12.1.11 Editors - Geometry Nodes Editor - Header - Add Menu - Geometry - Sample

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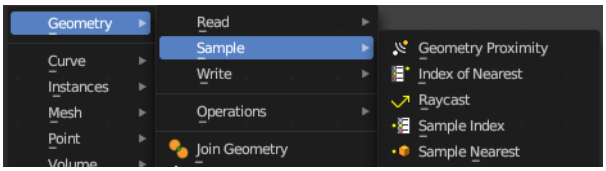
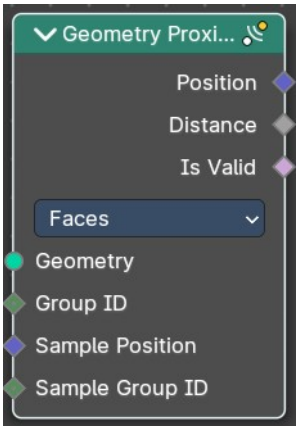
Add menu - Geometry - Sample

Here you find nodes to modify the geometry.



Geometry Proximity



This node finds the closest position on the target for each point in the input geometry.

Inputs

Geometry

The target object.

Group ID

Is evaluated on the face domain, and splits the input mesh into multiple parts, each with its own id.

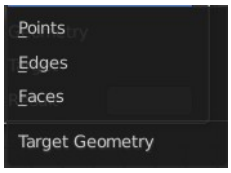
Sample Position

The position where the computed location is stored.

Sample Group ID

Determines in which group the closest nearest surface is detected.

Properties



Target Geometry

The element of the target geometry to calculate the distance from.

Outputs

Position

Closest location on the surface of the target mesh, or the closest point in the target point cloud in Points mode.

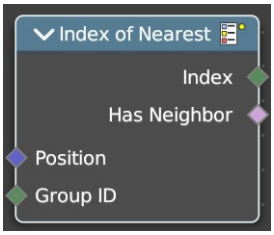
Distance

Distance from the source position to the closest location in the target.

Is Valid

Wether the sampling was successful. It is false when the sampled group is empty.

Index of Nearest



Retreive values from specific geometry elements.

Inputs

Position

The position of the nearest element.

Group ID

The group ID of the nearest element.

Outputs

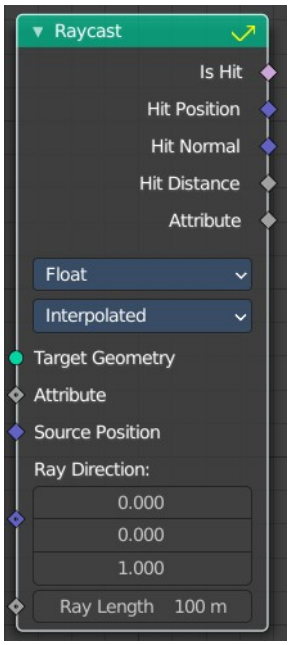
Index

The Index of the nearest element.

Has Neighbor

Has this element a neighbor.

Raycast



This node sends a raycast and retreives data from the hit target.

Inputs

Target Geometry

This is actually the source object that sends the ray.

Attribute

Attribute input.

Source Position

Source position input.

Ray Direction

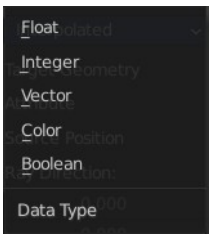
A vector 3 for the ray direction.

Ray Length

The length of the ray.

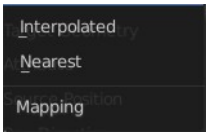
Properties

Data Type



What data to calculate on hit.

Mapping



Mapping from the target geometry to hit points. Interpolated or nearest.

Output

Is Hit

Has the raycast hit something?

Hit Position

The hit position if any.

Hit Normal

The normal of the hit point.

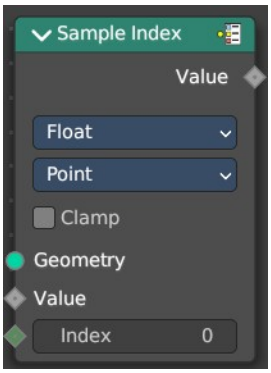
Hit Distance

The distance of the hit point.

Attribute

The attribute of the hit object.

Sample Index



Retreive values from specific geometry elements.

Inputs

Geometry

The source object to take the data from.

Value

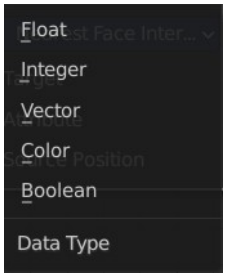
The value to retreive.

Index

The index position of the value.

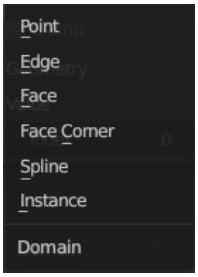
Properties

Data Type



The type for the source and result data.

Domain



What kind of data to process.

Clamp

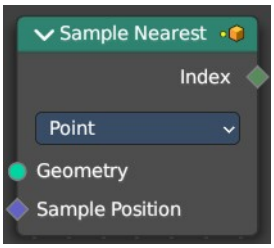
Clamp the indices to the size of the attribute domain.

Output

Value

The output value.

Sample Nearest



Retreives the element of a geometry closest to a position.

Inputs

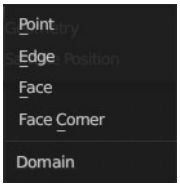
Geometry

The source object to take the data from.

Sample Position

The position of the source object.

Properties



Domain

What data to process.

Output

Index

The index output.