Instant Wall   Misc Parameters

The script takes a selected group as input. The group must contain a line or series of connected lines which may form at most a single closed loop. The script locates arch-spacing, pilasters, steps and/or fence posts at each line break. The number of line breaks may be increased by selecting the 'Shorten Segments' or 'Add Steps' parameters.

Slope / Step   *All styles can be modeled as sloped or stepped.*
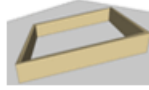
----- S T Y L E   P A R A M E T E R S ----

MISC PARAMETERS

⦿ Slope	○ Step	
Drop to Terrain?	⦿ Yes ○ No ○ End Pts	
Extend Bottom?	○ Yes ⦿ No	
Shorten Segments?	⦿ Yes ○ No	
Max Length	8'	

MISC PARAMETERS

○ Slope	⦿ Step
Step Increment	8"
Add Steps?	○ Yes ⦿ No
Drop to Terrain?	⦿ Yes ○ No ○ End Pts
Extend Bottom?	○ Yes ⦿ No
Shorten Segments?	⦿ Yes ○ No
Max Length	8'
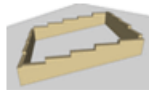
MISC PARAMETERS

○ Slope	⦿ Step
Step Increment	8"
Add Steps?	○ Yes ⦿ No

Add Steps *Attempts to add as many steps as possible based on the "Step Increment" parameter*

MISC PARAMETERS

○ Slope	⦿ Step
Step Increment	8"
Add Steps?	⦿ Yes ○ No
Drop to Terrain?	⦿ Yes ○ No ○ End Pts

MISC PARAMETERS

|	
○ Slope	⦿ Step
Step Increment	8"
Add Steps?	○ Yes ⦿ No
Drop to Terrain?	⦿ Yes ○ ○ End Pts

For the next 5 model images I started with a group enclosing 3 connected lines suspended over a sloped terrain.
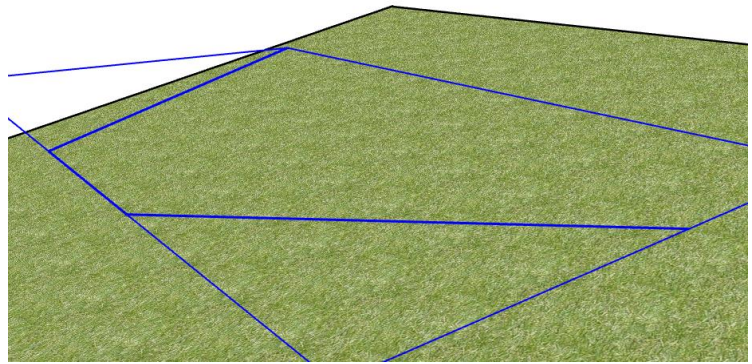
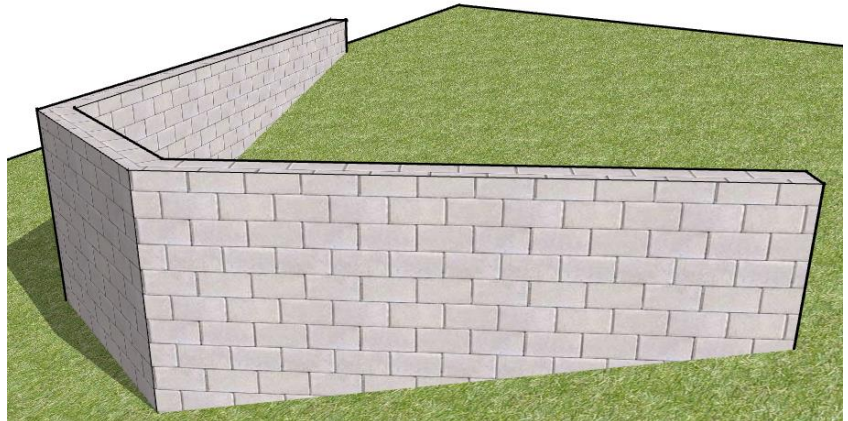### Set bottom of pilasters at terrain elevation.

MISC PARAMETERS

	Slope	● Step
Step Increment	**8"**	
Add Steps?	● Yes ○ No	
Drop to Terrain?	● Yes ○ No ○ End Pts	
Extend Bottom?	● ○ No	
Additional Depth	**8'**	
Shorten Segments?	○ Yes ● No	
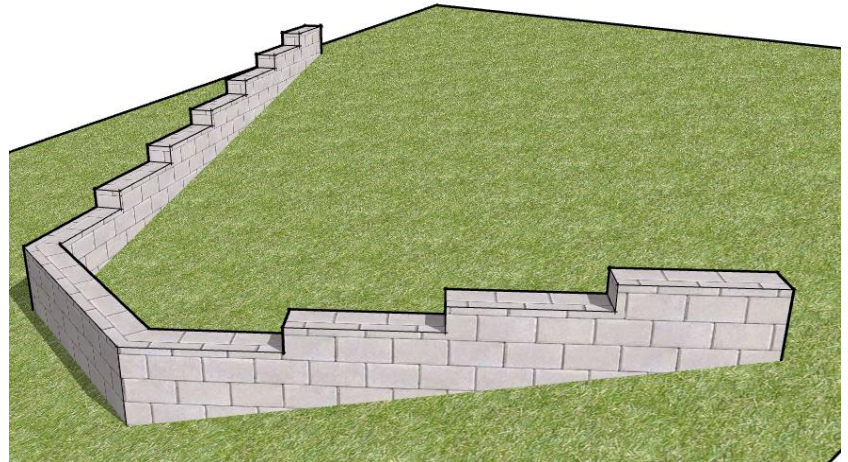
Set bottom of pilasters or wall breaks at input curve elevation

MISC PARAMETERS

	Slope	● Step
Step Increment	**8"**	
Add Steps?	● Yes ○ No	
Drop to Terrain?	○ Yes ● No ○ End Pts	
Extend Bottom?	● Yes ○	
Additional Depth	**8'**	
Shorten Segments?	○ Yes ● No	

For retaining walls. Sets beginning and end of wall at terrain and interpolates a flat slope between them

MISC PARAMETERS

	Slope	● Step
Step Increment	**8"**	
Add Steps?	● Yes ○ No	
Drop to Terrain?	○ Yes ○ No ● End Pts	
Extend Bottom?	● Yes ○ No	
Additional Depth	**8'**	
Shorten Segments?	○ Yes ● No	
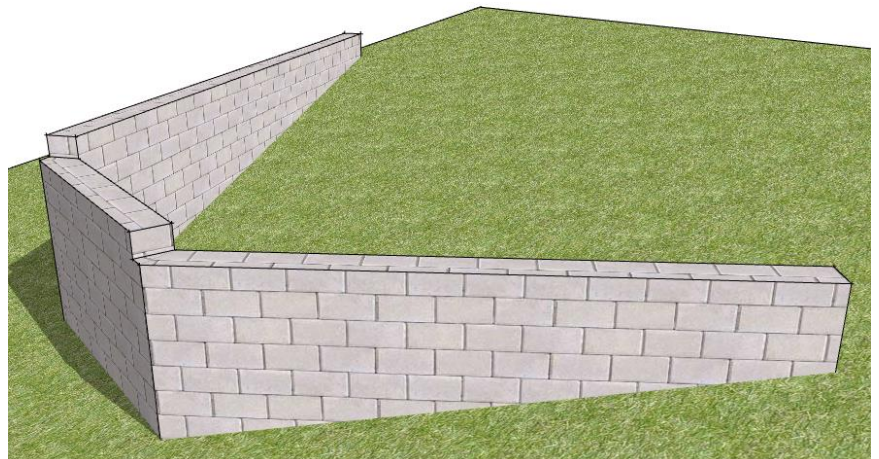
Extend Bottom   *Option to add depth to wall and pilasters. Required for retaining walls. Often useful for other sloped conditions.*
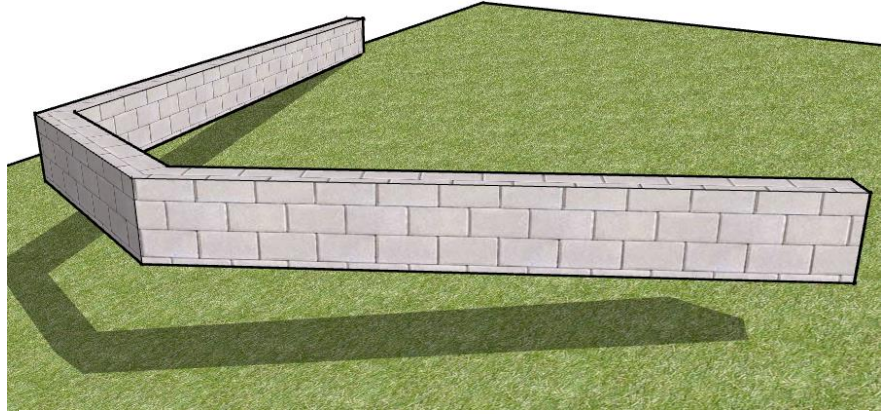
MISC PARAMETERS

○ ⬜ Slope	◉ ⬜ Step
Step Increment	8"
Add Steps?	◉ Yes ○ No
Drop to Terrain?	○ Yes ◉ No ○ End Pts
Extend Bottom?	○ Yes ◉ No
Shorten Segments?	○ Yes ◉

MISC PARAMETERS

○ ⬜ Slope	◉ ⬜ Step
Step Increment	8"
Add Steps?	◉ Yes ○ No
Drop to Terrain?	○ Yes ◉ No ○ End Pts
Extend Bottom?	◉ Yes ○ No
Additional Depth	8'
Shorten Segments?	○ Yes ◉ No
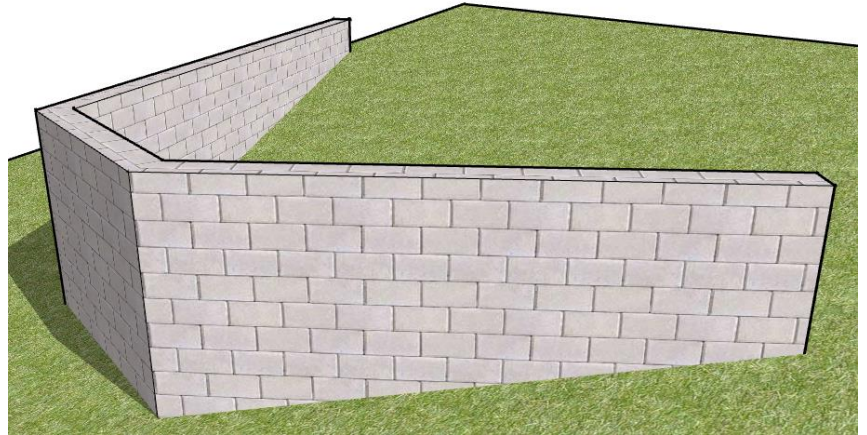
Additional Depth

Extend Bottom?	◉ Yes ○ No
Additional Depth	4'
Shorten Segments?	◉ Yes ○ No

Shorten Segments   *Adds intermediate wall breaks and pilasters between and in addition to the breaks in the input curve*

MISC PARAMETERS

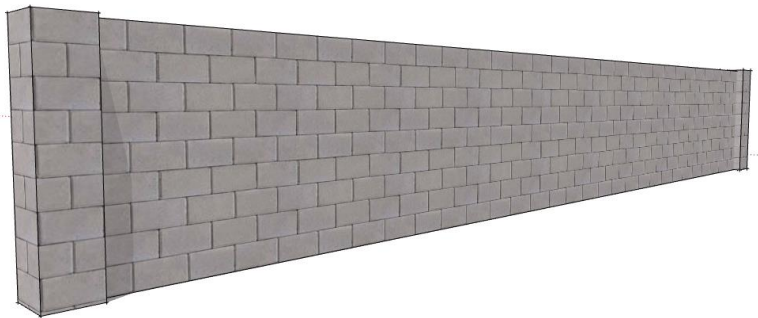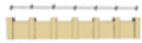|	
○ ⬜ Slope	◉ ⬜ Step
Step Increment	8"
Drop to Terrain?	◉ Yes ○ No ○ End Pts
Extend Bottom?	○ Yes ◉ No
Shorten Segments?	◉ Yes ○ No
Max Length	12'
Pilaster Rotation	Align with Wall

MISC PARAMETERS

○ ⬜ Slope	◉ ⬜ Step
Step Increment	8"
Drop to Terrain?	◉ Yes ○ No ○ End Pts
Extend Bottom?	○ Yes ◉ No
Shorten Segments?	○ Yes ◉ No
Pilaster Rotation	Align with Wall
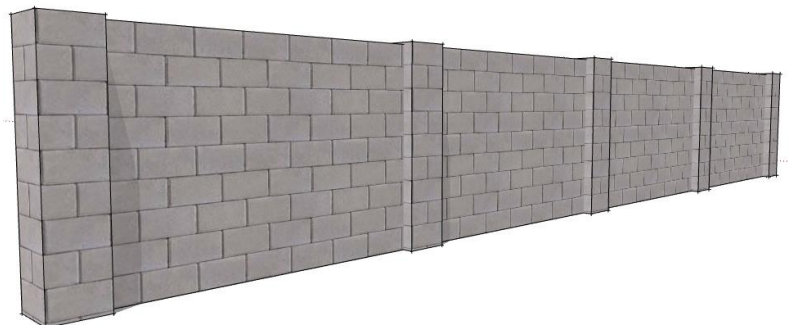
Shorten Segments?	◉ Yes ○ No
Max Length	8'
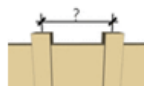
Pilaster Locations
Pilasters are placed at each break in the input curve plus intermediate points if Shorten Segments is selected. If this results in more pilasters than desired, simply erase the extra ones.

OUTPUT: PILASTER AT EACH JOINT

ERASED PILASTERS NOT NEEDED

Pilaster Rotation
Several options for pilaster rotations.

MISC PARAMETERS

◉ Slope ○ Step

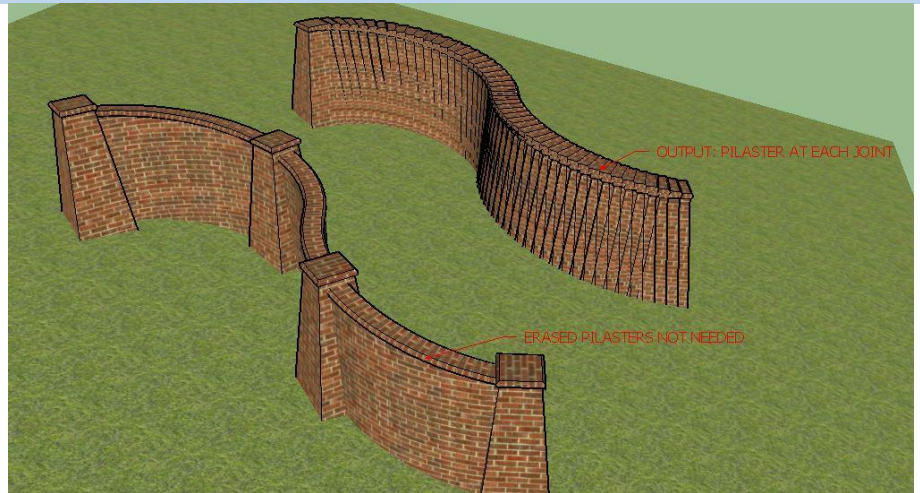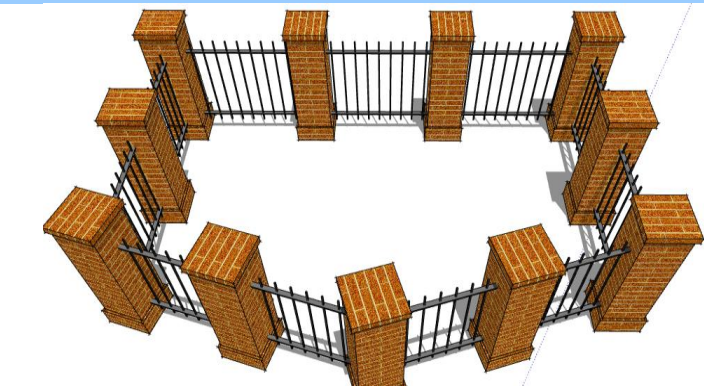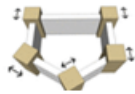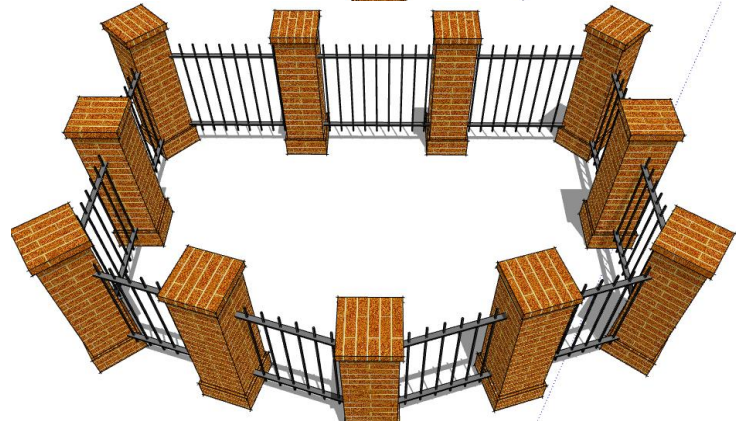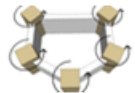Drop to Terrain? ◉ Yes ○ No ○ End Pts

Extend Bottom? ○ Yes ◉ No

Shorten Segments? ○ Yes ◉ No

Pilaster Rotation [Align with Wall ▾]

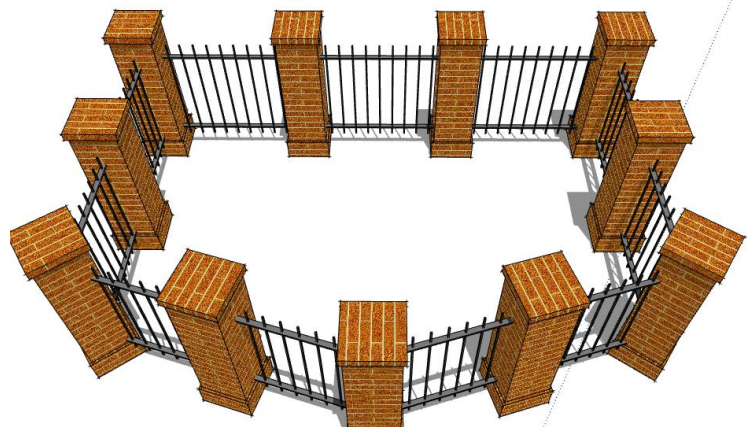Datum for Infill ○ Pilaster ○ Wall ◉ Grade

MISC PARAMETERS

◉ Slope ○ Step

Drop to Terrain? ◉ Yes ○ No ○ End Pts

Extend Bottom? ○ Yes ◉ No

Shorten Segments? ○ Yes ◉ No

Pilaster Rotation [Align with Miters ▾]

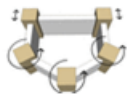Datum for Infill ○ Pilaster ○ Wall ◉ Grade

MISC PARAMETERS

◉ Slope ○ Step

Drop to Terrain? ◉ Yes ○ No ○ End Pts

Extend Bottom? ○ Yes ◉ No

Shorten Segments? ○ Yes ◉ No

Pilaster Rotation [with Miters except 90 Deg. ▾]

Datum for Infill ○ Pilaster ○ Wall ◉ Grade
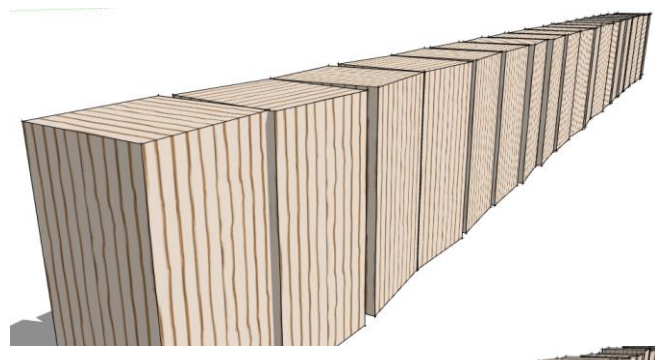
MISC PARAMETERS

- ◉ Slope   ○ Step
- Drop to Terrain? ◉ Yes ○ No ○ End Pts
- Extend Bottom? ○ Yes ◉ No
- Shorten Segments? ○ Yes ◉ No
- Pilaster Rotation Wiggle Rotation
- Datum for Infill ○ Pilaster ○ Wall ◉ Grade
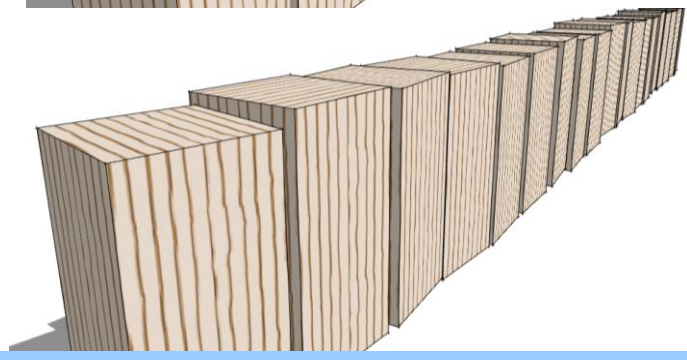
MISC PARAMETERS

- ◉ Slope   ○ Step
- Drop to Terrain? ○ Yes ◉ No ○ End Pts
- Extend Bottom? ○ Yes ◉ No
- Shorten Segments? ◉ Yes ○ No
- Max Length 1' 1"
- Pilaster Rotation Wiggle Rotation and Height

Datum for Infill *Sets baseline height for added posts, rails and infill panels.*

MISC PARAMETERS

- ◉ Slope   ○ Step
- Drop to Terrain? ◉ Yes ○ No ○ End Pts
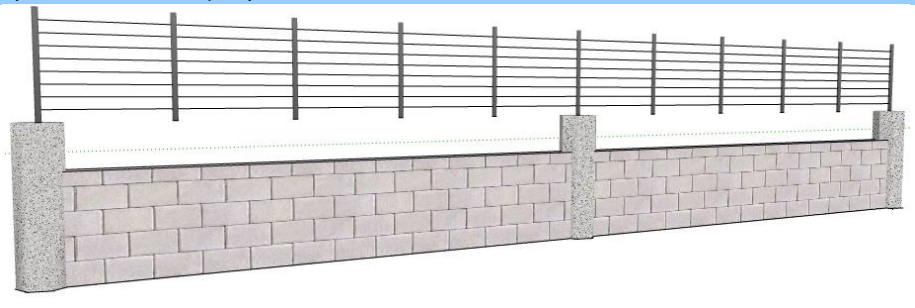- Extend Bottom? ○ Yes ◉ No
- Shorten Segments? ◉ Yes ○ No
- Max Length 16'
- Circle Precision 7
- Pilaster Rotation Align with Wall
- Datum for Infill ◉ Pilaster ○ Wall ○ Grade

MISC PARAMETERS

- ◉ Slope   ○ Step
- Drop to Terrain? ◉ Yes ○ No ○ End Pts
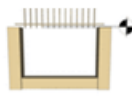- Extend Bottom? ○ Yes ◉ No
- Shorten Segments? ◉ Yes ○ No
- Max Length 16'
- Circle Precision 7
- Pilaster Rotation Align with Wall
- Datum for Infill ○ Pilaster ◉ Wall ○ Grade

MISC PARAMETERS

- ◉ Slope   ○ Step
- Drop to Terrain? ◉ Yes ○ No ○ End Pts
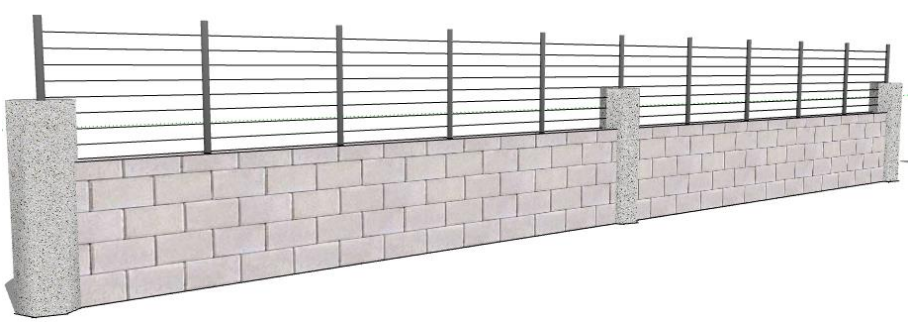- Extend Bottom? ○ Yes ◉ No
- Shorten Segments? ◉ Yes ○ No
- Max Length 16'
- Circle Precision 7
- Pilaster Rotation Align with Wall
- Datum for Infill ○ Pilaster ○ Wall ◉ Grade

Arch Precision *Number of arch segments*

| Arch Precision | 12 |
| VOUSSOIRS | |

| Circle Precision | 5 |

Voussoir Parameters

MISC PARAMETERS

- ⦿ Slope ◯ Step
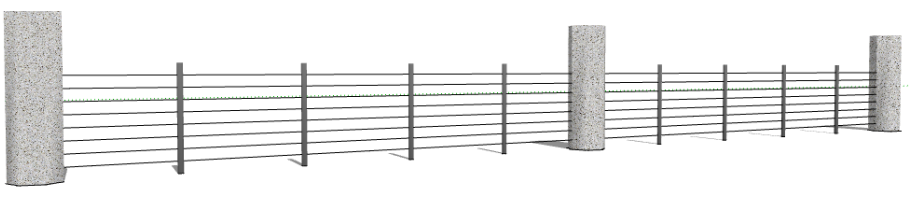- Drop to Terrain? ⦿ Yes ◯ No ◯ End Pts
- Extend Bottom? ◯ Yes ⦿ No
- Shorten Segments? ⦿ Yes ◯ No
- Max Length: 16'
- Circle Precision: 7
- Pilaster Rotation: Align with Wall
- Datum for Infill ◯ Pilaster ⦿ Wall ◯ Grade
- ☑ VOUSSOIRS
- Voussour Depth: 6"
- Voussoir Surface: Flush

MISC PARAMETERS

- ⦿ Slope ◯ Step
- Drop to Terrain? ◯ Yes ⦿ No ◯ End Pts
- Extend Bottom? ◯ Yes ⦿ No
- Shorten Segments? ⦿ Yes ◯ No
- Max Length: 10'
- Arch Precision: 12
- ☑ VOUSSOIRS
- Voussour Depth: 8"
- Voussoir Surface: Recessed
- Reveal: 2

MISC PARAMETERS

○ ⬭ **Slope**   ○ ⬭ **Step**

Drop to Terrain? | ○ Yes ◉ No ○ End Pts
Extend Bottom? | ○ Yes ◉ No
Shorten Segments? | ◉ Yes ○ No

| Max Length | 10' |
| Arch Precision | 12 |

☑ **VOUSSOIRS**

Voussour Depth	8"
Voussoir Surface	Raised
Reveal	2"

☑ **VOUSSOIRS**

Voussour Depth	6"
Voussoir Surface	Recessed
Reveal	1"

☑ **VOUSSOIRS**

Voussour Depth	6"
Voussoir Surface	Recessed
Reveal	1"