LOCATION	HEC-1 FLOW w/dec. (CFS)	EXISTING IMPROVEMENT	PROPOSED IMPROVEMENT
CITY BRIDGES			
OLD RAILROAD GRADE (DP 31)	5,813	HORSESHOE - 2 @ 25' w 31'	NO IMPROVEMENT REQUIRED.
ACADEMY BLVD S. (DP 30M1)	2,586	CBC - 10' x 6'	REPLACE WITH TRIPLE 13' x 9' CBC

REACH	HEC-1 FLOW w/dec. (CFS)	CHANNEL LENGTH(FT)	EXISTING IMPROVEMENT	TOTAL BOTTOM WIDTH(FT)	TOTAL DEPTH(FT)	RECOMMENDED IMPROVEMENT
1B TO DESIGN POINT 30	9,813	1,600	NATURAL	20	13.0	PROVIDE SUFFICIENT EASEMENT WIDTH FOR NATURAL CHANGES TO THE CHANNEL EXCEPT USE GABIONS AT BENDS TO KEEP
30 TO DESIGN POINT 29	6,981	1,000	NATURAL	20	13.0	PROVIDE SUFFICIENT EASEMENT WIDTH FOR NATURAL CHANGES TO THE CHANNEL (ON-SITE & LAND) EXCEPT USE GABIONS ON EAST (-6')
U4B TO DESIGN POINT 31	420	4,500	NATURAL	0'/76'-RCB	N/A	STORM SEWER
U4A TO DESIGN POINT 30	600	2,000	NATURAL	10	5.0	NATURAL BOTTOM & PROVIDE GABION WALLS FIRST 500') & GRADE LINED (LAST 1500') FOR BANKS & GRADE CONTROL (5 DROPS)
SUM13 TO DESIGN POINT 29	2,949	2,500	P. LINED	120	5.0	NATURAL BOTTOM WITH BURIED RIPRAP BANKS & GRADE CONTROL (WITH 3 DROPS)
2B TO DESIGN POINT 29	2,739	1,800	CONCRETE	20	6.0	NO IMPROVEMENT REQUIRED (RECENTLY REBUILT)
28F TO DESIGN POINT 28	638	1,600	54" PIPE	60" RCP	N/A	PARALLEL PIPE (900')
28A TO DESIGN POINT 28B	430	1,900	48" PIPE	72" RCP	N/A	PARALLEL PIPE (900')
U1 TO DESIGN POINT 28H	1,129	2,800	42" PIPE	N/A	N/A	NO IMPROVEMENT REQUIRED
28E TO DESIGN POINT 28F	1,563	2,200	LONG PIPE	N/A	N/A	LINE PIPE FOR LOWER N VALUE
28G TO DESIGN POINT 28H	406	2,300	84" PIPE	N/A	N/A	NO IMPROVEMENT REQUIRED
28C TO DESIGN POINT 28E	816	1,450	CONCRETE	7'	5.5	REBUILD CONCRETE LINED CHANNEL
R1 TO DESIGN POINT 28C	775	2,500	NATURAL	0'/72" RCP	N/A	STORM SEWER (1,300')
27 TO DESIGN POINT 28G LOW	794	2,100	CONCRETE	3'	6.0'	NO IMPROVEMENT REQUIRED
28H TO DESIGN POINT 28	2,344	500	CONCRETE	12	6.0	NO IMPROVEMENT REQUIRED
27 TO DESIGN POINT 28G UP	518	1,500	90" PIPE	48" RCP	N/A	PARALLEL PIPE

LOCATION	HEC-1 FLOW w/dec. (CFS)	BRIDGE LENGTH(FT)	EXISTING IMPROVEMENT	TOTAL BOTTOM WIDTH(FT)	TOTAL DEPTH(FT)	RECOMMENDED IMPROVEMENT
ACADEMY BLVD MIDDLE (DP 28F)	3,563	150	DBL - 6' x 6'	N/A	N/A	NO IMPROVEMENT REQUIRED
ACADEMY BLVD SOUTH (DP 28G)	794	125	CBC - 8' x 6'	N/A	N/A	NO IMPROVEMENT REQUIRED

1. AGRICULTURAL CHANNEL — drainage transecting pastures and fields
2. BACKWATER WETLAND — expanded areas of drainage above obstructions
3. ENGINEERED FLOODWAY — concrete lined channels
4. HERBACEOUS WETLAND — marshes, pondmargins and protected places along channels
5. MODIFIED CHANNEL — channelized, eroded (earth bottom)
6. OPEN WATER — ponds, reservoirs (excludes flowing channel)
7. RIPARIAN FOREST — cottonwood and conifers along channel
8. SHRUB WETLAND — willow in and along channel (no tree overstory)
9. PRAIRIE SWALES — low lying grassy and weedy depressions along drainages

BASED ON THE REACHES/CULVERTS LISTED ON THIS SHEET, APPROXIMATELY 5.7 ACRES OF ENVIRONMENTALLY CLASSIFIED AREAS WILL BE DISTURBED OR DESTROYED AND REQUIRE MITIGATION.

EXIST. NATURAL CHANNEL USE ALTERNATE A

EXIST. NATURAL CHANNEL USE ALTERNATE B

DESIGN POINT SUM 13 TO 30 USE ALTERNATE B-3

EXIST. RIP RAP BANK PROTECTION - EAST SIDE

EXIST. CONC. LINED CHANNEL RECENTLY RECONSTRUCTED NO IMPROVEMENT REQ'D.

EXIST. CONCRETE CHANNEL NO IMPROVEMENT REQ'D.

EXIST. 54" RCP PROP 60" RCP PARALLEL

EXIST. 54" RCP PROP 72" RCP PARALLEL

EXIST. 48" RCP PROP 72" RCP PARALLEL (VERY LITTLE SLOPE AVAIL.)

EXIST. 48" RCP NO IMPROVEMENT REQ'D.

EXIST. CONCRETE CHANNEL NO IMPROVEMENT REQ'D.

EXIST. 108" CSP PIPE NO IMPROVEMENT REQ'D.

EXIST. 83" x 128" CSPARCH NO IMPROVEMENT REQ'D.

EXIST. CONC. LINED CHANNEL (FLOW) PROPOSED CONC. CHANNEL

EXIST. 2 - 6' x 6' CBC - IMP. INLET NO IMPROVEMENT REQ'D.

EXIST. 16' x 6' CBC PROP. 3 - 12' x 9' CBC

PROPOSED 7'x7' CBC PER WAL-MART CENTER FIL NO. 2 DRAINAGE REPORT 12/91

CONCRETE CHANNEL WAS PROPOSED TO CALCULATE FACILITY COSTS. FACILITY ALIGNMENT AND TYPE WAS CHANGED AS SHOWN PROPOSED PER REFERENCED DRAINAGE REPORT

EXIST. STORM SEWER SYSTEM NO IMPROVEMENT REQ'D. TO DESIGN POINT 28E

EXIST. NATURAL CHANNEL PROP. 72" RCP

EXIST. RIP RAP CHANNEL NO IMPROVEMENT REQ'D.

PROP. 48" RCP PARALLEL

LEGEND:

- HIO / 75.0 — BASIN DESIGNATION, BASIN AREA (AC.)
- 10 — DESIGN POINT, MAJOR BASIN BOUNDARY
- SUB-BASIN BOUNDARY
- CITY LIMITS
- EXISTING STORM SEWER
- PROPOSED STORM SEWER, 100YR. FLOODWAY LIMITS (PROPOSED)
- EXIST. CROSS CULVERT OR BRIDGE
- PROP. CROSS CULVERT OR BRIDGE
- EXIST. BANK LINING WITH NO CHANGE
- EXIST. BANK LINING INCREASE DEPTH
- PROPOSED BANK LINING
- PROPOSED DROP STRUCTURE
- DRAINAGE R.O.W.
- 8 — ENVIRONMENTAL CLASSIFICATION

SHEET INDEX

LANDMARK MAPPING

ENGINEER:

URS CONSULTANTS

MAKING TECHNOLOGY WORK

1040 SOUTH EIGHTH STREET COLORADO SPRINGS, CO. 80906 (719)634-6699

PROJECT:

COTTONWOOD CREEK DRAINAGE BASIN PLANNING STUDY

DRAINAGE PLAN

SCALE 1" = 200' CONTOUR INTERVAL = 2'

FIGURE 9 SHEET 2 OF 11

JUNE 9, 1994