Blueprint Spline Mesh Component Property Reference

Contains a reference of all properties available in the editor for Blueprint Spline Mesh Components.

This page contains a reference listing of properties available on **Blueprint Spline Mesh Components**. The properties displayed will be slightly different if the **Blueprint Spline Mesh Component** is selected in the **Blueprint Editor**, is a **Root Component**, or if the component is selected in the **Level Editor**.

Properties

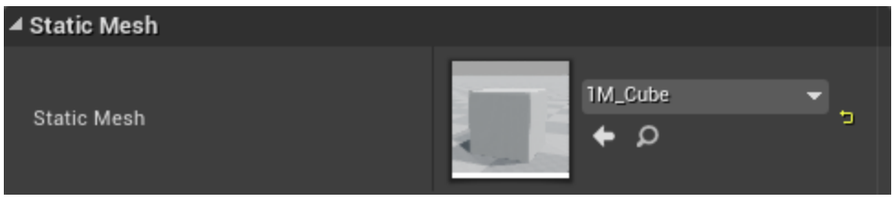
Transform

Property	Description
Location	The location of the **Actor** or **Component** in **World Space** or **Relative** to its parent.
Rotation	The rotation of the **Actor** or **Component** in **World Space** or **Relative** to its parent.
Scale	The Scale of the **Actor** or **Component** in **World Space** or **Relative** to its parent.

Sockets

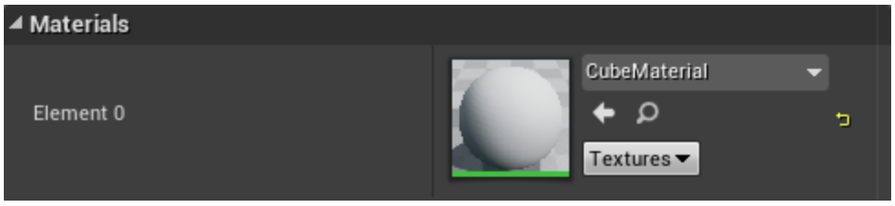
Property	Description
Parent Socket	When this component is the **Child** of a **Skeletal Mesh Component** (or **Static Mesh Component** with a **Socket**), you can specify a **Socket** or **Joint** to attach this component to.

Static Mesh



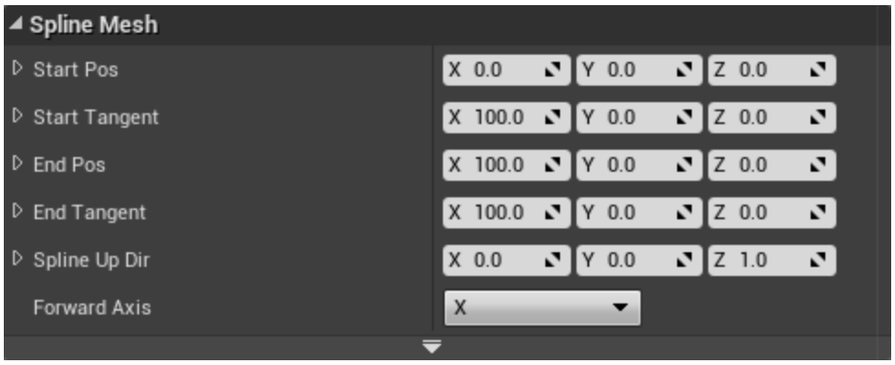
Property	Description
Static Mesh	Specifies the **Static Mesh** to render for this component.

Materials



Property	Description
Element #	Once a **Static Mesh** has been specified in the **Static Mesh Property**, a number of additional **Material Properties** will appear. These will be named based on the **Material IDs** applied to the **Static Mesh**.

Spline Mesh



Property	Description
Start Pos	Start location of spline, in component space.
Start Tangent	Start tangent of spline, in component space.
End Pos	End location of spline, in component space.

Property	Description
End Tangent	End tangent of spline, in component space.
Spline Up Dir	Axis (in component space) that is used to determine X axis for co-ordinates along spline
Forward Axis	Chooses the forward axis for the spline mesh orientation

Advanced

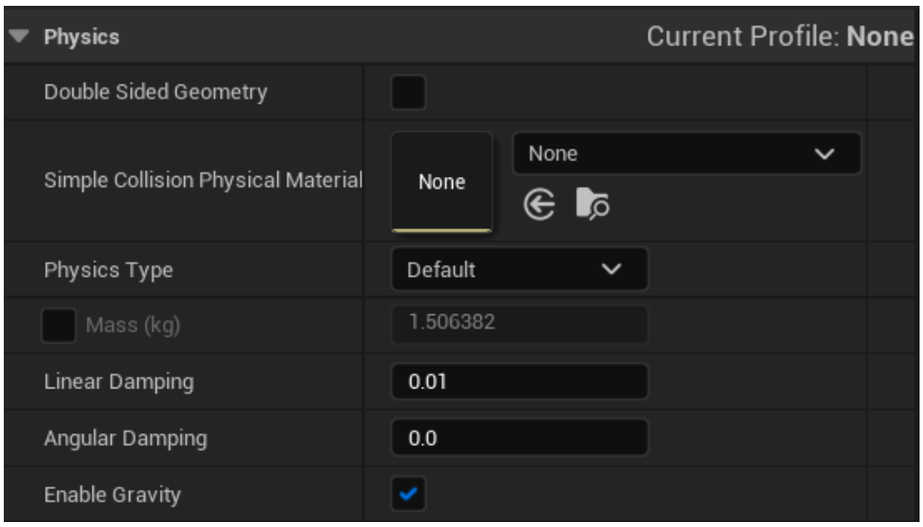
Property	Description
Start Scale	X and Y scale applied to mesh at start of spline.
Start Roll	Roll around spline applied at start, in radians.
Start Offset	Starting offset of the mesh from the spline, in component space.
End Scale	X and Y scale applied to mesh at end of spline.
End Roll	Roll around spline applied at end, in radians.
End Offset	Ending offset of the mesh from the spline, in component space.
Smooth Interp Roll Scale	If true, will use smooth interpolation (ease in/out) for Scale, Roll, and Offset along this section of spline.
Spline Boundary Min	Minimum coordinate along the spline forward axis which corresponds to start of spline.
Spline Boundary Max	Maximum coordinate along the spline forward axis which corresponds to end of spline.

Spline

Property	Description
Allow Spline Editing Per Instance	If true, spline mesh properties - StartPos, EndPos, StartTangent and EndTangent- may be edited per instance in the level viewport.

Physics

Physics



Property	Description
Double Sided Geometry	If enabled, the physics triangle mesh will use double-sided faces when doing scene queries. This is useful for planes and single-sided meshes that need traces to work on both sides.
Simple Collision Physical Material	Physical material to use for simple collision on this body. Encodes information about density, friction, and so on.
Physics Type	• Simulated: Object will use physics simulation. • Kinematic: Object will not be affected by physics, but can interact with physically simulated bodies. • Default: Object will inherit from OwnerComponent's behavior.
Mass in KG	Mass of the body in KG.
Linear Damping	'Drag' force added to reduce linear movement.
Angular Damping	'Drag' force added to reduce angular movement.

Property	Description
Enable Gravity	If the object should have the force of gravity applied.

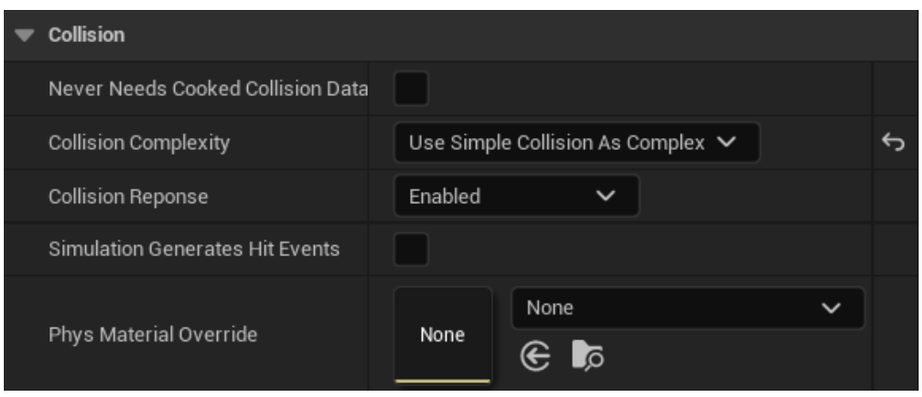
Advanced

Property	Description
Start Awake	If the object should start awake, or if it should initially be sleeping.
Center Of Mass Offset	User specified offset for the center of mass of this object, from the calculated location.
Mass Scale	Per-instance scaling of mass.

Property	Description
Max Angular Velocity	The maximum angular velocity for this instance.
Sleep Family	The set of values used in considering when to put this body to sleep. Normal, Sensitive, Custom.
Inertia Tensor Scale	Per-instance scaling of inertia (larger values mean more difficulty rotating)
Walkable Slope Override	Custom walkable slope setting for this body. See the Walkable Slope documentation for usage information.
Walkable Slope Behavior	Behavior of this surface (whether we affect the walkable slope).
Walkable Slope Angle	Override a walkable slope, applying the rules of the Walkable Slope Behavior.
Custom Sleep Threshold Multiplier	If the Sleep Family is set to **Custom**, multiply the natural sleep threshold by this amount. A higher number will cause the body to sleep sooner.
Stabilization Threshold Multiplier	The stabilization factor for this body if Physics stabilization is enabled. A higher number will cause more aggressive stabilization at the risk of loss of momentum at low speeds. A value of 0 will disable stabilization for this body.
Update Mass when Scale Changes	If true, it will update the mass when the scale changes.
Generate Wake Events	Determines whether 'wake/sleep' events should fire when this object is woken up or put to sleep by the physics simulation.

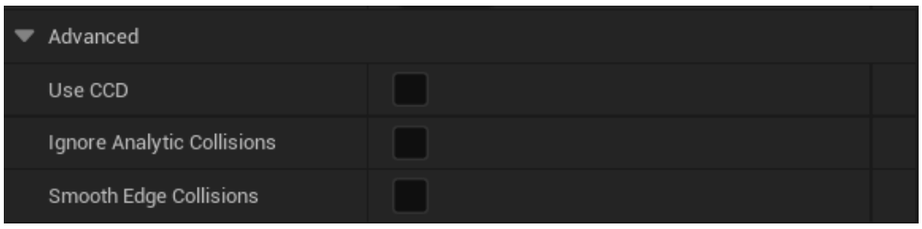
Collision

Collision



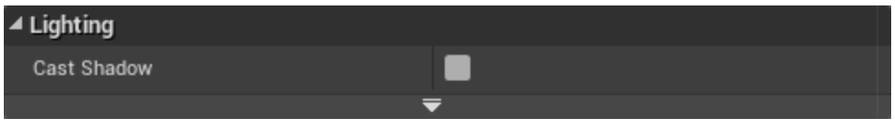
Property	Description
Never Needs Cooked Collision Data	To do chaos this is to opt out of CreatePhysicsMeshes for certain meshes. Better a long term mesh is not to call CreatePhysicsMesh until is known there is a mesh instance that needs it.
Collision Complexity	Collision Trace behavior - by default, it will keep simple (convex) and complex (per-poly) separate.
Collision Responses	See the Collision Response Reference documentation for more information.
Simulation Generates Hit Events	Should 'Hit' events fire when this object collides during physics simulation.
Phys Material Override	Allows you to override the PhysicalMaterial to use for simple collision on this body.

Advanced



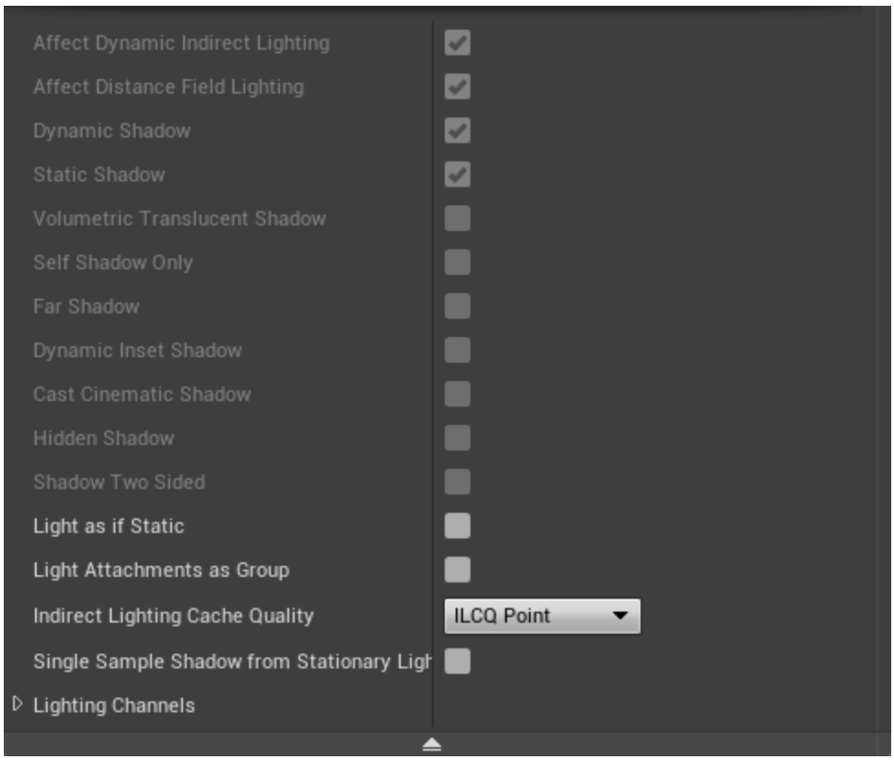
Property	Description
Use CCD	If true Continuous Collision Detection (CCD) will be used for this component
Ignore Analytic Collisions	If true, ignore analytic collisions and treat objects as a general implicit surface.
Smooth Edge Collisions	Remove unnecessary edge collisions to allow smooth sliding over surfaces composed of multiple actors/components.

Lighting



Property	Description
Cast Shadow	is true.

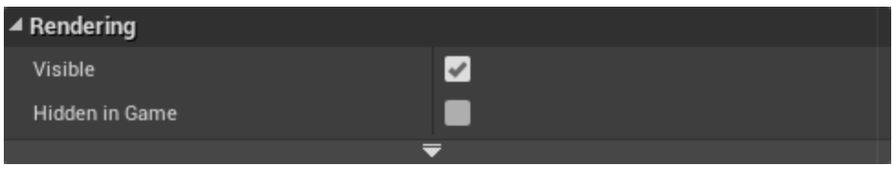
Advanced



Property	Description
Affect Dynamic Indirect Lighting	Controls whether the primitive should influence indirect lighting.
Affect Distance Field Lighting	Controls whether the primitive should affect dynamic distance field lighting methods.
Cast Dynamic Shadow	Controls whether the primitive should cast shadows in the case of non precomputed shadowing.
Cast Static Shadow	Whether the object should cast a static shadow from shadow casting lights.
Cast Volumetric Translucent Shadow	Whether the object should cast a volumetric translucent shadow.
Self Shadow Only	When enabled, the component will only cast a shadow on itself and not other components in the world.
Cast Far Shadow	When enabled, the component will be rendering into the far shadow cascades (only for directional lights).
Cast Inset Shadow	Whether this component should create a per-object shadow that gives higher effective shadow resolution.

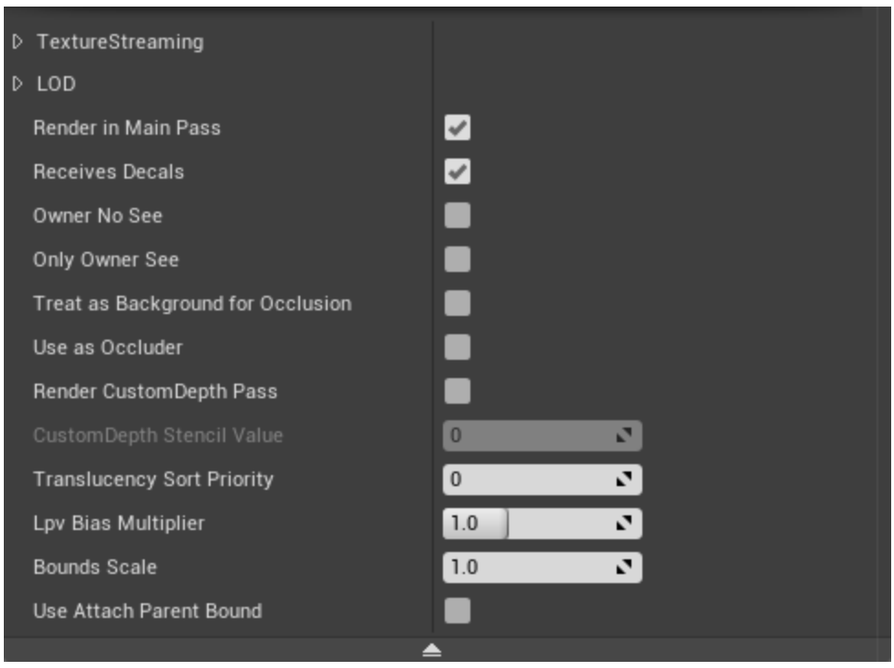
Property	Description
Cast Cinematic Shadow	Whether this component should cast shadows from lights that have bCastShadowsFromCinematicObjectsOnly enabled.
Cast Hidden Shadow	If true, the primitive will cast shadows even if bHidden is true.
Cast Shadow as Two Sided	Whether this primitive should cast dynamic shadows as if it were a two sided material.
Light as if Static	
Light Attachments as Group	set in a parent.
Indirect Lighting Cache Quality	Quality of indirect lighting for Movable primitives.
Single Sample Shadow From Stationary Lights	Whether the whole component should be shadowed as one from stationary lights, which makes shadow receiving much cheaper.
Lighting Channels	Channels that this component should be in.

Rendering



Property	Description
Visible	.
Hidden in Game	Whether to hide the primitive in game, if the primitive is Visible.

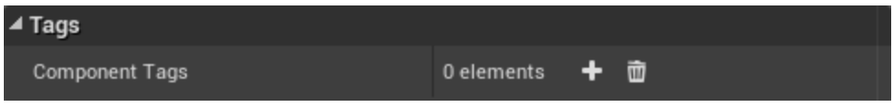
Advanced



Property	Description
Texture Streaming	• **Force Mip Streaming**: If true, forces mips for textures used by this component to be resident when this component's level is loaded.
LOD	• **Min Draw Distance**: The minimum distance at which the primitive should be rendered, measured in world space units from the center of the primitive's bounding sphere to the camera position. • **Desired Max Draw Distance**: Max draw distance exposed to LDs. • **Current Max Draw Distance**: The distance to cull this primitive at. • **Allow Cull Distance Volume**: Whether to accept cull distance volumes to modify cached cull distance. • **Detail Mode**: If detail mode is >= system detail mode, primitive won't be rendered.
Render In Main Pass	If true, this component will be rendered in the main pass (z prepass, basepass, transparency)
Receives Decals	Whether the primitive receives decals.
Owner No See	If this is True, this component won't be visible when the view actor is the component's owner, directly or indirectly.
Only Owner See	If this is True, this component will only be visible when the view actor is the component's owner, directly or indirectly.
Treat As Background for Occlusion	Treat this primitive as part of the background for occlusion purposes.

Property	Description
Use As Occluder	Whether to render the primitive in the depth only pass.
Render CustomDepth Pass	If true, this component will be rendered in the CustomDepth pass (usually used for outlines)
CustomDepth Stencil Value	Optionally write this 0-255 value to the stencil buffer in CustomDepth pass (Requires project setting or r.CustomDepth == 3)
Translucency Sort Priority	Translucent objects with a lower sort priority draw behind objects with a higher priority. Translucent objects with the same priority are rendered from back-to-front based on their bounds origin.
Lpv Bias Multiplier	
Bounds Scale	Scales the bounds of the object.
Use Attach Parent Bound	If true, this component uses its parents bounds when attached.

Tags



Property	Description
Component Tags	Array of tags that can be used for grouping and categorizing. Can also be accessed from scripting.

Activation

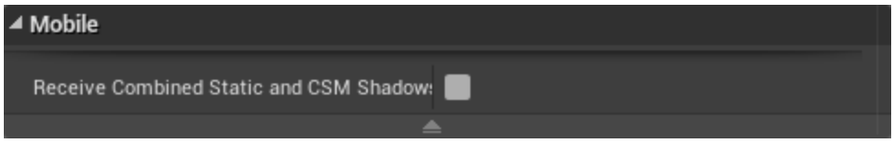
Property	Description
Auto Activate	Whether the component is activated at creation or must be explicitly activated.

Events

Property	Description
On Component Hit	Event called when a component hits (or is hit by) something solid.
On Component Begin Overlap	Event called when something starts to overlaps this component, for example a player walking into a trigger.
On Component End Overlap	Event called when something stops overlapping this component
On Component Wake	Event called when the underlying physics objects is woken up
On Component Sleep	Event called when the underlying physics objects is put to sleep
On Begin Cursor Over	Event called when the mouse cursor is moved over this component and mouse over events are enabled in the player controller
On End Cursor Over	Event called when the mouse cursor is moved off this component and mouse over events are enabled in the player controller
On Clicked	Event called when the left mouse button is clicked while the mouse is over this component and click events are enabled in the player controller
On Released	Event called when the left mouse button is released while the mouse is over this component click events are enabled in the player controller

Property	Description
On Input Touch Begin	Event called when a touch input is received over this component when touch events are enabled in the player controller
On Input Touch End	Event called when a touch input is released over this component when touch events are enabled in the player controller
On Input Touch Enter	Event called when a finger is moved over this component when touch over events are enabled in the player controller
On Input Touch Leave	Event called when a finger is moved off this component when touch over events are enabled in the player controller
Physics Volume Changed	Delegate that will be called when PhysicsVolume has been changed.

Mobile



Property	Description
Receive Combined Static and CSM Shadows from Stationary Lights	