

But Why: A Podcast for Curious Kids

How are video games made?

June 12, 2026

Jane 00:20

This is, But Why: a Podcast for Curious Kids from Vermont Public. I'm Jane Lindholm. On this show, we take questions from curious kids all over the world, and we find answers. Today, wait, hang on just one second.

Video Game 00:35

Good.

Jane 00:36

Hang on, I just got it.

Video Game 00:38

Powerful.

Jane 00:39

Yes!

Video Game 00:41

Unbelievable.

Jane 00:42

Sorry, I got distracted. I finally beat the level on my phone game. I've been really struggling to get past it. Appears sometimes I get a little distracted by video games, and a lot of you might get distracted too. And many of you certainly enjoy video games and have been sending us a lot of questions about them.

Sophie 01:02

Hello, my name is Sophie. I am six years old. I live in Wyoming, and my question is, How are video games made? Because I really want to make one, so I want to know how they're made.

Jackson 01:18

My name is Jackson, and I live in Forney, Texas. I am eight years old, and my question is, Why do people play video games?

Cecelia 01:27

My name's Cecilia, I'm nine years old. I live in Liberty, Missouri, and my question is, Who invented video games?

Jane 01:34

We're going to tackle all those questions and more today, and we're going to look at video games more broadly as well.

Patrick 01:40

These days, video games can reflect whatever interest you have, whatever passions you have, and allows you to explore a little bit of yourself. And the people that make these video games, they want to make something that they enjoy too.

Jane 01:56

That's Patrick Klepek, a writer and editor for Crossplay, that's a newsletter focused on parenting and video games, and yes, he does get to play a lot of video games for his job, but maybe not as often as you might think.

Patrick 02:11

I wish my job was sitting down to play video games every day. In reality, it is playing video games late at night when my kids are asleep, or when I get a chance to play with them, it's a lot of talking to people who are much smarter than me about, like, you know, why do video games scare us? Like, why are why do kids love to play scary video games? Like, what is interesting about that? And then I come to you and explain, this is what the smart people said. How can I explain it in a way that you can understand too?

Jane 02:44

With Patrick's help, today we're going to start out on level one.

Emerson 02:48

My name's Emerson. I am seven years old. I'm from Wichita, Kansas, and I want to know, how are video games made?

Emily 02:57

Hi, my name's Emily. I'm eight years old, and I live in Kaiser, Oregon. How are video games made?

George 03:05

My name is George, and I'm from Sunnyvale, California. How are video games made?

Kai 03:11

My name is Kai, and I'm five and a half years old, and I live in Fitchburg. How are video games made?

Seamus 03:22

Hi, my name is Seamus, and I come from Live Oak, California, and I'm seven years old. How do we make video games?

Patrick 03:34

It starts with the story that you tell on a playground, or with your friends, or to yourself, like it is just an idea that somebody has. What happens after that, though, is it's great to have ideas like I want a character to go on a quest. Well, what are they going to do on that quest? Here are different things they could do. Who are the characters that they're going to meet? What are the actions they're going to take? What dangers are they going to encounter? And then you may have the idea for that story, but then all of a sudden you need friends to help you build out everything that's going to happen on that story, and maybe you're the one that's really great at coming up with the really snappy line of dialog, or the cool quest that they're going to go on, or how the hero is going to save the day, but then you might need your friends who can like make that appear on screen, who can draw up those characters, because we all have unique talents and interests, and the cool thing about video games is that it takes advantage of all the fancy new technology, but also the same creative interests that we get to explore on a daily basis, and then puts it into the cool thing that we call a video game. It's sort of like when you're at school and you get assigned into a group, and everyone has a different assignment on the project. Maybe you're a great artist, maybe you have great ideas, maybe you like writing words, maybe there's somebody who's really good at math, they understand how numbers work, and so when you see a character like Mario jump across the screen, someone came up with, why does he jump that high? Why does he run that fast? And someone programs a bunch of numbers into a computer that then, for you, become the game where you hold the A button down, and I can get Mario to jump a little bit, or a lot, or walk slow, or run fast, and those people all come together with different skills and different talents, largely built on computers to make the games that you get to play at home, it takes a lot of time. It takes a lot of talent, but it is the kind of thing that you can get these days. The tools are now readily available, so that even as young as 6,7,8,,9, there are ways where you can learn how to build simple video games. If you ever wanted to perhaps turn that into a career yourself.

Jane 05:44

You know, when I was a kid, there were video games, and more complicated video games that you could play at home were just getting started, but they didn't feel like movies. But we had a series of books that I used to like to read, called Choose Your Own Adventure Books, and you could make the choice as the reader, what you wanted the character to do next, and then it would tell you to go to a certain page, and you'd go to that page, and then the character would do the thing that you said they should do, and if you read the book again, you might make different choices, and different things would happen to the characters, and there weren't as many video games like that when I was a kid, and now it really is often these video games are choose your own adventures, so you, as the storyteller, have to have a lot of different possibilities for what might happen, depending on what the player decides is going to happen next for their character.

Patrick 06:34

Absolutely, and I think one of the big differences is, you know, when you and I were growing up, video games were still figuring out what they are. Can they tell stories? Video games didn't tell stories really when they got started. It was, you're a spaceship, there are asteroids. Have you thought about blowing them up? You're Mario, there's a princess. Think about going and rescuing her. It isn't something that necessarily stirs emotion, but these days video games tell very complicated stories that allow us to experience and engage with all of the emotional spectrum. We can be happy, we can be sad, we can make choices to be good, we can make choices to be bad. Video game stories now allow us to explore

the entire sort of human condition of like how we feel on a daily basis, the stories we experience in movies and games are not that dissimilar, like the feelings we can have in a book are something we can explore in a video game, and the neat part about a video game is you get to be the participant, you get to choose what that character does, you can for a moment go, hey, I'm a good person in real life, but like, I wonder what happens. What are the consequences if I'm a bad person in this video game? And it becomes a safe place to explore different ways that we're feeling. How might other people react to our actions in a way that doesn't necessarily impact our friends and family if we choose to act badly in front of them.

Rafi 08:04

My name is Rafi. I'm eight years old and I live in Chicago Illinois. Why do games have levels?

Patrick 08:08

Video games had levels because video games started out in the arcade. Video games used to be something that you had to go to a store that we called the arcade. There are arcades these days, but you couldn't play video games at home, and in the arcade you had to put in money, like quarters or dollars, in order to play them, and they wanted you to lose the video game because they wanted you to give them more money, and so if you finished level one, but die at level two. You have to start back at level one, and that sort of basic idea of, hey, these video games need money in order to play, which allows the people who run the arcade to make money by buying the expensive arcade machines. The people who make the video games know that the person who buys the arcade machines can make money by having you play the video game, and so there is sort of a sort of economic money structure of like why video games have levels, and then also just like chapters in a book, it allows a video game to tell a story broken up into pieces. If you play a Mario game, the first level might be in a desert area, the second level might be in a water area, and so it allows the people who make these games, like, hey, this is going to be the level that does this, this is going to be the level that does that, allows you to break that up into different teams that focus on that, allows the games to change course and change direction and try new things, and if you really like, hey, I like this desert level, I'll just stay in the desert level, and I'm looking for something different today. Well, I'll go to the water level, and so it allows games to be broken up into chapters like a book or acts in a play, and it also allows the people who make the games to break it up into different chunks that allow them to work on it in different sets of teams as they build it.

Jane 10:03

So while video game levels started in part as a way for companies to make money in an arcade type setting, they also acted like a sandbox for developers to test new ideas. Whoever invented the video game must be really cashing in on all of this.

Felix 10:20

Hi, my name is Felix. I'm nine years old, and I'm from Winnipeg, Manitoba, Canada. And my question is, Who invented video games?

Cowen 10:27

My name is Cohen. I am nine years old. I live in Minnesota. And my question is, who invented the first video game?

Harrison 10:38

Hello, and my name is Harrison, and I'm six years old, and I'd like to know who invented video games, and who got the idea, and how, when, and why did they do it.

Floyd 10:52

My name is Floyd, and I'm seven years old, and I'm from San Jose, California. I want to know how video games got invented.

Patrick 11:01

There is not one single person who invented video games. In fact, there is not even really agreement on what the first video game was.

Jane 11:12

Oh, that's Auggie's question.

Auggie 11:14

I'm from Lake Oswego, Oregon. I'm seven and a half years old in my question is, what was the oldest video game?

Patrick 11:28

Video games were, you know, tied to some of the earliest computer technology, and so then it becomes a question of what, what is a video game? When did we define that this is a video game, there are examples of a video game called Tennis for Two, which was used as a demonstration of, if you can think of table tennis with like two little paddles, like ping pong, that was showing off an early computer technology. Well, nobody could buy that, that was a public demonstration, you had to go somewhere to watch someone show you, look what this computer can do. The tennis for two is in 1958 which goes to show how long video games have been around. And tennis for two, you know, becomes this early demonstration of computer technology, but you couldn't buy it, you couldn't take it home. There was no arcade to go to. It was something you could see demonstrated in public. It wasn't until we get games like Pong, which is just another form of table tennis. Lots of early video games were grasping at what can we display on these computers that is simple, but that people will also understand, and the idea of two lines hitting a ball back and forth became one of the earliest and most common examples of what a video game could be, and then all video games kind of come forth from that, which is, well, if we could do that, what else could we put on the screen.

Henry 12:52

Hi, I'm Henry, I'm eight years old, I live in Tenterfield, Australia, and my question is, Why do people create game controls, and why are they expensive?

Patrick 13:05

Video games have always been expensive. Video games have video games exist because they originally were examples of new computer technology, and so video games have always been at the forefront of demonstrating, wow, look at this new piece of technology. Look, how amazing the graphics are. Look, how realistic it looks. Video games started out not with reflecting a version of real life, like a lot of video games do these days, but like tiny little abstractions, like little pixels, in which you have to squint, and like, I guess that looks like an asteroid, I guess that looks like a person, and I think you'll notice, like, if you go to a museum and have old computers, computers used to fill a warehouse, they used to fill a building, they used to fill a room, and over time, like, let's say you had, if you have a watch, a computer watch on your wrist that, like, lets you call your mom and dad, that's a tiny little computer. Computers have gotten smaller and smaller, and more and more powerful. And what people discovered was, oh, the giant arcade machines - we can shrink those down, and we can put that in people's homes, where they don't have to go to the arcade, they don't have to use an arcade machine. The arcade machine can just be at home. It can be on my Nintendo machine, it can be on my Apple TV, and so rather than having to go to a movie theater to watch a movie, instead of having to go to an arcade to play a video game, suddenly you could play a version of that arcade machine of that video game at the arcade, and then maybe a year later you could play it at home, just like you might watch a movie at the movie theater, and then, oops, it's on streaming, or my parents can rent it at home a couple of months later, and that's that's how video games eventually came in to everybody's homes. As for why they're expensive, it's because phones are expensive, tablets are expensive. These use really fancy pieces of technology, and as a result, they end up costing quite a bit of money.

Jane 15:07

Coming up, what do we do when we just want to keep playing and playing and playing and never stop?

Jane 15:14

This is But Why. I'm Jane Lindholm. Today we're talking about video games with Patrick Klepek, who writes about video games and kids and parenting. We've been talking about the games themselves, but what about how we feel about video games?

Araya 15:30

Hello, my name is Araya, and I live in Oakville, Ontario. I am nine years old, and my question is, why do I like playing video games so much?

Zane 15:42

My name is Zane. I'm from Green Hill, Kansas. My age is eight. And my question is, why are video games fun?

Patrick 15:52

Video games are fun in the same way that is fun to play baseball or basketball, or what do you enjoy doing the thing about video games today. Video games, you know, when we're talking about tennis for two, or like ancient video games, there weren't a lot of options. There weren't a lot of different styles of video games. Lots of video games start out as trying to capture something in the real world, you know, like it's fun to kick a ball, it's fun to like swing my leg and like watch that ball go forward, okay. But it's night time, I don't have a ball, like it. What if we just did that in a video game? And a video game

doesn't, it doesn't need to be daytime out. I can invent people to be here. Why are we here? Actually, that ball can be a fireball, and all of a sudden, video games allow you to express yourself and to let an imagination run wild. You are not constrained by well, recess is only half an hour, it can be as long as you want, or at least as long as your parents will let you continue playing the video game.

Abe 16:56

My name is Abe. I live in Charlottesville, Virginia. And my question is, why are video games addictive?

Casey 17:02

Hi, my name is Casey, and I'm four years old, and I live in New Wilmington, North Carolina. My question is, why does games turn your brain to mush?

Isaac 17:20

I'm Isaac. I'm seven years old. I'm from Lakewood, Colorado. My question is, why are video games addictive?

Adrian 17:28

My name is Adrian. I am 10 years old, and I live in Happy Valley, Oregon. My question is, why are video games so addictive?

Taj 17:39

Hi, my name is Taj. I live in Utah. My age is seven. My question is why are video games addicted?

Adult 17:51

Addictive.

Taj 17:52

Addictive.

Patrick 17:54

Well, it turns out like anything else, it is best experienced in what one might call moderation. If you, for example, love soda, and someone told you you can drink soda all day. I think at some point your stomach might feel upset. And video games work in the same way, they're fun, they're interesting, they make us feel things, but just like the endless supply of soda, at some point you have to do something else, and video games are just like anything else in your life that makes you happy. Eventually, you have to find variety in your life to do other things, to be around other people, and video games eventually hit that point as well. When you play a game like Fortnite, it's exhilarating and exciting. You can achieve victory. It's competition. Other video games allow you to explore stories and emotions. Other video games, sometimes called cozy games, are really just about building things, like I want to stack blocks, Minecraft, in which, like, I just want to build a world. It's not the video games turn our brains too mush. It's more that we need to experience them like everything in life in moderation. We're like a little bit of a video game here, a little bit of watching a movie here, a little bit of reading a book there. Video games are really no different than anything else we enjoy in life. It's mostly that we can only do it for so long before our body, our brains desire something else. Our brains want to be

stimulated, and as many video games as there are, as many different types of video games as they are, as many different worlds you can go to in a video game, a healthy, balanced life is one in which video games are a part of it, and it's up to us, our parents, the other people in our life to help us understand, like, hey, I know we're having a good time, but I think we need to balance that out with other things.

Jane 19:50

And Patrick, in some cases, I mean, you mentioned that a lot of video game developers develop a game because they have a story they want to tell, or they find this immersive world that's so cool. And they want other people to be able to experience it, but there are also really big companies behind these games, and, and they know how our brains work, and they know how to make games that make you want to play more, because that's good for them, and so we, we have to think a little bit sometimes too, that these game developers are often putting things into the games to make us want to keep playing, and not stop, and so we have to be aware of that, because we're not going to want to stop, and they don't want us to stop, but they know the psychology, they know how to make people want to keep playing, so there there are times where it's not just a fun thing that people want you to be able to share, but there there are businesses that are trying to get you to play more.

Patrick 20:42

Yes, video games don't exist unless there is someone to make money off of the video game that you are playing. And a lot these days, the video games don't actually cost you anything, you know. Roblox does not cost anything to download, but if you play a Roblox game, I'm sure you've encountered, if you've been given permission to play Roblox, immediately you will see a pop-up that says, "Hey, would you like a checkpoint for 100 Robux about \$1? Like, "Hey, would you like this cool costume for a couple of dollars? And so that is how, even though the game itself doesn't cost any money, there is, the people who make these games the one who entice you? The phrase often used is FOMO, fear of missing out, which is like you see another player, maybe it's a friend, maybe it's a stranger, ah, they've got that cool like blue shirt on, like I want that cool blue shirt. Well, you can just walk around the corner and if your parents say yes or you have the Robux in your account, well, you can buy that blue shirt too. And so you have to remember when you play these things, sometimes people make a video game and they just release it into the world because it's something they wanted to make and express themselves. More often than not, it is a combination of someone wanting to express themselves and other people wanting to make money, and there's a tension between those two things, you know. In the same way that you have to buy a ticket when you go to the movie theater, that movie can't exist unless someone can make money on it. And so it then it becomes important for ourselves to understand why these things exist. Why are they asking money from me, and also the people in our lives, like our parents, to help us, like, understand, like, "Hey, I think you've had enough. I don't think we need to spend the money on this, and that is just like in real life, it's learning to understand how we spend our time, how we spend our money, and how sometimes these games, much like in real life, might be asking more of us than we actually have access to, and we have to learn our own limits, and what do we really want versus what does this thing think we want.

Jane 22:49

Patrick, if kids want to get involved in video game development, do you have any advice for them?

Patrick 22:55

Yes, first think about what are you good at, what do you like, what are you interested in? Because, like, anything else, you can become good at something if you spend the time and the effort, and maybe I really want to learn how to help the character, like, walk on the screen, like, I want to, like, be the person that, like, makes the guts of the video game work. There are so many tools these days that make it so they can turn what's called a video game programming language. It's all the ones and zeros behind the scenes that make a video game function. You can just like write sentences like this is what I want to happen, and you can drag and drop these sentences, and then the program does the work to make that appear on screen, so that you can start from one one part of this, which is like I have an idea, and then the program is going to let you figure out, hey, you take this idea, you write it into words, and then it appears on screen, and if you're still interested, well, hey, hey, hey, come behind the scenes, like these are what these words are doing, and you can go layer by layer by layer to understand how video games are made.

Jane 24:09

Patrick says these days there are a lot of free things you can do to start exploring how video games are made.

Patrick 24:14

You can start as easy as going on YouTube and looking up video game tutorials. Oftentimes, in those tutorial videos, they will link in the description. Here, here's how these video games are made. Here's where you can get these tools, and these are things you can get on your tablets, on your computers. They will run on very simple computers. You don't need a flashy, high-end gaming PC with all the colored lights and big fans. These are things you can do on your phone, on your tablet, on your computer, that you get at school. You can start learning how to make video games, and if you don't have access to any of that, one simple trick that a lot of video game developers do is they look at a video game and then try and break it down on pen and paper. You just get a piece of paper out, and you think about what is happening in the video game. If I had to explain to someone how this game works, how would I write that down? And just breaking it down sentence by sentence will help you better understand what the video game is, what it's doing, how you're interacting with it, and that's how a video game starts.

Jane 25:20

A little understanding can go a long way in how we play and think about our favorite games, and maybe Patrick's encouragement will help set you on a path to start making your own games. Thanks to Patrick Klepek for sharing his expertise with us this episode. If you want to read what he writes about video games, you and your adults can check out Crossplay online at Crossplay.news. That's it for this episode. As always, if you have a question about anything, have an adult record you asking it on a smartphone. You can use an app like Voice Memos, then have your adult email the file to questions@ButWhyKids.org. But Why is produced by Sarah Baik, Melody Bodette, and me, Jane Lindholm, at Vermont Public and distributed by PRX. Our video producer and today's episode producer is Joey Palumbo, and our theme music is by Luke Reynolds. If you like our show, please think about having your adults help you give us a thumbs up or write a review on whatever platform you use to

listen to us, it helps other kids and families find us, and helps us keep doing this work. We'll be back in two weeks with an all new episode. Until then, stay curious.