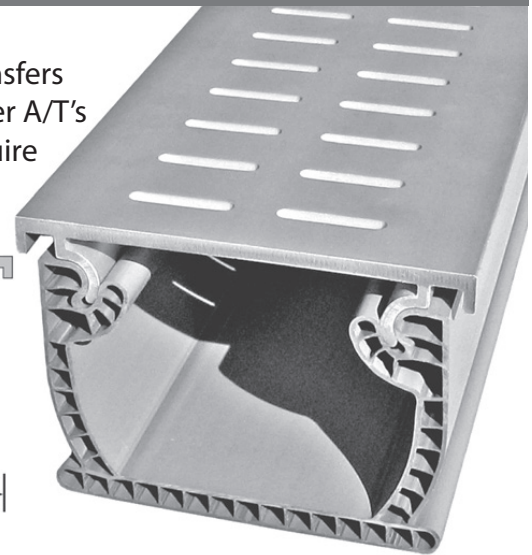
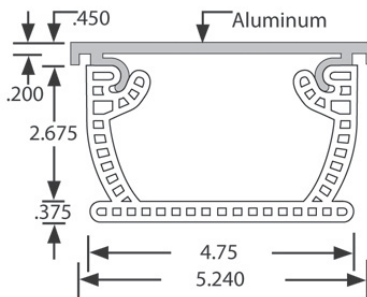


FLOWMASTER A/T COMMERCIAL DRAIN

“Transfers the weight”

Flowmaster A/T was designed to give you a high traffic drain that “transfers the weight” applied to the top of the drain, to the concrete. Flowmaster A/T’s wide design is ideal for commercial use or other applications that require a durable drain able to remove large quantities of surface water.

Flowmaster A/T features a snap-on, removable cap for easy cleaning and a secure foot for easy installation. It also comes in workable 10 foot lengths with five “aluminum” finishes to choose from.



FLOW RATE:

Drain Calculations

Assumptions/ Constants:

Gradient - Slope (S) 1 in 200 (0.5%)	0.005 ft/ft
Surface Roughness (Mannings n)	0.009 Plastic (PVC & ABS)
Rainfall Intensity (I) (TxDOT Manual)	5.8 in/hr for 10 year storm with time of concentration = to time of duration of 20 min.
Runoff Coefficient (C) (TxDOT Manual)	0.95 For concrete city streets 0.9 - 0.95 - i.e. all concrete pool deck

DRAIN NAME	Area A (ft ²)	Wetted Perimeter P (ft)	Hydraulic Radius R (ft)	Velocity V (ft/s)	Capacity - Q			Catchment Area - A			Length (ft)
					(cfs)	(liters/sec)	(gal/min)	(Acre)	(ft ²)	(m ²)	
FLOWMASTER A/T COMMERCIAL	0.131	0.935	0.140	3.158	0.414	11.7	185.7	0.075	3270	304	1

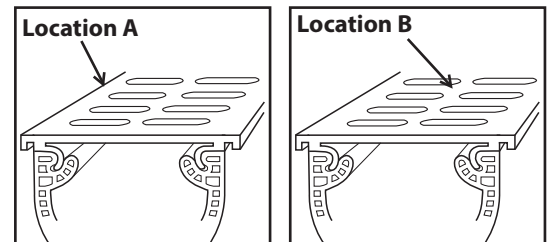
Notes/Equations:

- Above Catchment area based upon 1 foot, 1 meter, etc of the drain section.
- $R = A/P$
- $v = (1.49/n) * (R)^{(2/3)} * (S)^{(1/2)}$
- $Q = vA$
- $A = Q/CI$

LOAD TESTING:

FLOWMASTER A/T COMMERCIAL	DEFLECTION TO HORIZONTAL LINE		PUNCTURE/PERMANENT DEFORMATION MORE THAN 1/2"	
	LOCATION A	126 psi	LOCATION A	675 psi
	LOCATION B	104 psi	LOCATION B	768 psi

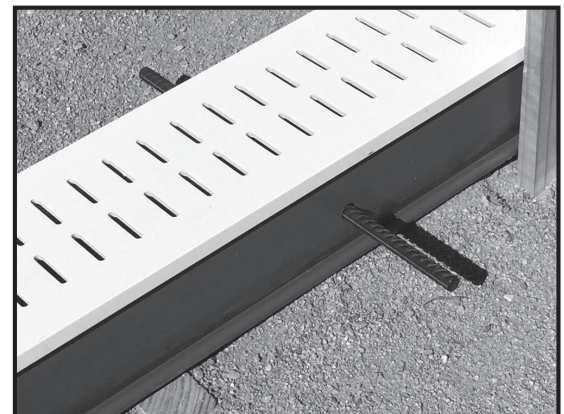
Impact Figures:



Cartons includes: 1 pc. 10' Base, 1 pc. 10' Aluminum Top Cap, 1 Coupler.

Recommended Stabilization:

To protect the drain from movement of the concrete, it is recommended to drill and pin the base of the drain midway, using a coated or non-metallic rigid reinforcement material. This dowel may be part of the reinforcement of the concrete slab but short bars are also effective, as their purpose is to hold the concrete apart, stabilizing the base of the drain.



Project Information	Contractor Information	Architect Information
Name:	Name:	Name:
Address:	Contact:	Contact:
	Phone:	Phone:
	Fax:	Fax: