

WinStorm (STORM DRAIN DESIGN)

Version 3.05, Jan. 25, 2002
Run @ 5/20/2008 10:13:48 AM

PROJECT NAME : SYSTEM T INLETS
JOB NUMBER :
PROJECT DESCRIPTION :
DESIGN FREQUENCY : 100 Years
MEASUREMENT UNITS: ENGLISH

COMPUTATION SHEETS

- TIME OF CONCENTRATION IS
DETERMINED ACCORDING TO
CITY OF ROCKWALL CRITERIA.

OUTPUT FOR DESIGN FREQUENCY of: 100 Years

Runoff Computation for Design Frequency.

ID	C Value	Area (acre)	Tc (min)	Tc Used (min)	Intensity (in/hr)	Supply Q (cfs)	Total Q (cfs)
T-9	0.9	0.96	10.00	10.00	9.80	0.000	8.467
T-11	0.9	0.44	10.00	10.00	9.80	0.000	3.881
T-10	0.9	0.98	10.00	10.00	9.80	0.000	8.644
T-12	0.9	0.45	10.00	10.00	9.80	0.000	3.969
T-13	0.9	0.29	10.00	10.00	9.80	0.000	2.558
T-14	0.9	0.29	10.00	10.00	9.80	0.000	2.558
T-1	0.9	0.43	10.00	10.00	9.80	0.000	3.793
T-2	0.9	0.28	10.00	10.00	9.80	0.000	2.470
T-3	0.9	0.42	10.00	10.00	9.80	0.000	3.704
T-4	0.9	0.66	10.00	10.00	9.80	0.000	5.821
T-5	0.9	0.43	10.00	10.00	9.80	0.000	3.793
T-6	0.9	0.28	10.00	10.00	9.80	0.000	2.470
T-7	0.9	0.41	10.00	10.00	9.80	0.000	3.616
T-8	0.9	0.63	10.00	10.00	9.80	0.000	5.557

On Grade Inlets Computation Data.

Inlet ID	Inlet Type	Total Q (cfs)	Intercept Capacity (cfs)	Q Bypass Allow (cfs)	Q Bypass Actual (cfs)	To Inlet ID	Required Length (ft)	Actual Length (ft)	Ponded Width (ft)
T-9	Curb	8.467	7.117	0.000	1.351	T-11	23.46	15.00	14.40
T-11	Curb	5.231	4.769	0.000	0.462	T-13	13.51	10.00	15.15
T-10	Curb	8.644	7.214	0.000	1.430	T-12	23.73	15.00	14.50
T-12	Curb	5.399	4.876	0.000	0.523	T-14	13.76	10.00	15.35
T-13	Curb	3.020	3.020	0.000	0.000	T-1	9.88	10.00	12.35
T-14	Curb	3.081	3.081	0.000	0.000	T-5	9.97	10.00	12.40
T-1	Curb	3.793	3.721	0.000	0.072	T-2	11.24	10.00	13.45
T-3	Curb	4.575	4.192	0.000	0.384	T-2	13.38	10.00	13.65
T-4	Curb	5.821	4.950	0.000	0.871	T-3	15.34	10.00	14.90
T-5	Curb	3.793	3.721	0.000	0.072	T-6	11.24	10.00	13.45
T-7	Curb	4.374	4.058	0.000	0.316	T-6	13.03	10.00	13.40
T-8	Curb	5.557	4.799	0.000	0.758	T-7	14.94	10.00	14.65

On Grade Inlet Configuration Data

Inlet ID	Inlet Type	Inlet Length (ft)	Slopes Long (%)	Slopes Trans (%)	Gutter n	Gutter Depr. (ft)	Grate Width (ft)	Grate Type	Pond Width Allowed (ft)	Critic Elev. (ft)
T-9	Curb	15.00	1.79	2.00	0.016	0.25	n/a	n/a	14.00	570.55
T-11	Curb	10.00	0.52	2.00	0.016	0.25	n/a	n/a	14.00	565.68
T-10	Curb	15.00	1.79	2.00	0.016	0.25	n/a	n/a	14.00	570.55
T-12	Curb	10.00	0.52	2.00	0.016	0.25	n/a	n/a	14.00	565.68
T-13	Curb	10.00	0.52	2.00	0.016	0.25	n/a	n/a	14.00	564.59
T-14	Curb	10.00	0.52	2.00	0.016	0.25	n/a	n/a	14.00	564.59
T-1	Curb	10.00	0.52	2.00	0.016	0.25	n/a	n/a	14.00	562.95
T-3	Curb	10.00	0.70	2.00	0.016	0.25	n/a	n/a	14.00	563.13
T-4	Curb	10.00	0.70	2.00	0.016	0.25	n/a	n/a	14.00	565.25
T-5	Curb	10.00	0.52	2.00	0.016	0.25	n/a	n/a	14.00	562.95
T-7	Curb	10.00	0.70	2.00	0.016	0.25	n/a	n/a	14.00	563.13
T-8	Curb	10.00	0.70	2.00	0.016	0.25	n/a	n/a	14.00	565.25

Sag Inlets Configuration Data.

Inlet ID	Inlet Type	Inlet Length/Perim. (ft)	Grate Area (sf)	Left-Slope Long (%)	Left-Slope Trans (%)	Right-Slope Long (%)	Right-Slope Trans (%)	Gutter n	Depth DeprW (ft)	Depth Allowed (ft)	Critic Elev. (ft)
T-2	Curb	15.00	n/a	0.10	2.00	0.10	2.00	0.016	2.00	0.42	562.58
T-6	Curb	15.00	n/a	0.10	2.00	0.10	2.00	0.016	2.00	0.42	562.58



Sag Inlets Computation Data.

Inlet ID	Inlet Type	Inlet Length (ft)	Grate Perim (ft)	Grate Area (sf)	Total Q (cfs)	Inlet Capacity (cfs)	Total Head (ft)	Ponded Left (ft)	Ponded Right (ft)	Width (ft)
T-2	Curb	15.00	n/a	n/a	2.925	11.503	0.167	12.80	12.80	
T-6	Curb	15.00	n/a	n/a	2.858	11.503	0.165	12.70	12.70	

NORMAL TERMINATION OF WINSTORM.

RECORD DRAWING
This drawing is a compilation of the original sealed engineering drawing and modifications by addenda, change orders and information furnished by the contractor. Information shown that was provided by the contractor and others not associated with the design engineer cannot be verified for accuracy or completeness. Original sealed drawing is on file at the office of AECOM USA Group, Inc., TBPE REG. NO. F-3082

ORIGINAL DRAWING
SEALED & SIGNED BY
T.H. Gaertner, P.E.
TX NO. 37124

I		WINSTORM OUTPUT		THG	5/20/08
NO.	REVISION			BY	DATE
 City of Rockwall, Texas					
205 BYPASS PHASE 3					
HYDRAULIC DATA SYSTEM T INLETS					
		<small>TCB INC. WWW.TCB.AECOM.COM 17300 DALLAS PARKWAY, SUITE 1010 DALLAS, TEXAS 75248</small>			
Unit	PW-DAL-FW	Scale	Horz: AS SHOWN Vert: AS SHOWN	Date	11/23/2009
Designed	SB	Checked	TCB	Project No.	60004153
Drawn	EG	Approved	TCB	Sheet	67 of 215

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