

CLASS 5 SYSTEM DESIGN CALCULATIONS

Holding Tank

To be submitted with application package

DAILY SEWAGE FLOW CALCULATION

Based on Hydraulic Loads for Number of Bedrooms **and** the greater of Fixtures **or** Floor Area.

FIXTURES				FLOOR AREA			
Plumbing Fixture Description	Total # of Fixtures in Final Project Design	Unit	Total # of Fixture Units				
Bathroom Group (includes toilet, sink and bathtub and/or shower)		x 6 =		Proposed	m ²		
Toilet (alone)		x 4 =		Existing	m ²		
Washbasin		x 1.5 =		Total Finished Footprint:	m ²		
Bathtub or Shower		x 1.5 =		To convert ft ² to m ² , simply multiply ft ² by 0.093 e.g. 150 ft ² x 0.093 = 13.95 m ²			
Kitchen Sink		x 1.5 =					
Bar Sink		x 1.5 =					
Dishwasher		x 1.5 =					
Washing Machine		x 1.5 =					
Bidet		x 1 =					
Laundry Tub		x 1.5 =					
Other							
Add units in last column			↓				
Total Fixture Units =							
Residential Occupancy			Final Project Design	(Q) in L	Total		
1 Bedroom				750			
2 Bedrooms				1100			
3 Bedrooms				1600			
4 Bedrooms				2000			
5 Bedrooms				2500			
PLUS Additional Flow For:							
Each Bedroom over 5				500			
OR *							
Floor Space for each 10m ² over 200 m ² up to 400 m ²				100			
Floor Space for each 10m ² over 400 m ² up to 600 m ²				75			
Floor Space for each 10m ² over 600 m ²				50			
OR *							
Each fixture unit over 20 fixture units				50			
Add units in last column *					↓		
Total Daily Design Flow (Q) =							

**NOTE: Where you need to do multiple calculations, signified by the "OR" in the table, do the calculation for daily sewage flow based on bedrooms first, then use the largest additional flow calculation added to the bedroom calculation to determine the Total Daily Sewage Flow (Q)*

TOTAL DAILY DESIGN SEWAGE FLOW (Q) = _____ Litres

(Q) x 7 = _____ Litres MINIMUM HOLDING TANK CAPACITY

