



# 10 Drilling shape generation

How to call tools

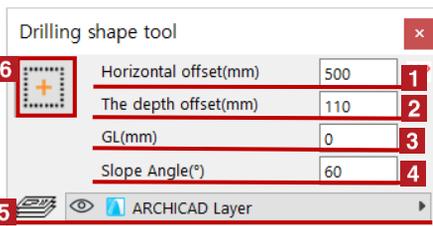
From the SCP launcher → Click the "Drilling shape generation" icon



Select drilling shape generation icon

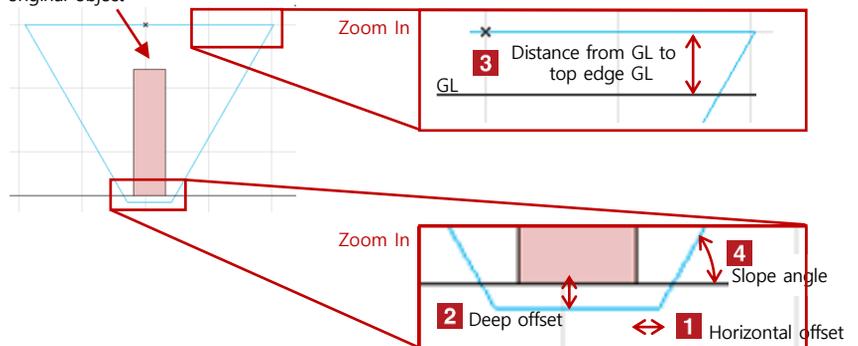
How to use

After selecting each item, click any position on the screen to arrange the drilling shape generation.



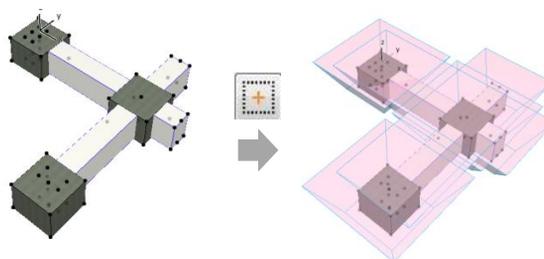
- 1 Set the horizontal offset (the distance from the side of the frame to the bottom frame)
- 2 Set the deep offset (the distance from the bottom of the frame to the GL)
- 3 Set the distance of top edge of the drilling shape from GL
- 4 Set the angle of slope

Creating original object



- 5 Select the layer to place
- 6 Select the object to be created and click on

Select object



- ※ Multiple selections are possible for the material of the creation source
- ※ A drilling object creates an individual excavation shape for each member



## Application example

We will create a drilling model using solid editing

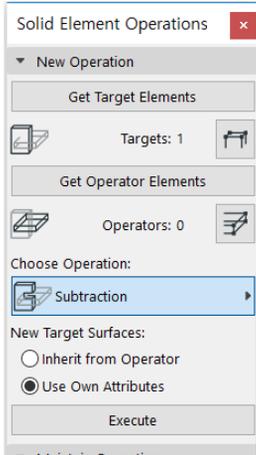
Design from menu bar → We will start solid editing.

### 【 Creating a roof cut model 】

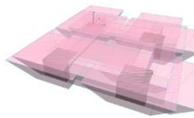
Step 1) Create excavation object

Step 2) Solid editing of the site

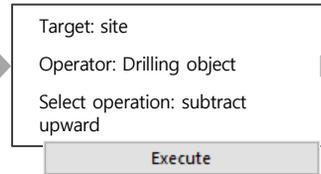
Perform the solid editing of the site (target: site, operator: excavation object, select operation, subtract upward) and click 「execute」



Create excavation object



Solid editing of the site



Step 3) Morphing the premises

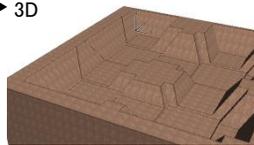
※ By morphing the root cut model, it is possible to set the root bottom and the normal surface

on 3D and display the normal surface shape on 2D

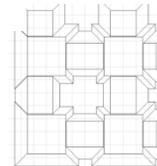
※Please note once it is converted to morph, it can not be returned to the operation before digging

< Completion of root cut model >

▶ 3D



▶ 2D



※ In the 2D display, it is also possible to utilize 3D documents without morphing

### 【 Creation of drilling quantity model 】

Step1) Creation of excavation objects and copy of the site

After creating the excavation object, copy the site and make it two, and set it as the site ①, the site ②

Step 2) Solid editing and morphing of the site ① Perform solid editing (target: site ①, operator: excavation object, operation selection: upward direction) of the site ①, click on "execution", create a root model and then make it morph

Step 3) Solid editing of the site ② Perform solid editing of the site ② (target: site ②, operator: site ①, select the operation: subtract) and click "Execute"

Solid editing of site ①

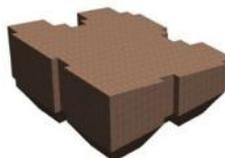
Target: Site ①  
Operator: Drilling object  
Select operation: subtract upward

Solid editing of site ②

Target: Site 2  
Operator: Site ①  
Select operation: subtraction

< Completion of drilling quantity model >

▶ 3D



※ It is also valid when the site is inclined  
※ By displaying the volume with the volume display tool it is possible to display the quantity

Drilling quantity 305.71m<sup>3</sup>