HYDROLOGY

H11/D4a
1 PLAN

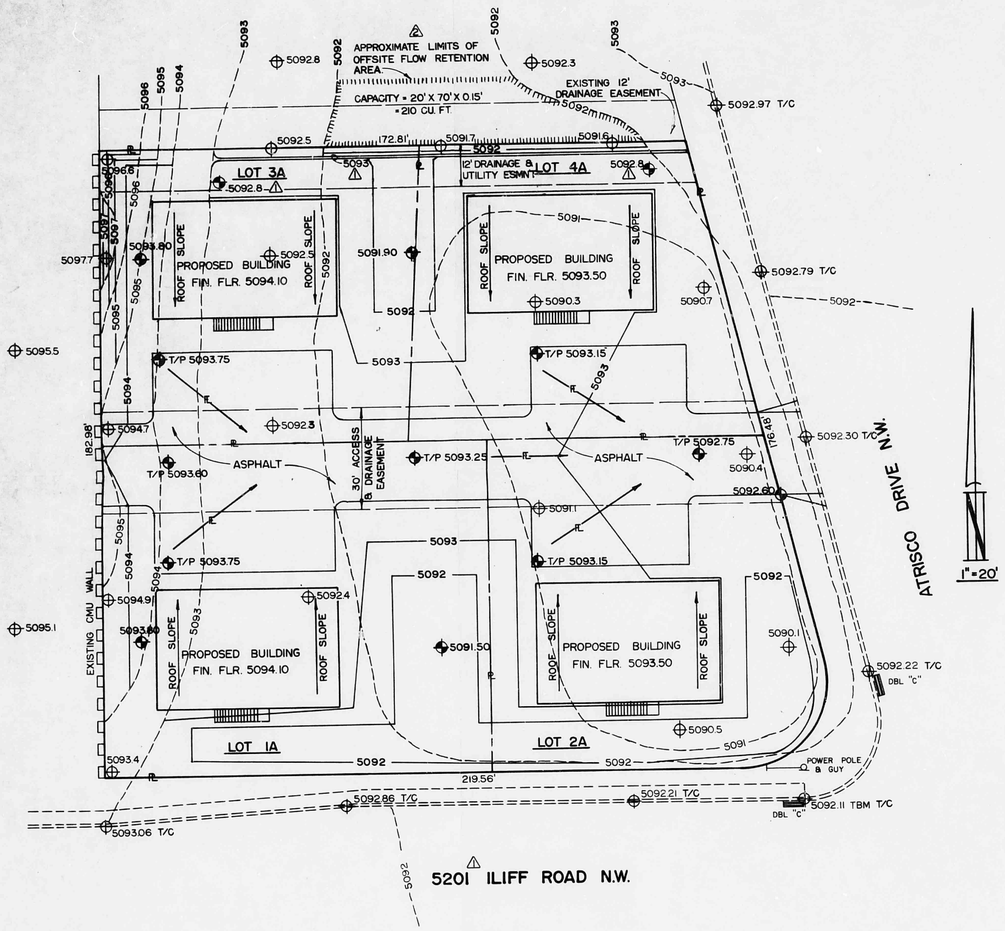
H11/D42

1 Plan

DRAINAGE PLAN

LOTS 1 THRU 4, ATRISCO FOUR-PLEX ADDITION
ALBUQUERQUE, NEW MEXICO

ZONE MAP H-11 BENCHMARK 3-J11 ELEV. 5095.55
FLOOD MAP 21 - SOIL TYPE "A"
TOTAL AREA = 35385 SQ. FT. = 0.81 ACRES
TOTAL AREA ROOFED OR PAVED = 19000 SQ. FT. = 54%
FLOOD HAZARD AREA: SOUTH SIDE OF ILIFF ROAD
FILE # H11/D4A APPROVED: _____



5201 ILIFF ROAD N.W.

HYDROLOGY:

OFF-SITE DRAINAGE: MINIMAL, SHEET FLOW FROM UNDEVELOPED AREA TO THE NORTH 0.85 AC., ACROSS TYPE "A" SOIL ON 0.0080 SLOPE. Q = 0.16 X 4.73 X 0.85 = 0.64 CFS. △1

ON-SITE DRAINAGE: 100 YR. 6 HOUR STORM = 2.2", I = 2.2 X 2.15 = 4.73
C = 0.45, Q = 0.45 X 4.73 X 0.81 = 1.72 CFS MAXIMUM.
DISCHARGE WILL BE THROUGH ONE 24' CURB CUT TO ATRISCO ROAD, 50' FROM DOUBLE "C" INLET. Tc = 25 SECONDS FROM CURB CUT TO INLET, & 1.2 MINUTES ACROSS PROPERTY TO CURB CUT.
△2 UNDEVELOPED FLOW = 0.16 X 4.73 X 0.81 = 0.61 CFS
UNDEVELOPED VOLUME = 0.05" X 35385 S.F. = 147 CU. FT. (CN55) DEVELOPED VOLUME = 0.35" X 35385 S.F. = 1032 CU. FT. (CN70)

HYDRAULICS:

24' DRIVEWAY SWALE AND CURB CUT FOR 1.84 CFS REQUIRES A DEPTH OF 0.20' (2 1/2") AT ℄. Q = 2.4 X 1.486/0.017 X 0.215 X 0.071 = 3.20 CFS ∴ ADEQUATE.

DOWNSTREAM FACILITIES:

TWO DOUBLE "C" INLETS ARE AVAILABLE TO TAKE THE ON-SITE FLOW, AT THE CORNER OF ILIFF AND ATRISCO. Tc = LESS THAN 2 MINUTES. CAPACITY OF THE INLETS = 15 CFS EACH AT S = 0.008, AND FULL CURB DEPTH. CAPACITY OF 30" RCP AT S = 0.0100 = 50 CFS ∴ DOWNSTREAM FACILITIES ARE ADEQUATE TO ALLOW UNCONTROLLED DISCHARGE FROM THIS SITE.

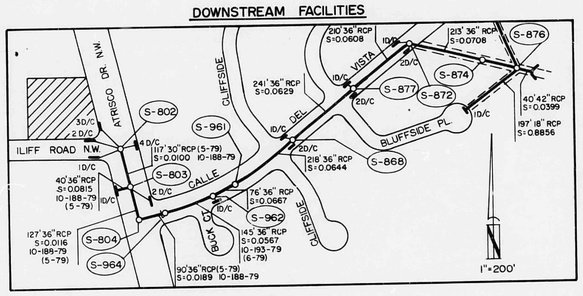
EROSION CONTROL NOTES:

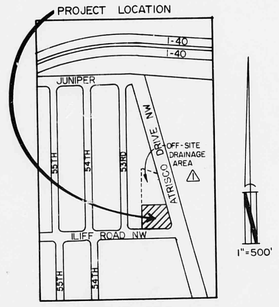
THE CONTRACTOR SHALL BE RESPONSIBLE FOR COMPLIANCE TO THE FOLLOWING:

1. NO SEDIMENT - BEARING WATER SHALL BE ALLOWED TO DISCHARGE THE SITE DURING CONSTRUCTION.
2. DURING GRADING OPERATIONS AND UNTIL THE PROJECT HAS BEEN COMPLETED, ALL ADJACENT PROPERTY, RIGHTS - OF - WAY, AND EASEMENTS SHALL BE PROTECTED FROM FLOODING.
3. ANY AND ALL SEDIMENTATION ORIGINATING ON THE SITE WHICH IS DEPOSITED WITHIN PUBLIC RIGHT - OF - WAY SHALL BE PROMPTLY AND COMPLETELY REMOVED BY THE CONTRACTOR.

△1 OFFSITE RUN-OFF VOLUME = 0.05" X 37025 SQ. FT. = 154 CU. FT. = 1' DEPTH ON 12' SQUARE OR 0.45' AVERAGE DEPTH ON 7.5' X 46' AREA △2

DOWNSTREAM FACILITIES





VICINITY MAP

RECEIVED DEC 09 1985 HYDROLOGY SECTION

LEGEND

PROPERTY LINE
EXISTING CONTOUR — 5092
PROPOSED CONTOUR — 5094
EXISTING CURB & WALK
FLOW DIRECTION
EXISTING SPOT ELEVATION
PROPOSED SPOT ELEVATION
EXISTING CMU WALL

△1 REVISED 8/23/85 △2 REVISED 10/24/85 △3 CALCULATION CORRECTION

DUANE LOGAN
CONSULTING CIVIL ENGINEER
501 KINLEY N.E., ALBUQUERQUE, N.M. (505) 243-6353

TITLE: DRAINAGE PLAN

FOR: ATRISCO FOUR PLEX		
AT: 5201 ILIFF ROAD N.W.		
DESIGNED BY: DLL	DATE: 7/8/85	
DRAWN BY: CLL	DATE: 7/10/85	
CHECKED BY: CR	DATE: 7/11/85	
PROJECT NO. H-145	MAP NO. H-11	SHEET 1 OF 1

DUANE LEE LOGAN N. M. REGISTERED PROFESSIONAL ENGINEER

7/20/85-12/9/85