-inch R.C. pipe beginning at the intersection of Moon St. S.E. and Trumbull Ave. S.E. and a 30-inch R.C. pipe along Central Ave. S.E. combine at the intersection of Moon St. S.E.

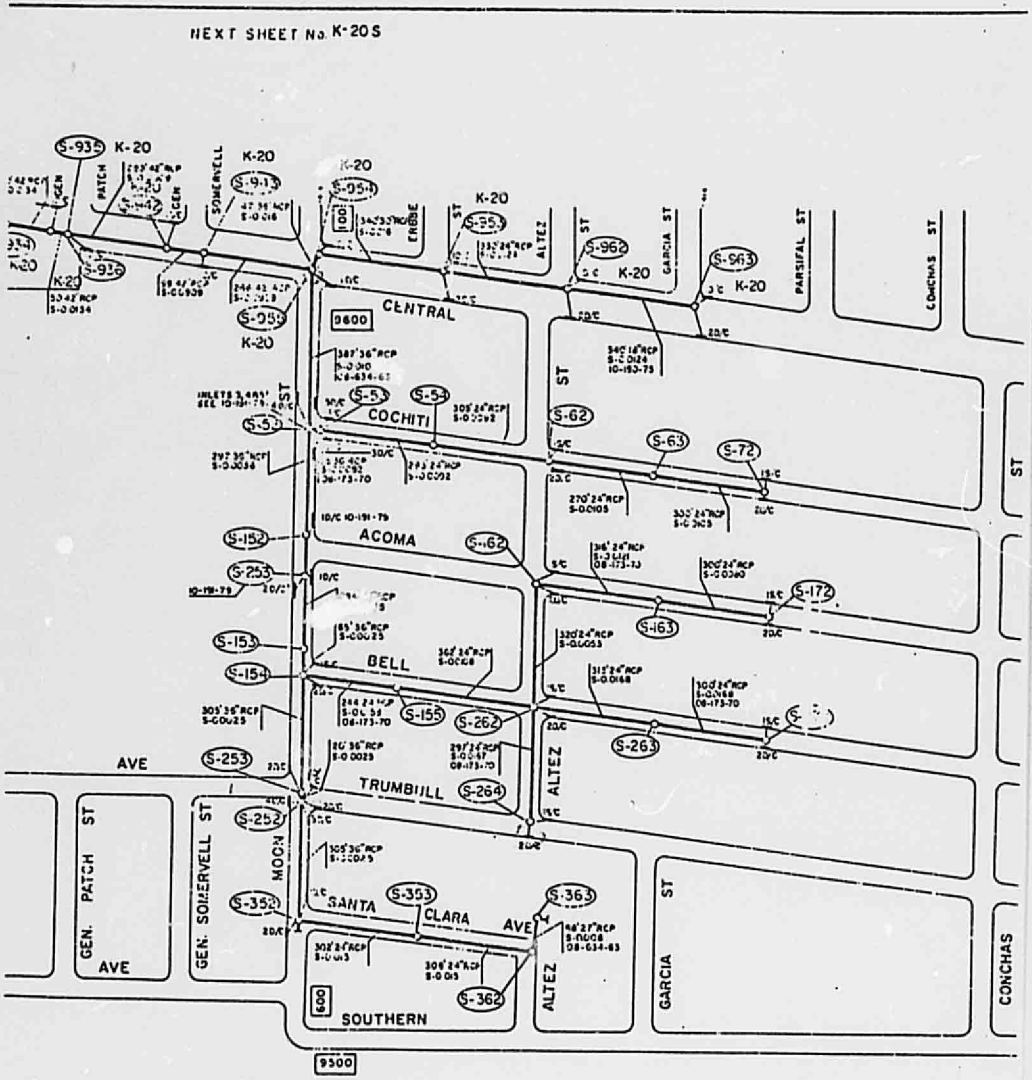


FIGURE 1
Location of R.C. pipes and inlet grates

MILITARY

and Central Ave. S.E. into a 42-inch R.C. pipe downstream and west of that intersection.

Street flows from Trumbull Ave. S.E. and Garcia St. S.E. and the on- and off-site flows from lots 3 and 4 will drain to a Type C double grate storm sewer inlet located on the south side of Trumbull Ave. S.E. at the intersection with Altez Ave. S.E.. The capacity of the 18-inch R.C. pipe from the inlet to the main 24-inch R.C. pipe (below Altez Ave. S.E.) is about 19 cfs.. The 100-year flow down Trumbull Ave. S.E. exceeds this capacity, and excess flow will continue down Trumbull Ave. S.E. to Moon St. S.E..

The expected peak flow at the intersection of Moon St. S.E. and Trumbull Ave. S.E. is 89.26 cfs. with the basin in present condition and 91.44 cfs. with development of lots 3 and 4. Six inlet grates, located at the intersection of Trumbull Ave. S.E. and Moon St. S.E., drain to a 36-inch R.C. pipe below Moon St. S.E.. The capacity of the 36-inch R.C. pipe is about 30 cfs., and increases to 58 cfs. near the intersection of Cochiti Rd. S.E. and Moon St. S.E.. Flows exceeding the capacity of these inlets and the 36-inch R.C. pipe will drain north along Moon Ave. S.E. to Central Ave. S.E. because there is a water block across Trumbull Ave. S.E. immediately west of Moon St. S.E. there are six additional inlet grates located along Moon St. S.E. from the intersection of Moon St. S.E. and Trumbull Ave. S.E. to Central Ave. S.E..

Eight inlet grates located along Central Ave. S.E. between Conchas St. S.E. and Moon St. S.E., drain to the 30-inch R.C. pipe below Central Ave. S.E. which has a capacity of 45 cfs.. Four inlet grates located on Central Ave. S.E. west and within two blocks of the intersection of Central Ave. S.E. and Moon St. S.E., drain to the 42-inch R.C. pipe which has a capacity of 263 cfs..

The expected 100-year peak flow at the intersection of Moon St. S.E. and Central Ave. S.E. is 274 cfs. with the basin in present condition and 276 cfs. with the development of lots 3 and 4. The capacity of all the above R.C. pipes was determined using non-pressure flow; therefore, with pressure flow at each inlet and in each pipe, the 42-inch R.C. pipe below Central Ave. S.E. should carry the 100-year flow with present basin conditions and with development of lots 3 and 4. Street flows may increase only slightly in the future because very little basin area is available for development.

ON-SITE FLOWS

The flow from the building and the parking lot on Lot 3 will drain to existing Swale 3 on the property line between lots 2 and 3. The flow from Lot 2 currently drains to this swale. Flows from this swale will drain across the northern property boundary through two 24-inch wide sidewalk culverts with steel plate tops and discharge into Trumbull Ave. S.E..

The flow from the building and parking lot of Lot 4 will drain to Swale 4 which is parallel to Garcia St. S.E. and located between the parking lot

and the property line. The swale will discharge to the southeast corner of the intersection of Trumbull Ave. S.E. and Garcia St. S.E.. Swale 4 will also discharge the flows from off-site areas A and B. In order to accomplish this drainage plan the 5-foot utility easement in Lot 4 along Garcia St. S.E. will be increased to 12 feet and the 7-foot utility easement along the southern boundary of lots 3 and 4 will be increased to 10 feet. A 12-foot drainage easement will be provided in Lot 3 between the east property line and the parking lot.

HYDRAULICS

SWALE CAPACITY

Swale AB1
- Flow width 20.0 ft.
- Flow depth 0.5 ft.
- Slope 0.0073
- Design Q 24.2 cfs.
- Actual Q 24.2 cfs.
- Freeboard 0.6 ft.

Swale AB2
- Flow width 13 ft.
- Flow depth 0.7 ft.
- Slope 0.0073
- Design Q 24.2 cfs.
- Actual Q 24.2 cfs.
- Freeboard 0.7 cfs.

Swale 4T
- Bottom width 2.9 ft.
- Flow depth 1.0 ft.
- Slope 0.0115
- Design Q 31.7 cfs.
- Actual Q 26.7 cfs.
- Freeboard 0.5 ft.
- Sideslopes 1.5 H : 1.0 V

Swale 4B
- Bottom width 0.1 ft.
- Flow depth 1.5 ft.
- Slope 0.0115
- Design Q 26.7 cfs.
- Actual Q 26.7 cfs.
- Freeboard 0.4 ft.
- Sideslopes 1.5 H : 1.0 V

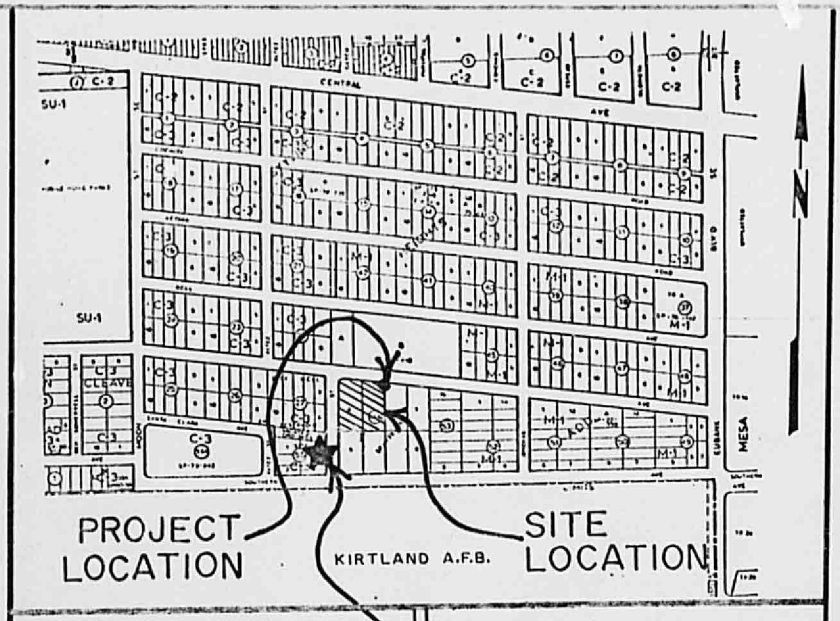
Swale 3A
- Flow width 20.0 ft.
- Flow depth 0.6 ft.
- Slope 0.0046
- Design Q 28.3 cfs.
- Actual Q 4.9 cfs.
- Freeboard 1.1 ft.

Swale 3B
- Flow width 4 ft.
- Flow depth 0.4 ft.
- Slope 0.0046
- Design Q 5.1 cfs.
- Actual Q 4.9 cfs.
- Freeboard 0.2 ft.

Double 24-inch sidewalk culvert
- Flow width 4 ft.
- Flow depth 0.3 ft.
- Slope 0.05
- Design Q 18.5 cfs.
- Actual Q 4.9 cfs.
- Freeboard 0.2 ft.

CITY OF ALBUQUERQUE

DRAINAGE FACILITIES WITHIN CITY RIGHT-OF-WAY



VICINITY MAP — NO SCALE

OWNER: CHOCTAW CONSTRUCTION CO.
P.O. BOX 13750 ALBUQUERQUE,
NEW MEXICO, 87192

LEGAL DESCRIPTION

LOTS 3 & 4, BLOCK 54A
SKYLINE HEIGHTS ADDITION
ALBUQUERQUE, NEW MEXICO.

BENCH MARK—SUSAN,
AN N.G.S. BRASS CAP
N.W. QUADRANT OF
SOUTHERN AVE. & GARCIA ST.
M.S.L. ELEV.=5444.49'

ELVIDIO DIAZ
NEW MEXICO
REGISTERED PROFESSIONAL ENGINEER

NOTICE TO CONTRACTOR

1. An excavation/construction permit will be required before beginning any work within City right-of-way. An approved copy of these plans must be submitted at the time of application for this permit.

2. All work detailed on these plans to be performed, except as otherwise stated or provided hereon, shall be constructed in accordance with "Contract Documents for Public Works Contract No. 86 - 3 "

3. Two working days prior to any excavation, contractor must contact Line Locating Service, 765-1234, for location of existing utilities.

4. Prior to construction, the contractor shall excavate and verify the horizontal and vertical locations of all obstructions. Should a conflict exist, the contractor shall notify the engineer so that the conflict can be resolved with a minimum amount of delay.

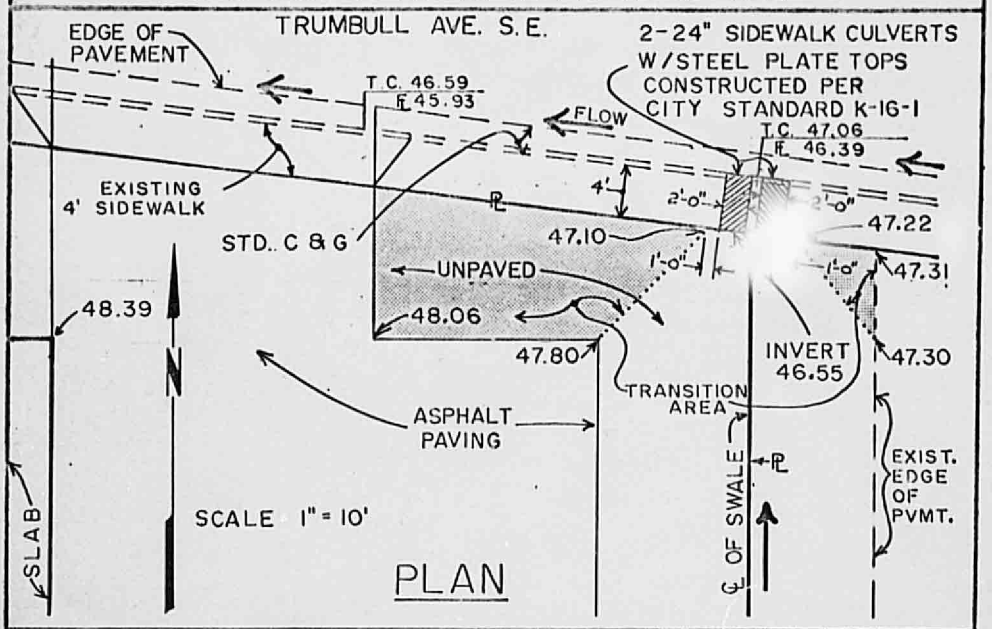
5. Backfill compaction shall be according to residential street use.

E-33

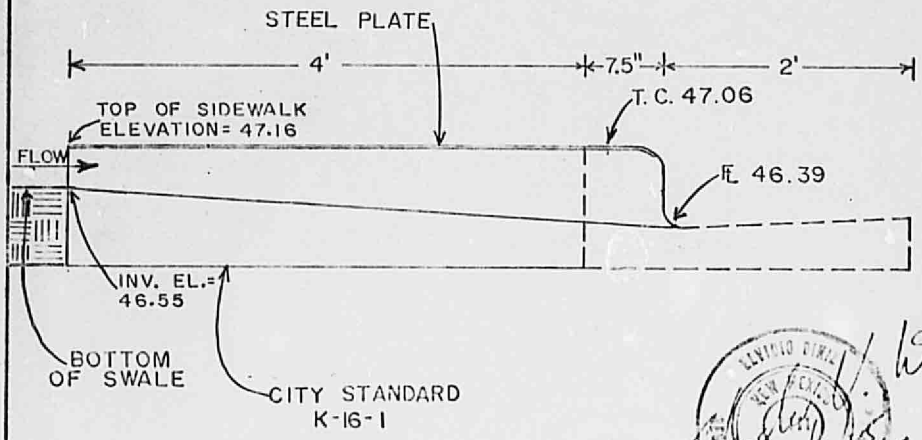
APPROVALS	NAME	DATE	TITLE: SIDEWALK CULVERT WITH STEEL PLATE TOP FOR FLINCHEM-BEALL WAREHOUSE 9910 TRUMBULL AVE. S.E.
A.C.E./DESIGN		03/17/86	
CONTRACTOR			
[illegible]			DRAWING SHEET 1 OF 2 — MAP NO. L-20

CITY OF ALBUQUERQUE

DRAINAGE FACILITIES WITHIN CITY RIGHT-OF-WAY



SCALE 1" = 1'



PROFILE

G-33

APPROVALS	NAME	DATE	TITLE: SIDEWALK CULVERT WITH STEEL PLATE TOP FOR FLINCHEM-BEALL WAREHOUSE 9910 TRUMBULL AVE. S.E.	
A.C.E./DESIGN		03/15/85		
INSPECTOR			PERMIT NO.	MAP
A.C.E./FIELD			SHEET 2 OF 2	NO. L-20

0 8 4 1