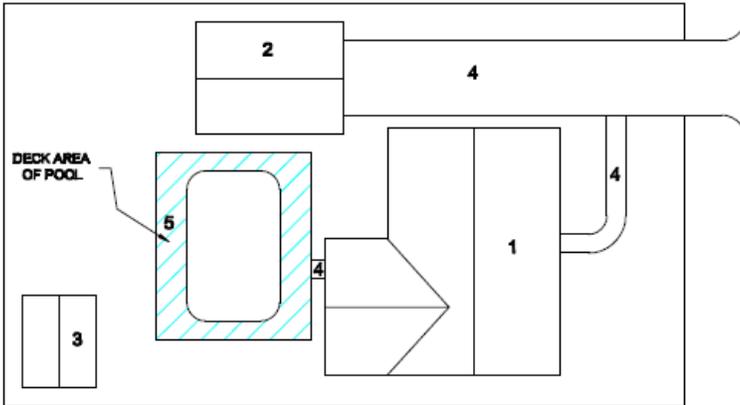




CALCULATION OF IMPERVIOUS PERCENTAGE

FOR USE ON SINGLE FAMILY RESIDENTIAL LOTS OF 15,000 SQUARE FEET IN AREA OR LESS

Single Family Residential lots of 15,000 square feet in area or less with Percent Impervious less than or equal to 75% do not need to provide stormwater detention. This form is a tool to assist customers in determining the amount of impervious area as a percentage on lots 15,000 square feet or less.



This diagram is to identify various items considered impervious.

Surfaces with materials such as pea gravel, permeable pavers or permeable concrete are not considered as impervious.

CALCULATION OF PERCENTAGE IMPERVIOUS AREA

Enter the square footage of each below:				
1.	Existing house	=		
2.	Detached garage/carport	=		
3.	Accessory structures	=		
4.	Driveway/sidewalk	=		
5.	Deck area of pool	=		
6.	New addition/structure	=		
7.	Others	=		
A. Total area of impervious cover				Square feet
Enter the lot area:				
B. Area of lot				Square feet
C. Percentage impervious area = $A \div B =$ _____				
If > 0.75 , detention volume rate of 0.20 cubic feet per square foot of impervious cover is required.				



CALCULATION OF IMPERVIOUS PERCENTAGE

FREQUENTLY ASKED QUESTIONS

Q1: Is an engineer required to complete this form?

A1: An engineer is not required to complete this form.

Q2: Would I need detention if any of the structures are built on pier and beam?

A2: Typically, no. However, if upon review we determine that the site conditions would necessitate detention, it may be required.

Q3: Is a residential pool considered permeable or impermeable surface?

A3: A pool is considered permeable, but pool decking made of impermeable surface is considered impermeable as shown in the diagram.

Q4: If my lot is currently more than 75% impermeable, and I am planning to redevelop this site, am I mandated to reduce the impermeable area to less than 75% to avoid detention?

A4: As long as you are not increasing the total impervious cover, you are not required to provide detention.

Q5: Is there any minimum amount of impermeable cover tolerable over 75% impermeable (120 sq ft had been tolerable in the past)?

A5: No, 75% is the maximum allowable for impermeable cover before detention is required.

Q6: Do I have to dig a hole in my property to provide detention?

A6: No. There are other techniques called Low Impact Development (LID) that are included in Chapter 13 of the PWE Infrastructure Design Manual or available through various organizations such as the Houston Land/Water Sustainability Forum.

PWE Infrastructure Design Manual:

http://documents.publicworks.houstontx.gov/documents/design_manuals/2009idm.pdf

Houston Land/Water Sustainability Forum:

<http://www.houstonlwsforum.org/>.

Q7: If I use the LID techniques, is an engineer required to do an analysis?

A7: Use of LID techniques requires simple calculations of storage volume and pipe size which can be provided by the applicant, home designer, architect, landscape architect or engineer. Future information on other LID techniques will be forthcoming.

Q8: Does my little bit of detention really make a difference?

A8: Taken alone, not as much, but when combined with detention from other properties with increases in impervious cover, you, your neighbors and the community at large are benefited.