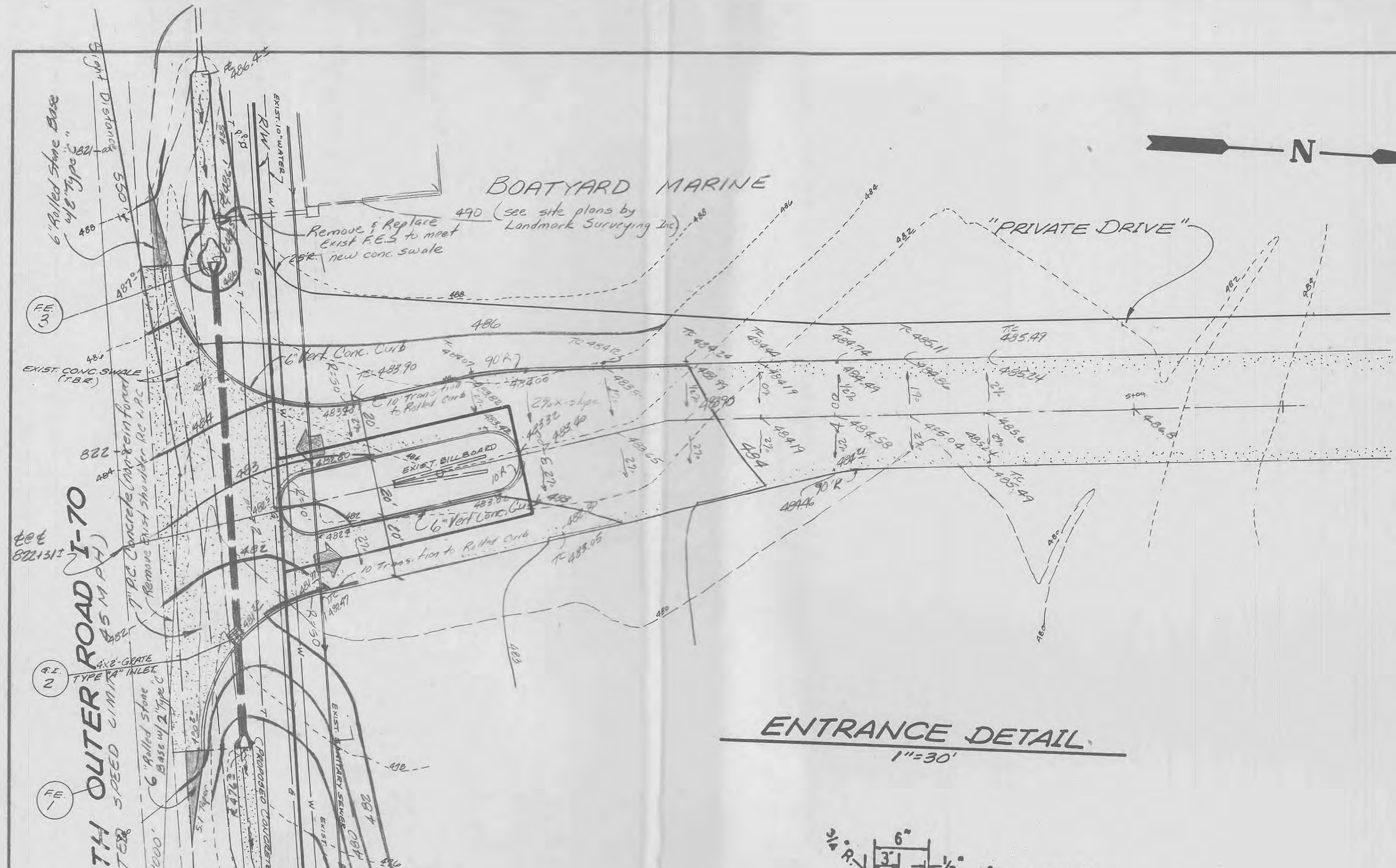
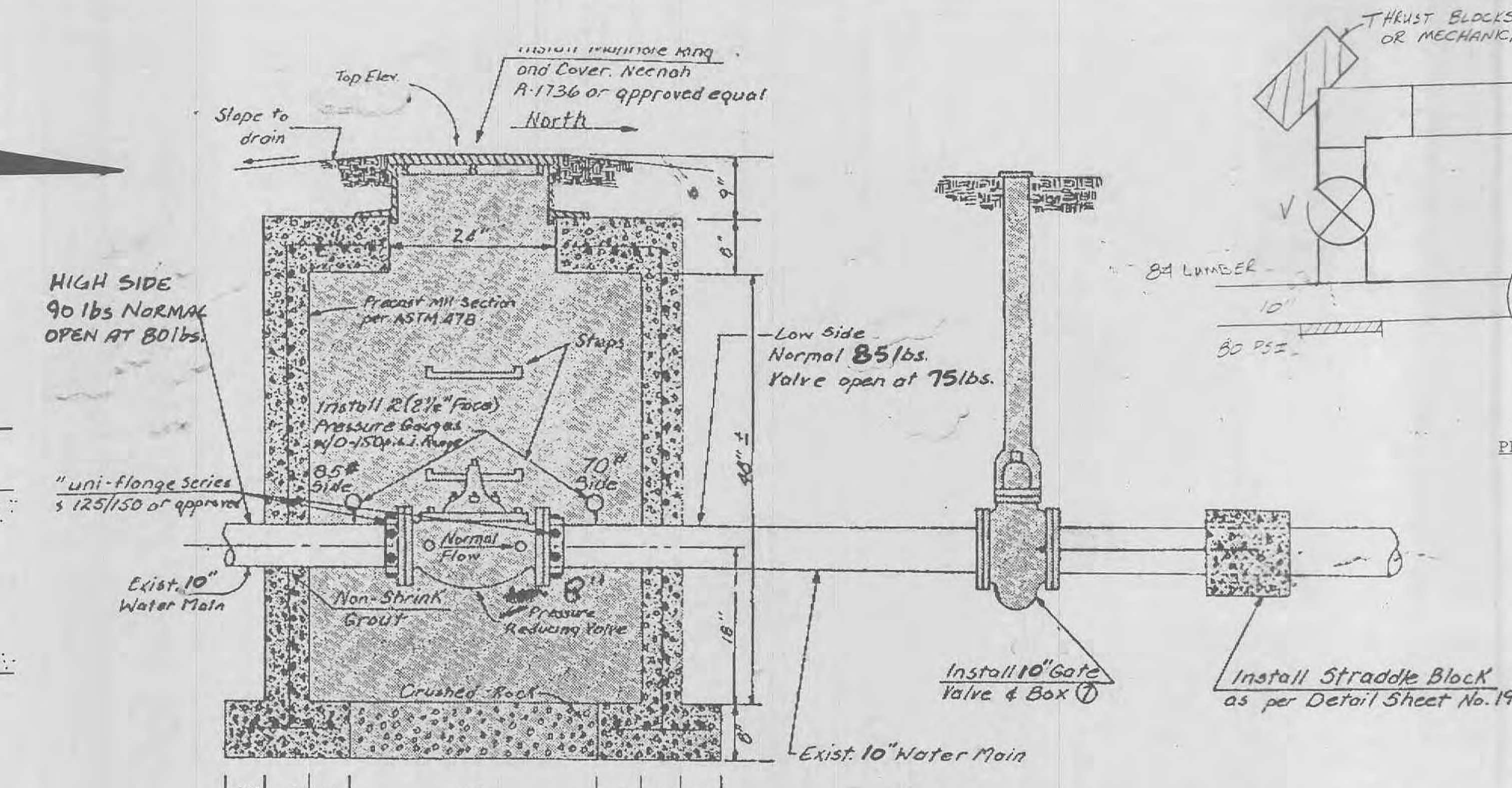
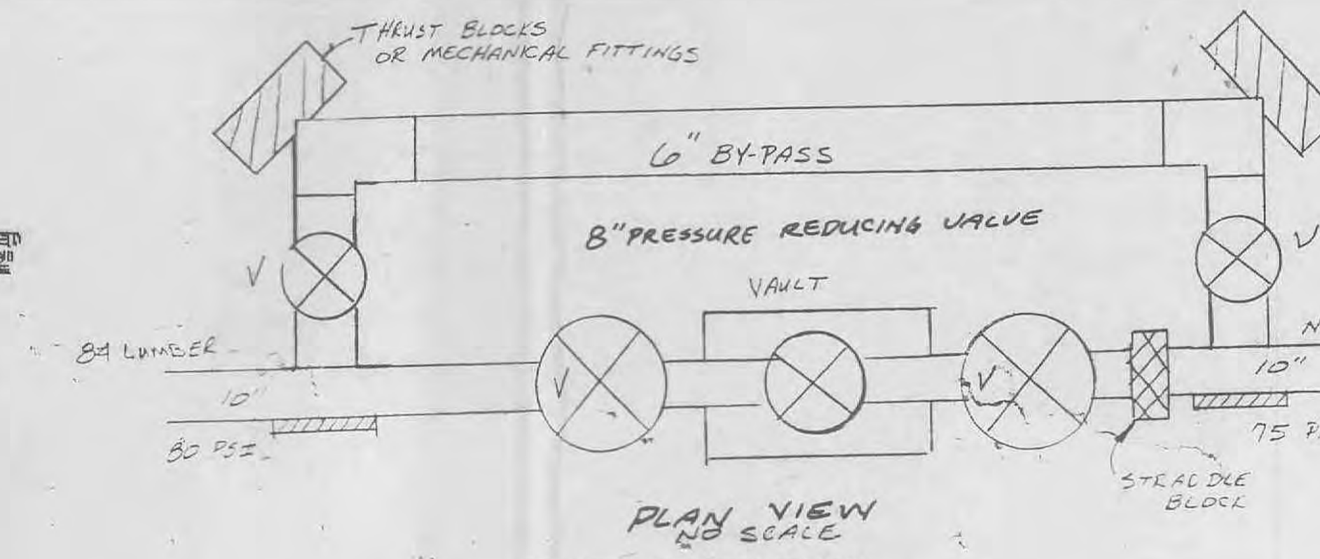
O'FALLON IND. CENTRE CONSTRUCTION DETAILS

89-3108 JUNE 1992
8-6-92
9-1-92



ENTRANCE DETAIL
1"=30'





PRESSURE REDUCING VALVES:

A. Provide hydraulically operated, globe type pressure reducing valves. This valve shall be closed under normal conditions. If the low pressure side of the valve drops below a field adjustable setting, the valve will automatically open to maintain a constant downstream pressure without permitting the upstream pressure to drop below a set level. Should the upstream pressure drop to below the downstream pressure, the valve will automatically open and allow reverse flow.

B. The valves may be a diaphragm type valve as manufactured by Cla-Val Company, a piston type as manufactured by G.A. Industries or approved equal. The valve body shall be of cast iron construction with flanged ends. The minimum design work pressure shall be 150 psi.

C. The valves shall be hydraulically controlled with the control system including the following:

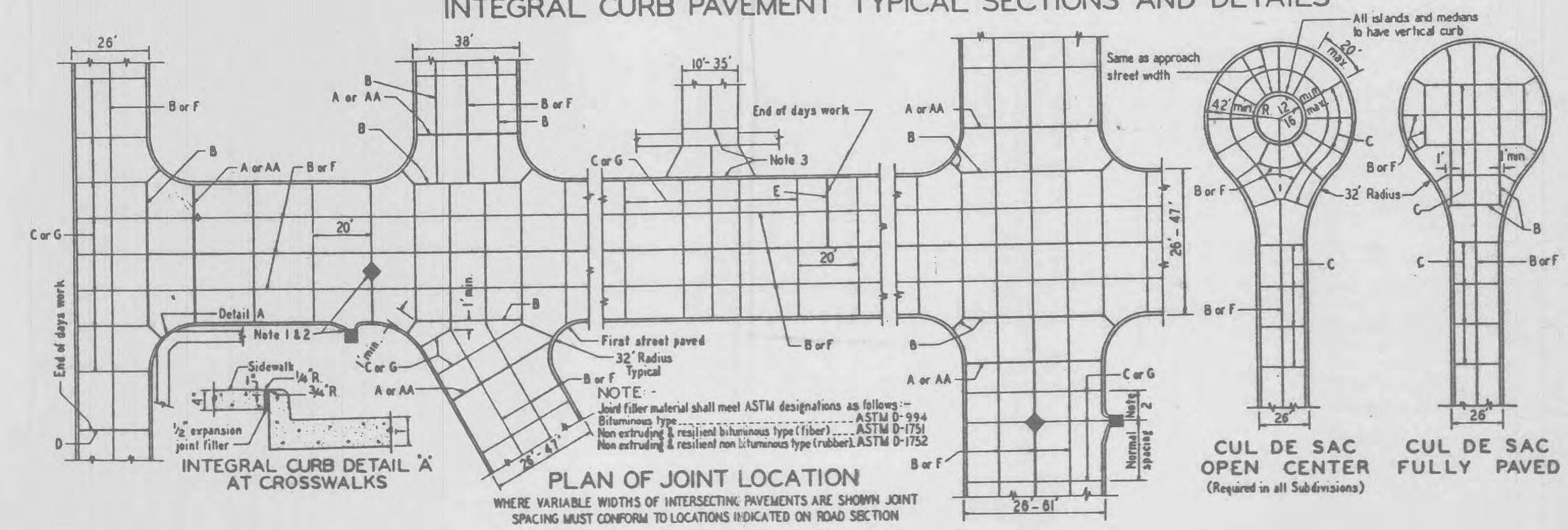
1. Field adjustable, spring loaded pressure reducing control valve.
2. Y type strainer.
3. Opening and closing speed control adjustment valves.
4. Valve position indicator.
5. Flow stabilizer.

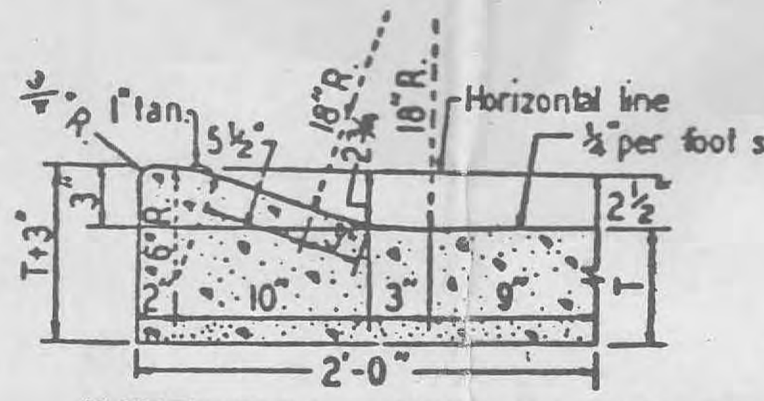
D. Pressure Reducing Valve and Manhole. Valve shall be set to open at 75 lbs. pressure on the east side (low pressure side) and 80 lbs. pressure on the west side (high pressure side).

The valves shall be delivered to the site, tagged with the installation locations, with all control piping installed and set to open as specified above and on the drawings.

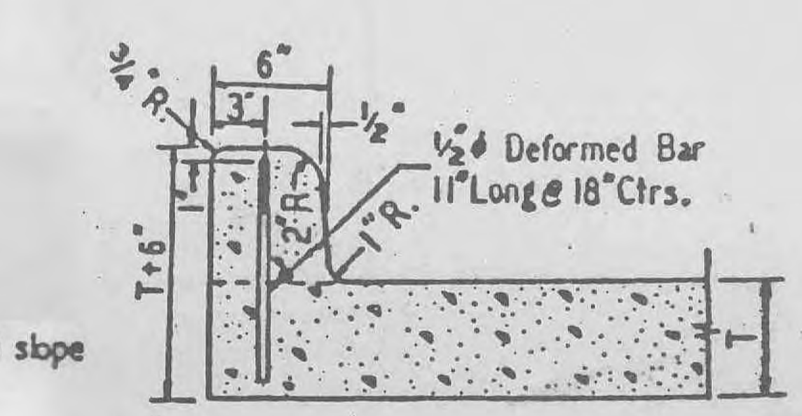
PRESSURE REDUCING VALVE & MANHOLE
NO SCALE

INTEGRAL CURB PAVEMENT TYPICAL SECTIONS AND DETAILS

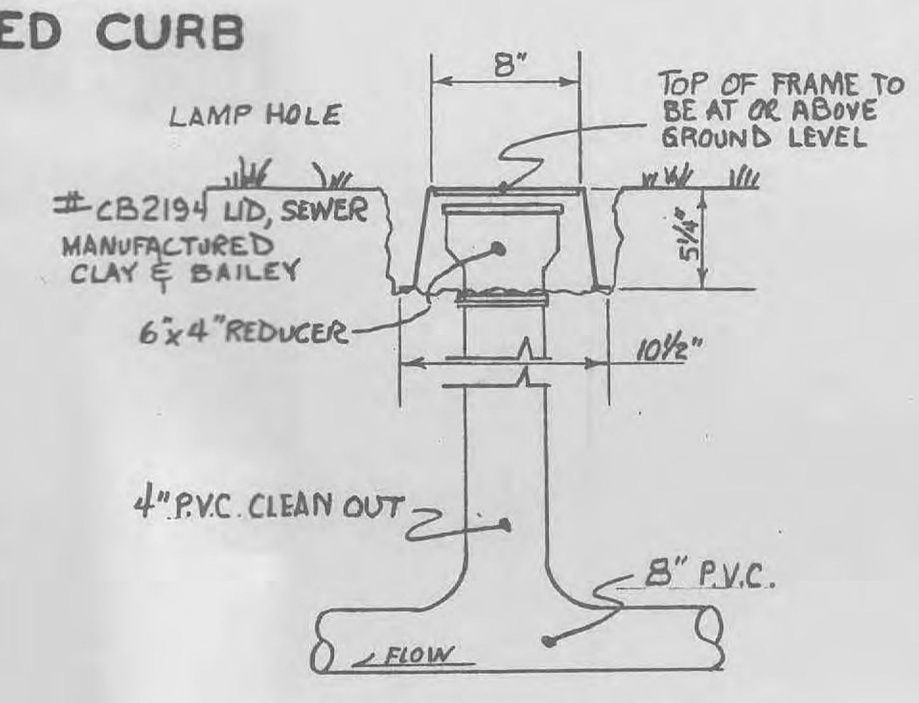




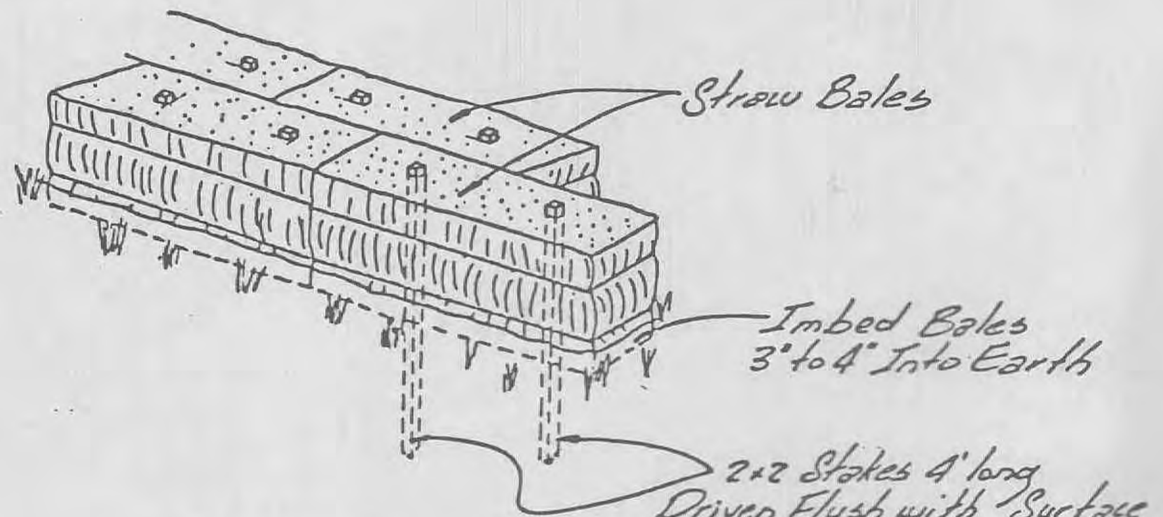
INTEGRAL ROLLED CURB



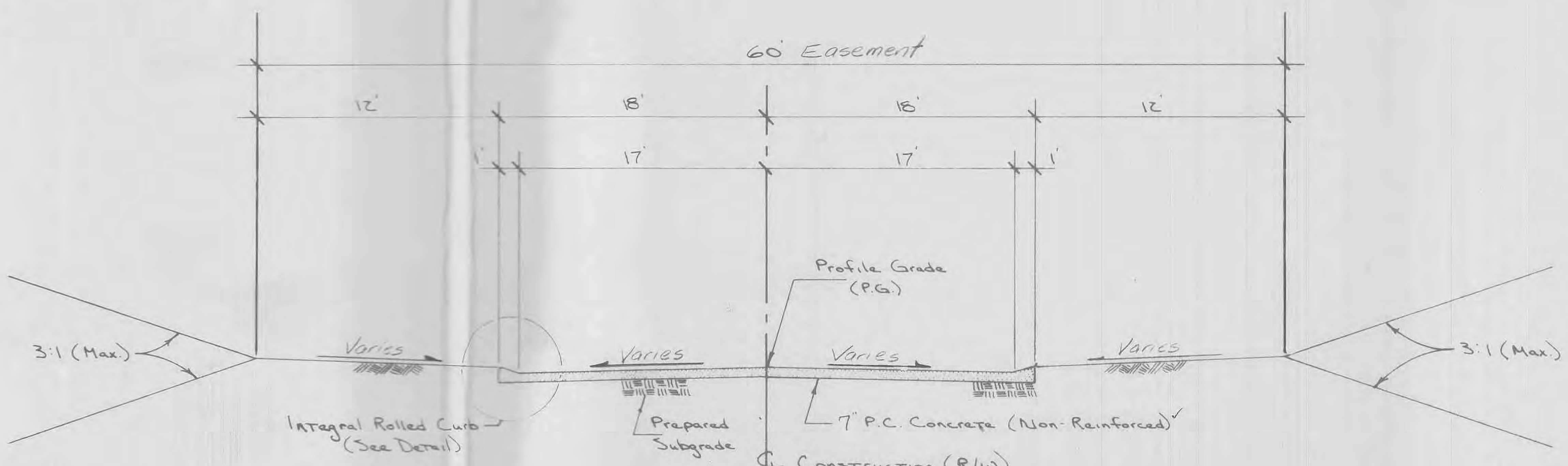
INTEGRAL VERTICAL CURB



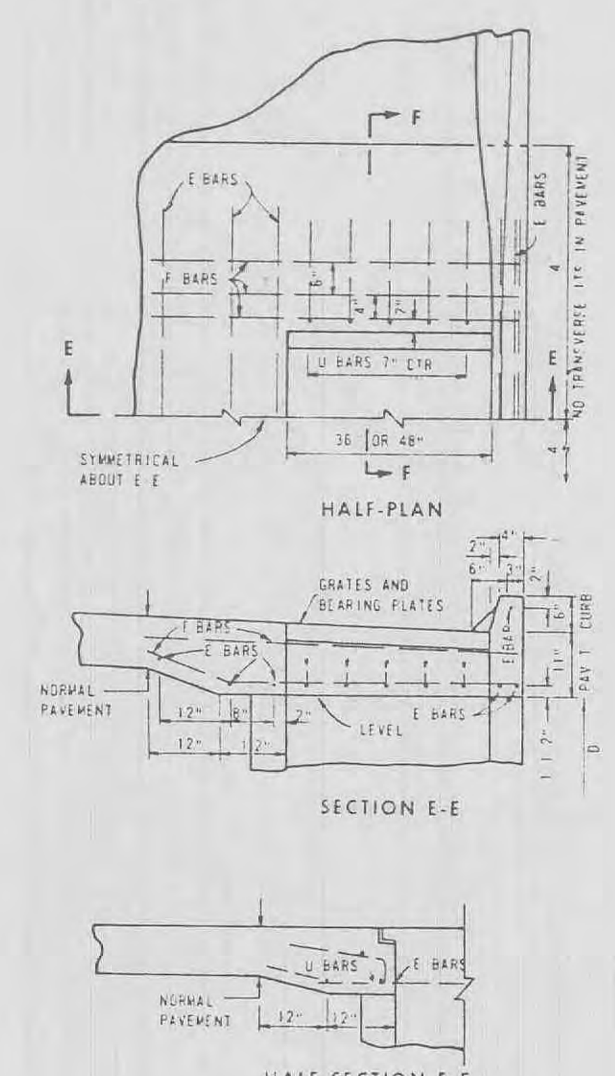
CLEANOUT DETAIL
(N.T.S.)



SILTATION CONTROL DETAIL
Not to Scale



TYPICAL SECTION



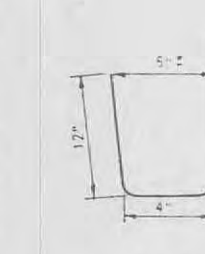
TYPE A

INLET ADJACENT TO CURB

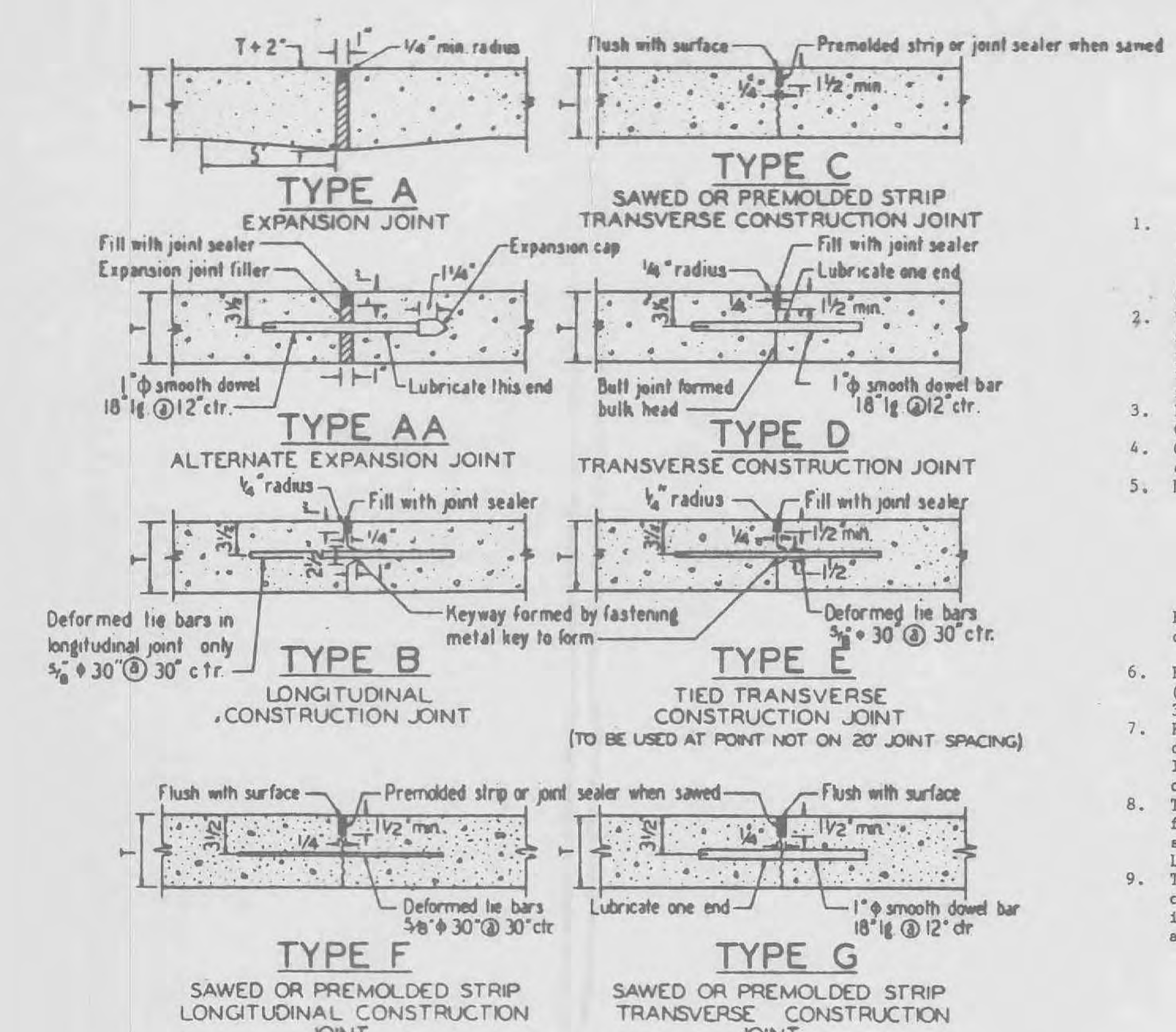
PAVEMENT BAR BILL											
TYPE	WIDTH	LENGTH	MARK	NO	LENGTH	TYPE	WIDTH	LENGTH	MARK	NO	LENGTH
A	3	2	E	6	6'-0"	C	3	2	E	7	6'-0"
			F	6	5'-6"				F	6	4'-3"
			U	10	2'-9"				U	10	2'-9"
	4	2	E	6	6'-0"		4	2	E	7	6'-0"
			F	6	6'-6"				F	6	5'-3"
			U	14	2'-9"				U	14	2'-9"
B	3	2	E	7	6'-0"	D	2	2	E	6	7'-0"
			F	6	6'-0"				F	6	2'-9"
			U	10	2'-9"				U	8	2'-9"
	4	2	E	7	6'-0"						
			F	6	7'-0"						
			U	14	2'-9"						

TYPE E COVER BAR BILL				
WIDTH	LENGTH	BAR SIZE	NO	LENGTH
3	2	#3	5	2'-9"
		#4	5	3'-9"
3	3	#3	5	3'-9"
		#4	5	3'-9"
5	2	#3	6	2'-9"
		#4	6	5'-9"
5	3	#3	6	3'-9"
		#4	7	5'-9"

BARS E, F, & U .... #4



BENDING DIAGRAM



TYPE A
EXPANSION JOINT

TYPE C
SAWED OR PREMOLDED STRIP TRANSVERSE CONSTRUCTION JOINT

TYPE AA
ALTERNATE EXPANSION JOINT

TYPE D
TRANSVERSE CONSTRUCTION JOINT

TYPE B
LONGITUDINAL CONSTRUCTION JOINT

TYPE E
TIED TRANSVERSE CONSTRUCTION JOINT
(TO BE USED AT POINT NOT ON 20' JOINT SPACING)

TYPE F
SAWED OR PREMOLDED STRIP LONGITUDINAL CONSTRUCTION JOINT

TYPE G
SAWED OR PREMOLDED STRIP TRANSVERSE CONSTRUCTION JOINT

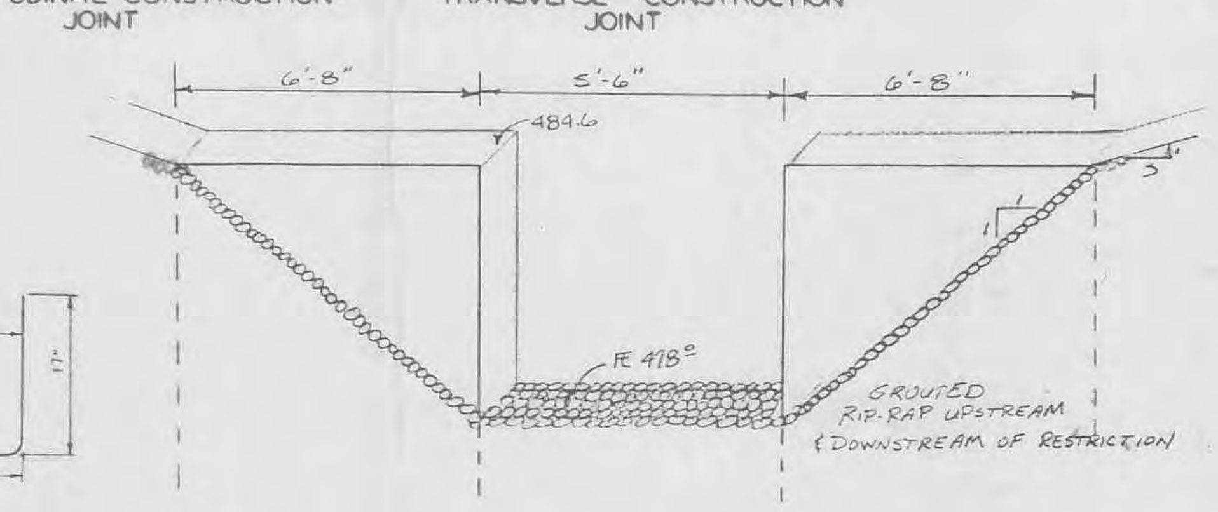
GENERAL NOTES

1. All catch basins shall be separate from the pavement and curb by expansion joint material extending completely through curb and slab Manhole castings within the pavement limits shall be boxed as shown in the "Sewer Construction Details".
2. When a joint falls with 5 ft. of or contacts basin, manholes, or other structures, shorten one or more panels either side of opening to permit joint to fall on round structures and at or between corners of rectangular structures.
3. Driveway configurations are shown in the "Entrance Construction Details".
4. Construction joint and dowel bars may be omitted when curb is poured integral with pavement.
5. Minimum Thickness for Pavement is

	CONCRETE (T)
Local or Minor Streets	6"
Major or Industrial Streets	7"
Arterial or Industrial Streets	8"

Base material under pavement will be made with 4 inches of Rolled Stone Base.

6. For minor rural or urban and minor subdivision pavements (6" thick concrete), 1/2" O deformed tie bars 30" lg. @ 30" ctr. shall be used for TYPE B longitudinal joints.
7. Refer to Exhibit 13A for joint and bar requirements for different street classifications. Note that width and location of each poured portion of the pavement may change the type and location of joint required.
8. Transverse or longitudinal construction joints in slip formed pavement may be made with groover or tool, if such device has been approved in advance by the St. Louis County Department of Highways & Traffic.
9. The locations of the Type B and Type F longitudinal construction joints in above sections may be interchanged for the different widths of construction if approval is obtained.



BASIN 'C' RESTRICTION DETAIL

NOTES:
REINF. STEEL - GRADE 40 MIN.
CONCRETE f'c = 3000 P.S.I.