

Forum:[Hack Forums](#)

Thread: [How do I start making game engine ?](#)

Aleksas - July 1, 2016, 7:31 am

Hey there, I tried to search for myself for info, but it's very tiny and not helpful. If any of you can suggest some tutorials how to start making game engine or can even help, that would be appreciated.

Xorus - July 1, 2016, 9:27 am

If you're wanting to make your own game engine there are a few things that you should ask yourself:

Are you doing this for experience?

or

Are you attempting to make a game?

While neither of these are exclusive it will be important to focus on what you are actually trying to accomplish.

Making a game engine for experience is a great way to learn a language in-depth, but it requires a large amount of research prior. First, I would recommend understanding how game engines generally function (How the main loop works, splitting logic and rendering, understanding inheritance, etc). Almost all engines will follow the same general formula with some obvious changes and tweaks that fit best for what that company is trying to accomplish.

This blog post goes over some of the concepts of how a game-engine works:

http://www.gamasutra.com/blogs/MichaelKissner/20151027/257369/Writing_a_Game_Engine_from_Scratch_Part_1_Messaging.php

Keep in mind that although the example code is written in C++ the logic will apply to any language. From personal experience I can say that writing an engine is not an easy process so be prepared for a large undertaking.

For the second part, are you just trying to make a game?

If so, then making a game-engine is a fruitless endeavor. I would much more suggest you check out something like PyGame which was already designed so that people could make games with it. This would allow you to dive straight into game-development without having to first tackle the engine. Along with PyGame there are other alternatives that you could try as well such as Python Ogre.

Neeeeeeeeeeel.- - July 1, 2016, 11:40 am

If you need to ask how to create a game engine, you shouldn't even try to create one. It's not a simple thing you can create with some hours of work, it needs a lot of knowledge (knowledge that is not only limited to programming skills, things like physics, maths, etc.).

As Xorus correctly explained, if you just want to make a game it's recommended to use a known engine. PyGame is very easy to learn, and powerful.

NinjaLeaks - July 1, 2016, 11:48 am

First thing to do would be to figure out in which language you want to program the engine in. Then

ask yourself if you have experience in the language and if you do then you can move on, if not then I suggest to start learning it over a period of time. Programming languages can take years to master but its just a essential when coding your own engine. When you know your desired programming language fairly good you can start to experiment with different plat forms such as openGL if you are shooting for a 3d based engine. Look up a few other platforms which can get you started (google helps ;D)

Next you would want to start creating the base of the engine which would be like a rendering class, methods class, etc. There are a bunch of things that need to be put into consideration but these are just the basics. You just build up from there pretty much. Here is a good youtube channel with tutorials on Java and openGL it helped me when I was struggling to make my first engine ;)

<https://www.youtube.com/user/ThinMatrix>

Hope I helped and good luck!

Aleksas - July 2, 2016, 4:12 am

You guys seem to not understand that I'm quite experienced with Python, also I am making a game, and slowly getting things automatic, that's why I need some knowladge of game engine so it's easier for me to think of ways to make everything automatic. Also, I'm not making 3d game, I'm making 2d game from scratch (and have quite good progress already). Now my question is, where can I learn more about game engines ? (Also gonna check ThinMatrix youtube channel).

0x52-0x75-0x64-0x79 - July 2, 2016, 10:27 am

Below should be some interesting resources for you:

Blogs:

[Game-Dev: Core Design Principles](#)

[GameDev: Enginuity](#)

Books:

[Game Coding Complete, Third Edition](#)

[Game Engine Architecture](#)

I wish you the best of luck...

Aleksas - July 2, 2016, 10:38 am

(Jul 2, 2016 10:27 AM)0x52-0x75-0x64-0x79 Wrote: [\[CITE\]](#) Below should be some interesting resources for you:

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I wish you the best of luck...
Thank you mate.

Goodies - *July 2, 2016, 11:08 am*

Learn a different language. A pure python game engine would be absolutely horrible.