NEEDED PARAMETERS FOR TL ENCLOSURE

T/S

F_s	28.3 Hz	RESONANT FREQUENCY
Vas	14.19 Ft^2	COMPLIANCE EQUIVALENT VOLUME
S_d	1.336 Ft^2	CONE SURFACE AREA

CONE MEASUREMENTS

DIAMETER	**15.650** in
RADIUS	**7.825** in
CIRCUMFERENCE	**49.167** in

r = 19.875975441288 cm	**7.825** in	
C = 124.88443685857 cm	**49.167** in	
A = 1241.1 cm^2	**192.384** in^2	**1.336 ft^2 (S^d)**

r = 7.8251871816094 in
C = 49.167101125419 in
A = 192.37088474176 in^2

r = 0.65209893180078 ft
C = 4.0972584271182 ft
A = 1.3359089218178 ft^2

CIRCLE FORMULAS

Radius and Diameter:	$r = d/2$
Area of a circle:	$A = \pi r^2 = \pi d^2/4$
Circumference of a circle:	$C = 2\pi r = \pi d$

MOUNTING INFORMATION

- Overall Outside Diameter 18.11"
- Baffle Cutout Diameter 16.73"
- Depth 7.8"
- # Mounting Holes 8

1128.8 ft./sec. = Speed of Sound

39.886925795053 ft. = MY *FULL* WAY LENGTH

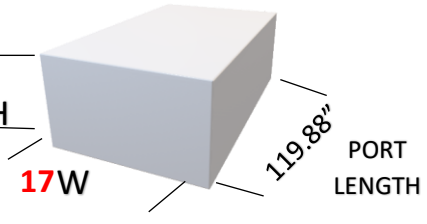
9.97173 ft. = MY 1/4 WAVE LENGTH

119.88076 in. = LINE/PORT LENGTH ***

38 X 19 X 30 (3 times w/ 11" 3 times)

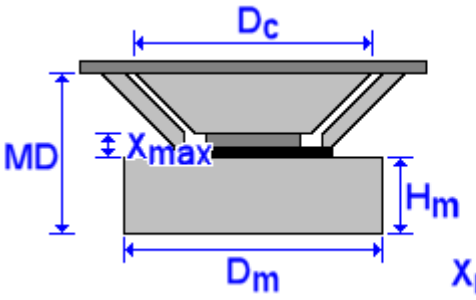
192.384 in^2 = S_d (Cone Area) (H X W of cross section of PORT/TUBE)

PORT DIMENSIONS (119.88" X (AREA [H X W]) 17" X 11.31"



Speaker Displacement

Effective Cone Diameter = 15.65 in
Mounting Depth = 7.8 in
One-way, Linear Excursion (X_{max}) = 0.236 in
Magnet Diameter = 7.48 in
Magnet Height = 0.787 in
Front Baffle Thickness = 1.0 in
Flush Mount = Yes



D_c = Effective Cone Diameter
MD = Mounting Depth
D_m = Magnet Diameter
H_m = Magnet Height
X_{max} = Linear Excursion

Dimensions

Driver Displacement = 0.17 ft^3

"The line area should equal or exceed slightly the cone area of the driver used."

"The line length should be 1/4 wavelength tuned to the resonant frequency of the chosen speaker IN THE BOX VOLUME CREATED BY THE TOTAL T-LINE CROSS SECTIONAL AREA TIMES LENGTH, and as if the box were a closed box.

64' Low C00 8.1 Hz – G1 49 Hz
32' Low C0 16.3 Hz – G2 98 Hz
16' Low C1 32.7 Hz – G2 98 Hz