Getting Curious with Jonathan Van Ness & Eliot Schrefer

JVN [00:00:00] Welcome to Getting Curious. I'm Jonathan Van Ness and every week I sit down for a gorgeous conversation with a brilliant expert to learn all about something that makes me curious. On today's episode, I'm joined by Eliot Schrefer, where I ask him: How LGBTQIA+ is the animal kingdom? Welcome to Getting Curious. This is Jonathan Van Ness. On today's episode we are discussing two of my very favorite topics together: gay stuff and animals. On that note, welcome to the show, Eliot Schrefer, who is the New York Times bestselling author and a two-time finalist for the National Book Award in Young People's Literature. His new book *Queer Ducks and Other Animals The Natural World of Animal Sexuality* is everything, and we're here to talk about it. So, first of all, welcome, Eliot. How are you?

ELIOT SCHREFER [00:00:51] I am great. Thank you for having me on the show. I just have to say, you're the most active listener I've ever encountered, so I just feel so grateful that we get to spend time having you listen so actively to queer animal behavior.

JVN [00:01:02] Oh, my God. That's, like, the nicest thing anyone's ever said to me. Thank you. So here's the thing: I remember when I was, like, maybe six or seven, seeing Bowflex commercials and being like, "I am shivered," in so many words, you know, like, that, that oiled up male model. Honey, I was like, "Who are you?" Then I was, like, you know, wanting to, like, run up to the other boys on the playground and push them down, but, like, braid all the other girls' hair and, like, be their best friend. Then I feel like, you know, not very much later on, I started hearing about, like, "gay" and that that's like, not a good thing, that you don't want to be. And I was, like, "Oh, my God." And then one of the first things that people say when you're young is, like, "Well, gay stuff couldn't be real or actual because it doesn't occur in nature. Like, all the animals in nature are all straight." And that's this, like, widely accepted thing up in this country. But actually your scholarship works directly in the face of that and actually says, "Honey, no, that's not true." So let me start from the very beginning in Eurochristicentric standards. You know, the beginning, Noah's Ark. There had to be some gay stuff going on on that ark.

ELIOT SCHREFER [00:02:08] I would say so. First of all, I am wondering how many Bowflexes are currently in garages gathering dust right now. Like, that was a moment. That was a mid-nineties moment, the Bowflex. For me, it was the Fruit of the Loom ads in my brother's Rolling Stone. I skipped the article and I just paused on all these, like, male models wearing terrible underwear. Gripping. [CROSSTALK] And I had to pick which one was going to be my friend. But friend was a very complicated feeling that I was having around that. But I know in middle school it was, you know, the mantra was, "It's Adam and Eve, not Adam and Steve," right?

JVN [00:02:38] Yes!

ELIOT SCHREFER [00:02:39] And because it rhymed, it was true. Like, that was sixth grade logic. Like it was, definitely had to be true. And so I internalized that, too. And so when I came, came across this whole subfield that's within science that's just cropped up, this explosion of research in the last 20 years into same-sex sexual behavior in animals. I was really excited, just as a scholar by it, but also wished I could go back in time to the Bowflex era and tell middle school Eliot, you know, that, that "You *are* natural." Like, really, it's such a subversive and prevalent concept that only hetero sex is "natural." And, you know, the Noah's Ark example is, like, the very beginning of it. And I wasn't there at Noah's Ark, but I do think there were definitely queer animals on that ark. The question is whether they were in the closet or not because they had to get on, you only have one male and one female and although, you know, there's like little children's Bibles with Noah's Ark pictures where, like, the female elephants wearing a bow in her head. So it's very clear that she's a girl elephant. And then she's with the boy elephant who just looks like a normal elephant. And they're so, like, intent on the male-femaleness. It's sort of like when I went to prom and I was, like, "Look, me, a boy taking this girl to prom." So I think it's got a whole queer feeling. All those pictures of Noah's Ark in all those Bible pictures that are up on people's walls.

JVN [00:04:00] What I hear you saying is, like, when we see a lot of animations from Noah's Ark, there's, like, this very clear assumption that, like, you know, there's, like, the girl elephant and then there's, like, a boy elephant and that runs through, like, the entire animal kingdom. Because all the animal kingdom got on Noah's Ark. I'm really, like, confronting my, like, anti-Bible feelings in this segment. It's LOL. Sorry, Mom! But anyway, and in the same way that we can assume in the fifties, sixties, when everyone was, like, "I am man, I'm taking this woman to the red carpet," or whatever, because queer people air quote "didn't exist," you know, in, like, the 40s, 50s, 60s. There were queer people living then, they just weren't shown. So that if you were going to take, like, every single animal the entire animal kingdom and just put a bow on the girls and, like, a suit on the boys, like, obviously some of them are going to be queer just from, like, a sheer mathematics game. Like, is that what I hear you saying?

ELIOT SCHREFER [00:04:48] Yeah. And it's even more complicated. Homo sapiens are a rare animal in that we are sexually dimorphic, that males and females look different, especially when we're naked. Like, it's pretty quick. Unless someone is intersex, you know, that we have these two sexual categories, putting gender to one side, just, like, the physical body that we have. But most animals are not dimorphic. They are sexually monomorphic, which means that males and females look identical. So, for example, like a penguin, like, do you know what a male penguin and a female penguin look like? Like, they look exactly the same. They don't have penises. They don't have vaginas.

JVN [00:05:24] The girls aren't any littler?

ELIOT SCHREFER [00:05:27] No, no, they are, like, the exact same size.

JVN [00:05:30] And sometimes the girls are way bigger. Not in penguins but, like, other animals, like, especially in insects, like, praying mantis, like, big girl, like, littler boy.

ELIOT SCHREFER [00:05:37] Yeah. Which is why it's so easy to eat the boys if you're a praying mantis or an arachnid.

JVN [00:05:41] I want to come back as a female praying mantis who has a life expectancy of, like, 125 in my next life.

ELIOT SCHREFER [00:05:47] We might be jumping ahead in our conversation, but if we do talk about group sex in the animal world…

JVN [00:05:51] I wanna hear about all the orgies, I wanna hear about all the orgies, the gang bangs, the spit roast, all of it, like, lay it on me. Fuck it, let's just go there now, you know, we're here, we're talking about it, like, you know, we're just two queer people. We can't help it that, like, gang beings jump to the front of the line. It happens sometimes. What other animals engage in group sex? Because I also know because, because dragonfly girls, they might not, like, do it at one time, but they can store, like, ten different spermies, because we learned from Dr. Jessica Ware.

ELIOT SCHREFER [00:06:15] I learned from that episode about the pronged, double penis. That was an amazing episode. I am a huge fan of her work now. The female wolf spiders, they will eat males after they have sex with the males, just like a female praying mantis will. But the female wolf spider has actually developed an exoskeleton that has two divots in it. So the males are much smaller. One can sit on and start having sex with her. A second male can come and also mate with her at the same time. So it's not just group sex, it's like her body is built for group sex, and the male wolf spiders are combating to get in the position of being the second male on, because while she's busy trying to eat the first male, the second male can hightail it out of there.

JVN [00:07:02] So the first male with the wolf spiders, like, he's so horny, he's not even thinking that he's, like, going to get killed afterwards.

ELIOT SCHREFER [00:07:07] Yeah. Like, if you're a wolf spider, just don't lead with your little wolf spider penis. It's dangerous.

JVN [00:07:11] Have we ever observed a wolf spider mom-to-be or whatever who, like, is, like, "Aw, I don't want to eat the first one!" Or do we see, like, 100% of the time always eat the first boy or does he ever live?

ELIOT SCHREFER [00:07:24] I think she would eat both, if she could. It's just the second one, you know, has a reflex that's like, "I see this other guy's getting eaten. I've done my thing. I'm getting out of here."

JVN [00:07:34] Do we ever see her eat both?

ELIOT SCHREFER [00:07:37] I've never seen her eat both.

JVN [00:07:39] Honey, we got to do an episode of wolf spiders now, okay?

ELIOT SCHREFER [00:07:41] They're small. They're, like, snack-sized compared to the female wolf spider, so.

JVN [00:07:45] Who else has group sex? Because what about the, what about the snake balls?

ELIOT SCHREFER [00:07:48] So the snake balls are one of my favorite examples, and it's actually kind of endearing. I feel like when I tell this story, people are either split. You either find a ball of mating snakes kind of sweet and cool, or you find a thing of horror that it's a deep nightmare.

JVN [00:08:02] That's me, yeah. Second.

ELIOT SCHREFER [00:08:04] I understand. I honor that.

JVN [00:08:06] Yeah, I don’t love ‘nakes. Actually my first full sentence and life was "I don't like 'nakes." Which was, I meant snakes.

ELIOT SCHREFER [00:08:14] Were you around a snake at the time?

JVN [00:08:15] My brothers would, like, put plastic snakes with, like, jelly on them, like, around my crib, like, just, they were, like, torturous fucks, my brothers. Anyway, I digress.

ELIOT SCHREFER [00:08:26] So snakes are cold-blooded, ectothermic, which means that they can't generate their own heat. So if it gets really cold out, snakes are a bit in trouble, right? They can't move quickly. They can't find prey. And if it gets really cold, then they die. So snakes release a pheromone, which is just a chemical, to signal to other snakes that they're ready to mate. And females release a pheromone. And once the male garter snakes in the area smell that, they'll come and they will start to mate with her. And as many males as can will try to get in. So you have this, like, writhing mass of snakes. If they get to a dangerously low level, some male garter snakes will release the female mating pheromone, and so other male garter snakes will come and try to mate because they believe that they're mating with a female because it's a sexually monomorphic species. So these all-male mating balls occur and they're all writhing, trying to mate. Of course, there aren’t going to be any baby snakes made that day because it's all males, but they all warm up. Whoever released that sort of gay bat signal of, "Come on, guys, I'm cold, I want to have sex." It's sort of, like, you know, like, in winter, like, especially in your twenties, like, people will get, like a winter boyfriend or a winter

girlfriend just because it's cold out and you needed someone to watch Netflix with, it's sort of like that.

JVN [00:09:45] It's so cute! That's the cutest thing of all time. Ah! So that's, also, the penguins. What's up with them? So they're all the—, because there is gay penguins, right?

ELIOT SCHREFER [00:09:56] Yeah. And when penguins are, like, our most famous example recently, there is the recent picture book Tango Makes Three that was written 15 years ago about two male penguins that raised a chick. And I don't know if you saw this last year, but it sounded like it was out of TMZ. But it was a gay penguin pair at a Dutch zoo stole an egg from a lesbian couple, and it was high, like, queer scandal when that happened. But penguins have been screwing up biologists for years because of the sexually monomorphic quality that they have, that the males and females look the same. So the earliest zoo population of penguins was in the Edinburgh Zoo, and they came in 1913 and basically explorers just kidnapped some penguins from the Antarctic and whoever survived the journey just now was in Edinburgh, living in the exhibit. And so they observed their behaviors and decided who was male and he was female based on how they acted.

So if two of them were a couple, they were, like, "Okay, one of them is male, one of them is female." If one of them is more aggressive, like, "Oh, it's probably a male penguin." If one of them was, you know, brooding, which means just, you know, taking a rock and sitting on it as if it's an egg. They're, like, "Oh, that's probably, that must be a female." So they assign them all these kind of precious 1913 Scottish names, you know, like, Abigail and Bertrand and Charles and, and so then they open the exhibit to the public. Everyone loved it. Everyone was traveling around to see these penguins. They even knighted one of the penguins a few years later. His name is Sir Nils Olav. So he can't, like, hold a sword. But he was a knight. So, and then they kept visiting, and then they realized, like, the couples keep changing. So they thought it was a pair here. Then that penguin was off with another penguin as a pair, and they were, like, basically spreadsheet-ing it because they realized, based on the couples, they were running out of configurations where it was all male-female couples. So about, you know, a few years later, it's probably in the late 19 teens then to announce that they had gotten it wrong. They'd gotten, of these five penguins, they'd gotten four out of the five sexes wrong.

JVN [00:11:59] They guessed wrong four out of the five times?

ELIOT SCHREFER [00:12:01] Yeah. And that's just the, the, the gender identities of these penguins. So there was one called Dora that would stay Dora. Everyone else had to change names. So Adam became Abigail, Bertrand became Bertha, and Charles became Catherine. But then they all switched again in their couplings. And so at this point, they realize that all five of these penguins were bisexual, which, you know, it's a big deal now. It was a really big deal in the 19 teens in Edinburgh. So it really changed the way that they were looking at these penguins. And penguins have been doing this for a long time. There was an explorer in 1911

who observed them in the wild and said that he observed “depraved behavior” in the penguins.

JVN [00:12:43] And where were those penguins?

ELIOT SCHREFER [00:12:44] Those were in Antarctica.

JVN [00:12:47] Oh, okay. And who was that scientist that said that?

ELIOT SCHREFER [00:12:51] Murray Levick was his name.

JVN [00:12:53] What a fuck. Which leads me perfectly to my next question. Murray Levick. So in our episode about female husbands with Jen Manion we learned that, like, homosexuality wasn't really like pathologized or like, you know, referred to as, like, “depraved” or “outside the norm” or whatever until around, like, 1900. Before that, it was kind of, like, this, like, outlier phenomenon that was like a little bit underground. And then 1900, it's like, “No, it's a thing.” So by 1911, Murray Levick was saying, like, “Okay, I'm seeing, like, ‘depraved stuff’” in penguins. How else did scientists cover queer things in the animal kingdom?

ELIOT SCHREFER [00:13:24] Yeah. Well, so the coda on the penguins was they finally did a study in 2010 of wild-born penguins in Denmark to go and looked at who was courting whom. And they found that 28% of the courting rituals were between same sex. So it was actually a really significant percentage. And previously people have been able to argue that, you know, maybe in the zoo they just get confused, like, there's only five penguins around. So it's sort of, like, it's, like, the prison sex theory, right? That like, “Well, there's there's so few around that we're they're all going to eventually have sex.”

JVN [00:13:46] Which I don't believe in that, because even if I was in prison for, like, 50 years and I was in an all female prison, I still wouldn't want to fuck a girl.

ELIOT SCHREFER [00:14:02] There's all sorts of problems with that, that theory. Yeah. But this, this study, they, they took blood tests, which is the only way to really find out if a penguin is male or female. And they discovered that, you know, significant wild-born, no human interference. Those penguins were having sex. So there's a long history of: because males and females look similar, if we go in with the Noah's Ark internalized view of how animals have sex, then, you know, every time you see, like, two pigeons, one mounting the other, you just put a check mentally in the male-female column. But pigeons are also monomorphic, so it very well could be two males or two females. In 1830s there was a German scientist named August Kelch who saw cockchafers mating in the wild. And to me, like, once you name a bug, a cockchafer, like, it's already, like, of course the males are going to be having sex.

JVN [00:14:53] What's a cockchafer? I had to ask.

ELIOT SCHREFER [00:14:55] Cockchafer, it's also known as a doodlebug.

JVN [00:14:57] Oh, it's just a bug.

ELIOT SCHREFER [00:14:58] Yeah, I actually have his art in the book. Maybe you can describe it for the podcast.

JVN [00:15:03] Oh! Oh, it's really great, you guys. So basically, it's, like, when a top, it's okay, okay, okay. It's really hard to explain, actually. Okay so the bottom is, like, on the bottom with their legs up, but then the top is facing the completely other way and their genitals are aligned, but their heads are facing opposite ways. So it's kind of giving you, like, reverse cowgirl 69.

ELIOT SCHREFER [00:15:26] I wish I could rewrite my book and put that in *Queer Ducks*. I assume they worked their way up to that position because it's intense. Like, it is crazy.

JVN [00:15:34] Yeah, you got to, like, lift up your whatever, we got to include that. We gotta, like, get that page for socials because we got to yeah, it's really good. So 1830s, he sees the two boys getting down?

ELIOT SCHREFER [00:15:45] Yes. And he is shocked. He doesn't understand what he's seeing, like, "Is this two males?" And he brings it around to all his entomologist colleagues. The scientists who study insects and they all confirmed that it was two males. And then they started looking for a cockchafer homosexual sex in the wild. And they found more and more and more of it. And this is really the first published scientific account, again, in the 1830s. And the debate continued raging in the 1840s, 50s, 60s. Scientists outside of Germany, so now France and Russia were getting involved, writing articles about this same-sex sexual behavior in cockchafer beetles. And it was interesting to see all the different theories that came up around it. So the first one that that August Kelch, the first scientist came up with was that "It must be rape," right. That this, the, the insertor of these two beetles just had such a sexual urge that he overcame a male that was smaller and had sex with it. And then the scientist began studying like, "Is that the case? Is this basically cockchafer rape," and it was not, it's often the smaller one was the inserter. And, by the way, it's actually more dangerous for your little tiny insect penis to be the top in in in beetle sex because you imagine, like, you're actually inserting it into these barbed plates of of chitin this, this, you know, the exoskeleton. And it's a really, it's a really dangerous thing to do.

JVN [00:17:14] So that cockchafer bussy is, like, not nice. It's, like, just real dry and, like, shields and stuff. Like, it's not nice for your little peen, honey. So why do they do it, did they fall in love with each other?

ELIOT SCHREFER [00:17:25] So yeah. So it turns out that they will do it more often if the cost of missing a mating opportunity is higher. So in other words, if, if you don't come across a lot

of cockchafers in your day, better have sex with anyone you meet just in case, you know, you could get your offspring as a sort of working entomologist theory around it.

JVN [00:17:46] Oh, I was– I wanted there to be more love. Like more, like, "You're just the one for me."

ELIOT SCHREFER [00:17:50] Well, in insects, it's hard because we don't really have access to, like, the way that their minds work. So it is entirely possible, this is just the accepted, like, the 19th century accepted conclusion about it.

JVN [00:18:01] Those scientists that were, like, debating it, was there any other, like, cool queer animals of the 1800s, or was it just, like, kind of underreported?

ELIOT SCHREFER [00:18:08] It was underreported. Yeah. So it's it's partly, you know, scientists who were homophobic didn't want to see this, right. So they would, they would willfully try to get past it. There was a sheep researcher in the 1960s named Valerius Geist, who is the expert on bighorn sheep. And when he was studying his wild sheep in the, in the plains, he saw that they were basically living in one male society, one female society. And males and females would occasionally come together to mate. But within the male society, in the female society, there were massive amounts of same sex sexual behavior. So he discovered that basically from the age of, you know, birth until eight or nine, that sheep live in homosexual societies and have tons of sex. But he resisted publishing on it. He didn't publish on those findings because he said, in his words, "He couldn't conceive of these magnificent beasts as queers." And this is very much, like, the way we talked about queerness in the 60s.

JVN [00:19:04] Where did he write that or, like, who did he say it to? Like, how do we know?

ELIOT SCHREFER [00:19:08] Yeah, he wrote a memoir. And so in the memoir he recounts his thinking back then. Later, he did publish on it, and it was really important information. And now we know that bovids—sheep and and cows—have massive amounts of same-sex sexual behavior. That is very, very frequent.

JVN [00:19:23] Good for them. And then, like, did anyone else, underreport from that time. Like, do we have any other instances like, like that 1960s man?

ELIOT SCHREFER [00:19:32] Well, so we have there's Linda Wolff, who was a primatologist, and she wrote about Japanese macaque monkeys, and she discovered a lot of female female sex in the macaques. And she published on it in in the seventies and talks about her time after that publication that people would come up to her and say, like, "Why do you have this kinky interest in lesbian monkeys?" Like, "Why would you report on this even if you did see it?" And it's just, you know, we think that we come to science with a blank slate and an open mind when science really reflects the culture that is producing it. So she learned very quickly, especially as a graduate student, not to publish on that. And if you imagine the academy,

biologists, when they, when they enter graduate school, they choose a species. So you become a gecko expert. You go to field sites and study geckos you publish on them. Your mentor is also a gecko expert, probably. And then you get your first teaching job and your tenure track position by publishing on geckos.

Say the existing amount of research is 600 pages of articles on geckos, and none of it mentions same-sex sexual behavior in geckos. You, as a 22-year-old scholar, could publish on this thing that you saw. You saw, you know, male and male geckos having sex, female-female sex. But if you publish on it, you're contradicting your professor. The article has to go to peer review from other scholars who also didn't publish on this. So you get this momentum of erasure for queer behavior in animals, which has been really hard to countervail. And it's, I think it's really telling. There's two really big nonfiction books on same-sex sexual behavior and animals that came out in the last 20 years. And in both of those cases, the editors, in order to find the articles to fill out their book, just approached existing field sites and said, "You've been studying bottlenose dolphins for years. Do you have data on same-sex sexual behavior in these animals that you haven't published?" And the answer was overwhelmingly "Yes," that, "We haven't put it out there because we're worried about reputation. It's just not the kind of research that people are publishing." And so they found out that it was, it all existed. And that's how they brought it all together.

JVN [00:21:45] Wow. It's, like, this fear, this, like, malignant fear of truth and, like, and moralizing truth, you know, it's, like, just, like, my therapist always said, tell the truth and tell it faster. And it's like, how much, like, carnage do we make from, like, sitting and trying to, like, make the truth fit the narrative that we want it to fit? And I just think that's, you know, an interesting thing. So in Queer Ducks, you make the distinction of equating animals with humans and treating animals with, quote, "equal consideration." Why do you think people get hung up on being equated to animals in the first place?

ELIOT SCHREFER [00:22:24] Yeah, there's a double answer to that. Going back to that Noah's Ark example, in Genesis, humans were created on a totally separate day, right? We are the creatures with souls. We have this essentially different nature. And then all other animals are in their own category. Even after Darwin published on his theory of natural selection in the, in the 19th century, that should have shown, like, he said, "Humans are different from other animals, not by kind but by degree," meaning that we are within a continuum within the animal world. And that should have been the death nail for this human exceptionalism, this idea that humans are the extraordinary things and magical God, given God's image, things and animals are all separate. But it didn't. I mean, when things are that embedded in culture, they don't go away very quickly.

And the way it works in the natural sciences is, you know, there's this anthropomorphism accusation that gets thrown at scientists all the time that if you assign an emotion to an animal that you are doing bad science, that you are saying that it has feelings when animals don't have feelings or we can't know, therefore we can't write about it, we can't consider it. And

there's a Nobel Prize-winning ornithologist, Konrad Lorenz, who wrote about greylag geese, who are pretty awesome because they are polyamory. So we can talk about that later. But he wrote about them and said, you know, it shocked him that he can see a goose who's lost its partner. Its wings are drooping, its musculature has gone limp. It has no energy to forage. It just hangs about the nest. But he's forbidden, within his publishing, to say it's in grief, because grief—grief is for humans. Animals can have, you know, a repressed system as a reaction to a death. But only humans get access to grief, and we have all sorts of feelings that we consider are sacred to humans. So it allows us to do whatever we want to animals, right?

So if we are the ones who really can suffer and can really feel, you know, Descartes, the famous "I think, therefore I am" philosopher, used to vivisect dogs, like, he would have, he would have a live dog and he would cut it open in front of other scholars to look at its beating heart. And then they would say "The dog isn't feeling pain. Only humans can feel pain. This is– the dog is pretending to feel pain in order to get us to, to help it. It is just an automatic response." And so we don't vivisect dogs anymore. But we do have 10 billion animals a year in these industrial farms that are living and dying in these spaces that we know nothing about. In fact, there are laws, ag gag laws, preventing us from even having seen video of what goes on in there. So this mass horror that underpins our society, which is enabled by this feeling that, "They're animals so I mean, sure, they, *maybe* they have some, like, vague sensations of feelings, but they don't really" is all about this human exceptionalism that we inherited from our, you know, Jewish and Christian worldviews."

So in one piece, I absolutely think, you know, we have a moral duty to consider animals with far more mercy than we currently do. We are internalizing this subliminal idea that we are the only ones who suffer. Therefore, all is permitted around animals, which is doing huge damage and huge amounts of suffering around the world to non-human animals. On the other hand, I made clear in Queer Ducks to make clear my identities. Like, as a white, cisgender guy, the animal comparison isn't alarming to me. I find it a source of joy and comfort. But I do know people who don't have my identities, who are far more marginalized, get compared to animals in pejorative ways and as, as kids got compared to animals and, you know, sort of in–, as a harsh playground taunt. So it's I can see it as a source of joy. But I know for a lot of people, they're working through a ton of other reactions to think, like, you know, if I say, like, "Oh, trans people are just like deer." To me, that feels like a really positive, wonderful thing. But I know that's going to fall differently on different eyes.

JVN [00:26:19] Well, it's interesting, though, because that's, like, because to you as a scientist and in your scholarship, it's like you're seeing that like humans are part of that continuum of, like, animal experience, like, we're all animals, whereas the people who taunt marginalized people in those comparisons to animals, they're still subscribing to the thing of, like, human idealism. And if you don't participate in a cishet, human idealism, "Well, then I'm going to relegate you to, like, this, you know, animal status. Like you're not human, you're subhuman for being marginalized." And what you're saying is, is that, like, "Actually, no, we're all animals and that's all gorgeous and that's all love. And it's, like, this continuum." But then you have

like the Ted Cruzes of the world that are just determined to have, like, chin straps. And then you have like the Kellyanne Conways of the world who are determined to have what they fucking have, like, bad hair color and even darker hearts. Ah! I get it. It's hard. Okay, so I'm obsessed with that. I get it. So we've already gotten into some examples, but can we remind people in case, you know, maybe this is your first episode that you're jumping in on, like, I don't know, your life. Like, maybe this is the first Getting Curious you've ever listened to of our 250 episodes. You know, it's fine! Can you just tell everyone, in case they have not been listening for years, what's the difference between sex versus gender? Briefly?

ELIOT SCHREFER [00:27:31] So sex has a biological definition. It is, you know, something that is externally identified based on your body and gender is the way that you socially present your position. So sometimes they agree, in which case you're cisgender. People identify me as a male, looking at my body. I also identify publicly as a male, but they don't always agree in the case of non-binary or, or trans people. For animals, yeah, the big question is, like, "Do animals have a gender?" And it's still an active question, like, "Do they only have a sex or do they also have a gender?"

JVN [00:28:03] And then what about sexual behavior versus sexual orientation?

ELIOT SCHREFER [00:28:07] Yeah. So sexual behavior is actually much more applicable to animals. So sexual behavior is just, you know, homosexual behavior is having sex with another male or female, which is the only way we characterized homosexuality in humans until the late 19th century. Right. You could have gay sex, but you couldn't "be gay." There was no identity attached to it. So that's actually a pretty modern invention. And orientation is kind of what in our culture seems like *the* way of talking about sexuality, but it's actually kind of just a blip historically. This idea that you have a lasting and permanent identity based on who you're attracted to.

JVN [00:28:43] But I do feel like it's, like, popular still. Like, I see this in a lot of like, you know, masc musk gays, well, men that are like, "I might suck dick and I might let a guy suck my dick, but that doesn't make me gay." Like, I think that's like a really popular thing. Whereas I'm like, "I don't know, girl, I feel like maybe you're a little bit curious, maybe you're, like, a little bit, you know, like, I feel like you're *something*. So let's get to it. Bisexuality, fierce, poly, fierce, like, we love all the different things. What are, like, Bonobo handshakes, what's the deal with that. What's happening with these bonobos?

ELIOT SCHREFER [00:29:16] So I love bonobos. I spent a couple of weeks at a sanctuary for bonobos at an outpost in the Democratic Republic of Congo, just hanging out with them.

JVN [00:29:22] And they have the red butts, right?

ELIOT SCHREFER [00:29:23] Oh, that's a mandrill.

JVN [00:29:24] Oh, get it together, Jonathan! So what are bonobos, again?

ELIOT SCHREFER [00:29:26] They're really pretty; mandrills are beautiful, **b**ut bonobos look just like chimpanzees. They're, like, a little bit more svelty and twinky than chimpanzees, but they have—, they are our closest relatives. They're tied with chimps. They share 98.7% of their DNA with us as humans. So this is incredibly close overlap. And unlike the chimpanzees, they have a very peaceful culture. They are matriarchal, so the females are in charge, and the females keep their positions of power through very, very frequent female-female sex. So they have evolved these really enormous clitorises. They're, like, the size of grapefruit, at their biggest. And then they lay on top of each other and they rub those clitorises together to orgasm.

JVN [00:30:11] Good for them!

ELIOT SCHREFER [00:30:12] I saw it happening. And what was great is at the sanctuary, I was doing a walk around the edge and I came across a group of nuns who were just in a quiet circle watching these two female bonobos have sex in the sanctuary. It was, like, a beautiful, beautiful moment.

JVN [00:30:24] Seriously rubbing clits in front of the nuns, I'm obsessed with that.

ELIOT SCHREFER [00:30:29] It's really loud, like it is. I can imagine that large of a clitoris and you're touching another one, like, it's, it's clearly electric. I don't know what bonobos are thinking, but they're feeling good things in that moment.

JVN [00:30:38] So what's—is that that what the handshake is, then?

ELIOT SCHREFER [00:30:41] So another handshake is the way that– So chimpanzees have this violent culture. They will murder each other and they will really hurt each other. Bonobos have this peaceful culture.

JVN [00:30:50] Why? Why do the chimpanzees get—, just for power?

ELIOT SCHREFER [00:30:53] Well, the current theory is really interesting. It's that. And way back in their history, chimpanzees had less food that they had access to. And so chimpanzee females with their young had to go forage alone in order to get enough food to eat. So the males learned over millions of years they can be aggressive towards any one female, and she wouldn't have support. But the bonobos actually had more food around. And so the females can forage together and these groups of females would always have each other's back. It's sort of like the pink ladies from Grease or something. And so if one of the males went after one of them, he'd have five females coming to the defense of that one or whoever else was around.

JVN [00:31:30] Do we see any chimpanzees, like, evolving? Like, if they've, like, seen the bonobos and they're, like, "Oh, ladies, if we stick together, these fuckers can't fuck with that." It's, like, can they learn that too?

ELIOT SCHREFER [00:31:38] Well, so it's so the bonobos, through their frequent female-female sex. Like, when you have sex with someone, if you've ever done that.

JVN [00:31:46] I'm actually a virgin. So I don't know.

ELIOT SCHREFER [00:31:49] You're coming out today. It releases a hormone called oxytocin.

JVN [00:31:53] I love oxytocin.

ELIOT SCHREFER [00:31:54] And so it bonds you to whoever you're next to. That's why, like, 13 year olds, when they make out for the first time, they're like, "We're going to live together or hang out in the food court all the time. And, like, we are best, you know, lovers for life." And it's this feeling of immense closeness to whoever you just had physical contact with. So the females, there's all this frequent female-female sex to develop this really intense alliance between females, which ultimately keeps everyone safe because you have a group of moms in charge and they don't want their young to get hurt. So they keep the males from acting up and ripples down to the entire society. And so being a male bonobo is awesome too, because you have a more peaceful world and the males will have sex, not as frequently. They call it penis fencing, not in the scientific literature, but scientists informally will call it penis fencing. You know, it's, like, sort of wapping them together. But chimpanzees, we were because we assumed they were aggressive and violent. We were actually blind to same-sex sexual behavior in chimps. But it actually is frequent. And there was a recent article I talked to the scientist in, in *Queer Ducks* for this. There's a recent article on fellatio among male chimpanzees, which does occur with frequency and it occurs often after a conflict. So two males would get in a fight and then in order to repair that bond, they will engage in fellatio.

JVN [00:33:09] Two ways or one way? Like, do they both say sorry or is it that the winner is, like, "Suck my dick" to the loser.

ELIOT SCHREFER [00:33:!6] That, the way you phrased it the second time feels very chimpanzee. So I'm going to, I don't know the answer, but I'm going to vote the second way.

JVN [00:33:23] But just cause I'm, like, worried about the chimps, like, do bonobos and chimps live in the same, like, habitats?

ELIOT SCHREFER [00:33:29] Very similar. Yeah.

JVN [00:33:30] Like, why can't the chimpanzees see what they're doing and be, like, "You guys, we can just–"

ELIOT SCHREFER [00:33:35] Given how chimpanzees treat other stranger chimpanzees that they meet when they go to war and start killing the other ones. Like the bonobos have this, like, really small territory right in the middle of Congo and they're relatively safe within their small groups, like, for the bonobos' sake, I'm kind of hoping we don't have any chimpanzees, you know?

JVN [00:33:54] Oh, because the chimpanzees would just, like, kill the fuck out of the bonobos.

ELIOT SCHREFER [00:33:58] I don't know these, like, sort of soft, sweet, hippie apes. Like, they should keep to themselves for a while, you know?

JVN [00:34:04] Oh, my God. So basically, the chimpanzees, just, like, it's in their heads and they're just, like, a little angry.

ELIOT SCHREFER [00:34:08] So these animals are tied as our closest relatives and they're very close to us, genetically. And one is this violent culture that's male dominated, and one is this amazingly peaceful culture that is structured, *structured* around lesbian sex, around female-female sex between these bonobos. It's not just incidental. It is the *source* of their goodness and their, their health as a society. And what an amazing metaphor when we look at ways forward for us, you know that we have these different ways of being. I would love to live in a female-dominated world, it would be so much better than the male-dominated one we're currently in. If we had access to that sort of way of living as humans, it would be wonderful. And secondarily, our closest relatives engage in very, very frequent same sex-sex, homosexual sex in bonobos is the most frequent kind. And so any of those claims about the essential "unnaturalness" of human sex, so this is an aberration caused by our culture, that "The kids will read the wrong book and become gay. And so let's keep those books out of their hand, and then it just won't happen." Our closest relatives, 98.7% of their DNA, prove that it is inherent and innate in our genetic composition to have this diversity of sexual behavior. There's a recent article in Nature that tabulated, like, how many animals have really good research showing same-sex sexual behavior, it's 1500. So it's across, and this is across invertebrates, vertebrates, bonobos, all the way down to marine snails. So it's, it's, it's a huge amount of animals. So it's not just these, like, occasional outliers.

JVN [00:35:42] Matriarchal society or patriarchal. It doesn't matter, honey. It's, like, everybody's everybody wants to bump uglies with each other, sometimes. What about gay dolphins?

ELIOT SCHREFER [00:35:57] Okay. So bonobos are like the female love structuring in our society. Male dolphins are the opposite. So you have these male sexual alliances that are the structuring element of dolphin societies, bottlenose dolphins. So the only lasting contact between dolphins is between a mother and a calf, which last for a few years. Then once the calf is an adult, they'll part ways. The only long term union is between males, so a male and a

female will come together and mate for a few weeks. Then the female will go her way to raise her calf and the male will go his way. But these males form what was long known for decades as a "male friendship." And it wasn't until recently, until about 2006 that we actually found scientists willing to publish on the dynamics of this male friendship. And it is cemented through sex, like, no one you've ever known has more sex than your average male bottlenose dolphin. So these two males find each other, they bond for life, and they have sex on average, 2.4 times an hour. So just like you're swimming through, you're catching some fish, you pause for a moment to have a really quickie with your, your male bonded partner as a dolphin. And then you go on and find a female. The both of you invite her in. They both mate with the female for a few weeks. She goes her way to raise her calf. And then the males continue on their, their journey through the oceans together.

JVN [00:37:18] And they don't get jelly or anything. Like, they're just, like, a little throuple for those few weeks?

ELIOT SCHREFER [00:37:23] Yeah, well, they're both mating with the female, like they're, they're enjoying it, you know, and they're not, you know, an animal doesn't have to self-identify, doesn't have to be, like, "I thought it was a gay dolphin. And now I'm, I guess I'm a bi dolphin." Like, it's just, "The female's here, we're having a good time."

JVN [00:27:36] Like, of the two and a half times fucking an hour. Are they verse or is there like a bottom and a top?

ELIOT SCHREFER [00:37:41] So it's actually a very complicated question. In dolphins, imagine, this is a creature shaped like a torpedo that has access to, like, all three dimensions in space. Right. So we are, we are stuck on the ground. A dolphin can go up and down and left and right with no problem. They can easily, like, sort of switch positions all the time. So normally scientists will record who's dominant, who's subservient, you know, by who's mounting whom. But with a dolphin, like, they, they move so quickly, like it's really hard to see who's mounting whom. And they have prehensile penises, which means the dolphin penis, like your tongue, can move around with muscles so it can squirm and grip, which is probably because they have these torpedo-like bodies. It'll be really hard to have sex, like, moving through the water with something that is, like, sleek and and narrow like that. And so they have these prehensile penises that can basically, like, grapple with each other. So they are, they're just having sex. It's very hard to say one at the top and one on the bottom because those prehensile penises are doing a lot.

JVN [00:28:44] Because they don't stick their dicks in the other one's butthole, like, their dicks just rub?

ELIOT SCHREFER [00:38:49] They will, they will rub dicks, they will, one will put its beak into the genital slit of the other dolphin. So, like—

JVN [00:38:58] Fellatio? Is that, like, oral?

ELIOT SCHREFER [00:39:00] Yeah. And then they push them and often out of the water. So they were like, like, you know, like when you're in the pool and you, like, push someone and it's kind of fun and splashy, like, they'll push, but it's like a genital pushing that they'll do together. They'll rub with their fins, they'll rub each other's genitals, they'll put their, their penis in the blowhole of another dolphin.

JVN [00:39:20] I was wondering about the blowholes!

ELIOT SCHREFER [00:39:23] Were you?

JVN [00:39:24] Yes!

ELIOT SCHREFER [00:38:25] Yes, they use the blowhole.

JVN [00:39:26] So they will shove their dicks and the other one's blowhole. But what about their dolphin buttholes? Do they ever just do, like, d in the butthole? Like, do they ever do, like, anal dolphin?

ELIOT SCHREFER [00:39:36] I'm really sad I don't have an answer for you on that one.

JVN [00:39:38] I'm going to need to ask your dolphin interviewer your friends about. Like, I just. I am a little curious about, like, anal. Dolphin anal.

ELIOT SCHREFER [00:39:45] Just now I am too.

JVN [00:39:46] Part two, we'll have to have you back. What's, what, and what about albatrosses, do they get super gay?

ELIOT SCHREFER [00:39:55] So albatross is a really interesting example. You said the short answer is yes. The Laysan Albatross, a third of their breeding pairs are female-female and these females. So an albatross is a really giant beautiful bird. They only become sexually reproductive years into their life and at that point they find a mate and they return. They split for most of the year and they come together to raise hatchlings together. And some of them just will choose a female. The females will go through the same courtship dance that a male-female pair would. It's really amazing. They do—, kind of clack their beaks. One of them like puts its beak under their wing and do a sort of a dab move. And it's really, really cute to see. You should look at YouTube videos of this. So they'll do this courtship, they'll bond and the females will raise an egg together. And because it's two females, often they have what's called a "super normal clutch," meaning they have twice as many eggs than a male-female pair would have. So it's actually been argued that, potentially, this surge in female-female parenting within shorebirds—and it also occurs in roseate terns and and gulls—that these

female-female nesting pairs actually produce more offspring for the next generation, you know, so it's harder to get two baby birds to survive than one because to find twice as much food. But if they manage it, these female-female couples of birds actually have an advantage in the next generation. More of their genetic code is going into the next generation of birds, and by natural selection, you could argue that that would therefore cause more and more birds to turn to this, like, you'd basically be birthing more "lesbian" in quotes birds. Not that I think lesbians really where you can use for birds.

JVN [00:41:39] So what about, like, explanations for these traits and behaviors, like, they have, like, because that's saying that, like, actually for them it's like it enhances their chances of survival. But I could also think of, like, the people, you know, like, the Westboro Baptist Church people who come to pride and say, like, "God hates fags and all I could think of that those animals are going to die because of how're they going to have babies if they keep fucking each other." So, like, but in that case, they're actually doing better.

ELIOT SCHREFER [00:42:02] Yeah. So sometimes it's an advantage. There's quite a few cases. So you think about the bonobos. They develop these really intense social alliances through producing oxytocin, through this same-sex sexual behavior. So it's giving them an advantage within the group. And the bottlenose dolphins, the males are cementing their, their important alliance and getting access to the best females through their frequent sex, like, they are *tight*, so to speak. There's other animals where, you know, like the Japanese macaques. Japanese macaques also have a lot of female-female sex. And scientists came up with a lot of theories for why this might be happening. And they tried, they tested all of them in, a scientist named Paul Vasey tested them with a population of macaque monkeys. So some of the theories were that there was a way to get more parental care so that basically mom's joining up and creating a union to having sex in order to raise offspring together. My favorite was the theory that maybe females have sex with each other to turn on males in the area to get other monkeys, male monkeys to sort of, like, watch this and be, like, "Okay, now we're going to have sex."

JVN [00:43:03] The patriarchy never dies!

ELIOT SCHREFER [00:43:05] It's basically, like, the late night Cinemax version of Japanese macaque monkeys.

JVN [00:43:09] But that's giving me, like, the patriarchy. Like, it's, like, "Oh, like, it must be in service of men." Maybe they just want to eat each other's fucking macquace pussy, okay, scientists? Maybe they just fucking like it.

ELIOT SCHREFER [00:43:19] Those are not the words he used. But that's basically the conclusion of this many-year research study that tested out all these theories is that none of these transactional theories for "why" actually helped. Instead, what they concluded was and it was actually kind of, like, shockingly controversial, is that.

JVN [00:43:36] They're lesbians. They just want to do it.

ELIOT SCHREFER [00:43:39] They just want to do it. [JVN CLAPPING] So when you think about it, we evolved sexual genitalia for the purpose of sexual reproduction. Like, that's, I think that's a fair enough assumption. But once an animal has it and an animal has a mind and can make decisions on its own, it's, I think, very, very reasonable to conclude that animals can make their own choices with this genitalia that they might have evolved for male-female procreation. And so these Japanese macaque monkeys are hanging about. They're eating nuts for a while. You're eating some fruit. You have the afternoon off. You could experience incredible pleasure together as two females. They just do it. It's not to get, you know, an extra parent. It's not to turn on males, it's just because they find females-female sex pleasurable.

JVN [00:44:27] So what do scientists think is the split of, like, nature versus nurture here? I will tell you and before you even answer, because I think that maybe I'm a scientist. Because, you know how, like, as a nonbinary, gender non-conforming person, I feel, like, I'm really over binaries and I feel like nature versus nurture is, like, yet another by an area where we're being forced to pick. Like, "it's either the way you're born or it's either the way you were brought up." It could not, like, it couldn't possibly be both. And I feel like maybe sometimes it's both because like as many people as there is in the world, in as many animals as there is in the world, like we're all born in a certain environment with like certain things that are going to like either take care of us or not take care of us or whatever, you know. So there's, like, the way you're born, *plus* there's your environment and like, don't both have to have some sort of implication?

ELIOT SCHREFER [00:45:11] I mean, that's basically exactly what the conclusion is. I did a chapter in *Queer Ducks* on fruit flies because fruit flies are the only animal in which we've actually been able to go in and change the DNA and try to change what sexual behaviors fruit flies we're interested in. And in the nineties, which was already such a really tense time around queer identities, basically it's happening again, like, but that was the last period where we had RuPaul had a talk show and everyone, all these straight guys were confused because they were so attracted to RuPaul. And Dan Quayle was saying homosexuality was a "wrong choice." At the same time, the scientists went in and played billiards with fruit fly DNA and made "gay fruit flies." Or that's the way that they, they described it.

And it is basically what they had done. Fruit flies have sex through genital licking. So they will they get their face up into the backside of a next fruit fly and lick their genitals as a way to initiate sex. And they had a petri, a sample, of all male fruit flies that were basically all doing genital licking together. So it's, like, this long conga line, like, at a wedding of these fruit flies, all male fruit flies, all having this long line of sex. And so they said, "We've actually discovered the gay gene." We made gay fruit flies. And this is on the cover of TIME and Newsweek. It was a big deal in the mid nineties, but very quickly that all fell apart. What they had actually done is they'd just removed the ability for these fruit flies to distinguish males and females, so they just put males in that group. And so all the males were having sex with each other because

they no longer saw male and female as different categories. Those fruit flies would have easily mated with a female if they had access to one. And to me, that was then, that was also a time when people were trying to find really intensely trying to find a gay gene in humans.

And to me it's a really disquieting idea because we only tend to want to find reasons for things that we find strange or anomalous. You know, there's not urgency behind finding "Where's the gene for red hair," but there is the sense of urgency of, “We can pin it down.” And for some queer people, it is this feeling of, like, “See, it's a gene. It's not a choice. Leave me alone. Like this is not you can't claim that I'm doing anything wrong.” I understand that urge among queer people, but it's also something that can be used on the other side, you know? So if there is a gay gene and you spit into a vial and send it to 23andMe because you want to find out if you have Neanderthal DNA on you or whatever, they're also creating a database of everyone's genetic profiles. And so if they found a gay gene, and you can imagine some future presidential administration that was getting political points by persecuting gay people, queer people, then they could just, they would have a database with scientifically proven information saying that, “These are the people who are LGBTQ no matter what they say or how they're living. We know it from their genes, and those are the ones that we can put in jail,” or whatever they wanted to do.

JVN [00:48:12] Or potentially like, do like fucking like try to like. Try to, like, do away with the gay gene and try to, like, you know, make us like make us straight fruit flies or something. But where's the straight gene, honey? Like, you guys probably got some fucked up gene over there, too, that you don't want to, like, eat puss and, suck ds and stuff, you know, whatever. The point is, is that, like, *scary*. Basically what I hear you, like, the risk of attributing too much to genes is that it could like further pathologized queer people and make that gene, like, something to be “corrected” or, like, scared of or, like, seem to be, like, plucked out of a crowd.

ELIOT SCHREFER [00:48:52] Yeah. And so, and they do studies of identical twins. So if two twins get separated at birth or adopted in different families, say, and one comes out gay and one comes out straight. That's an argument that it's culture, right? That culture makes your sexuality because they have the same genes. Whereas if they are both turned out gay, then that's their argument that it's genetic. Now, like, looking at long term at many of these studies. Sexuality is sort of genetic. Just sort of like 50 or 60% genetic. And the rest is from the culture of how you grow up. And I think that is that is like the ideal that queer people should be hoping for because there is a big genetic component. But it's not just all genes which are which should enter in this old draconian possibility of, you know, exactly, like, instead of conversion therapy going into the hospital for a week and someone's changed their DNA. Right. Which, science isn't there yet, but it could be. So I think it's the best, best we should hope for 50, 60% genetic is perfect.

JVN [00:49:47] Hmm. So in Queer Ducks, you say, "We might have been wrong about the story of the peacock. It's not males at doing one another to dazzle females and females training males to cater to female desires." Can you explain the shift in this emphasis?

ELIOT SCHREFER [00:50:03] Yeah. So there's this whole growth in feminist biology, which I just love, which is a way of revisiting the story we tell ourselves around how sex works. Like, we had this version, like, you remember from health classes. Like, "the brave sperm goes through this hostile territory of the female's reproductive tract. And the most successful, heroic one will make it there. And he will break through the ovum and he will impregnate her." And meanwhile, we find out now, there's actually a huge amount of female agency in all that. There's microvilli on the outside of the ovum that are that pick a sperm and invite it in. And the sperm basically knocks and is incapacitated by a hormone that female releases and allows that sperm in. He doesn't break in anywhere. It's, like, the ovum has agency in it.

And the same thing happens when you're looking at animal behavior. So, the, there's natural selection, which is, "The animals that do better in each generation survive to pass on more offspring." There's also sexual selection, which is that, you know, through the choice of different organisms, you could you can change behavior over time. So if I like peacocks. So if a peahen really loves the way a male looks, she'll choose that peacock to mate with. But the way we figured that story is all about the male's journey, right? So that these males are outcompeting each other. They're doing this and creating these absurd looking feathers with, like, bright blue eyeballs on them and all to get, to win over the female. It's, like, his, his courtship ritual. And when you watch a documentary like them, often they put on sort of, you know, mood music for it and show, like, "Oh, the male bowerbird is creating the perfect arena." And they always say, just at the very end, "The female submits to the male," right? So she submits that to the winning male, the male that out competed the other males. So it's this male journey. It's like every eighties action movie, right, where there's some beautiful woman that's running along that doesn't have any lines, but she's just wearing high heels.

And the peacock, look at this journey through the other lens, like, look through the female eyes here. It doesn't help those peacocks to have ridiculous feathers. In fact, that makes them more at risk for being predated or being killed. Like, it's not a beneficial thing for a peacock to be doing, but this female peacock has decided she likes *just* this shade of blue in her males. She wants this perfect cerulean, glittery blue, and only the male that has the most beautiful blue on his feathers will she choose to mate with. And so the males are trying to change their feathers. This is like zooming out. It's not individual males doing it, but, like, over years, the male peacocks are evolving these brighter and brighter blues. So the female will be like, "Ooh, that one is the one I like. I just like the way he looks." It's not because blue makes for better young peacocks. It's just that she's chosen something and is now testing the males for their ability to alter to female desires. So *she* is the author of his change. What *she* is choosing, what *she* wants to see is really what is altering these male peacocks and putting them into these kind of more and more ridiculous forms. She's the most obvious protagonist for this story. And yet in sexual selection, whenever it's talked about, it's always about the male

ostentation, the male competition, and not the fact that they are just doing whatever it takes to to be the one that she chooses.

JVN [00:53:31] I feel like we see that a lot, like, on Discovery, like, in lions, too. It's, like, that big lion is, like, trying– and then like the lady's, like, "I don't really want to fuck." And then, like, and then there's like the British accent. It's like. "And finally she submits. It's a short coital experience, and before long, it's over, the man going on his way, and the woman left to raise a child."

ELIOT SCHREFER [00:53:51] The way we think about men and women in our society, and the unchecked assumptions that we have, get mapped on to the animal world. And we've long thought about history that way, but only recently are we really sort of thinking about the ways that that impacts the science that we do this supposedly unbiased, just experiment-based research that is actually still forwarding these human assumptions. By the way, lions have lots of homosexual sex.

JVN [00:54:15] I love homosexual sex. I also love Dr. Jue Guo from our early China episode, because she told me that's one thing that I always thought about a lot in every episode of Getting Curious that I've done since hers. But she said, "You know, you have to be careful when you're reading history or just be cognizant, because history has typically only been written by the winners, like, the people who, like, won the thing or who had, like, access to, like, *leaving* the historical information there." And especially in science, the winners were, like, straight white guys, for the longest time. And so it is really important that we think about the ways that we, like, map out these like charcoal, like human ideas onto animals. So how can we reorient ourselves from that narrative or at least start to reorient ourselves from that narrative?

ELIOT SCHREFER [00:54:57] Well, I think one thing that was really clear to me in the book, I have Q&As with five different researchers in *Queer Ducks*, and I picked people from very different backgrounds, so non-binary people and people of color. And it was, one thing that came through was, you know, science is made by the people who perform it. And so we have to expand out who gets to do science. And we have to expand it through having more diverse student bases, like, these people of color I was talking to, in their PhD programs, they were usually the only one and now they were on faculty, and they're the only one. And it's, that changes how we view animals and the stories that we bring or how we interpret the animal stories that we're witnessing.

JVN [00:55:39] Absolutely. We've heard that from other scholars that, you know, they're the only one. I also think that especially in the cases of, like, queer people, which it's, like, obviously we're really intersectional bunch because you can be like male, female, non-binary, can be any race, you can be anybody within our community. But I also think that, like, as a queer person, like, or, you know, LGBTQIA+, often, like, we're pigeonholed from very early ages, like in media to like, like, to "be what you want to be." When I was little, it was, like, "Okay, I can be a hairdresser or I can be like, you know, a stylist or I can be an interior

designer." But like, if I ever really wanted to be interested in science or really wanted to be interested in something academic, like it was made pretty clear to me that, like, "You're kind of a flighty, girly, like you're not meant to be there." And I think that's part of what I was so passionate about, was Getting Curious. And just my work in my adulthood is, like, making sure that more people can see themselves in more spaces that can move the world, like science and academia.

And not that I think that what I do isn't important, cause I love hairdressing. I love the science of hairdressing. I love the art of it, because it's actually so much more than this like superficial thing that people assign it to, because I think that it's, like, I mean, there's nothing that beauty doesn't touch: race, economics, history, because, like, everyone who we work with is so different and has, like, such a different, like, experience in the world. So I think even in those fields that are seen to be, you know, "more queer-acceptable fields," like, design or hair or fashion, even those fields themselves are also, like, there's a transmisogyny because they're, like, constantly underplayed and like undervalued in, like, how hard they are. But I also want queer people to be able to see themselves, if you do want to be a scientist, "You want to study rivers, honey? I don't give a fuck! Whatever you want to do, do that." So wait, so if one of the things in the book that I was like, you know, because I become more and more aware, like every day that I'm, like, definitely 35, which is definitely, like, not 24, you know, just like this thing that's happening. So I definitely, like, you know, and Queer Ducks. It's definitely geared towards younger readers. One of the things that, that laid that bare for me is when you said that Glee was an old TV show and I was, like, "Ahh! Fuck me!"

ELIOT SCHREFER [00:57:38] You feel the pain!

JVN [00:57:40] We are going there. So what inspired you to tailor Queer Ducks to a more YA audience?

ELIOT SCHREFER [00:57:47] Yeah. So I, you know, I've written for young adults for a while, and so I kind of come to see the field of YA, which is incredibly diverse as far as the books that are written is something that most of our readers are adults. You know, it's just a different form of telling a story. It's not necessarily about having a teen readership. And I wanted this book to be accessible to a broad audience. Just like one of the things I love about your podcast is that you're, you're making sure that there's access points for people from all walks who are coming to it. And I remember so when I was that, you know, middle school self who was hearing "It's Adam and Eve not Adam and Steve" and I realized I was gay from seeing these Fruit of the Loom ads and my brother's Rolling Stone. I was a nerd, which will be no surprise. And I went to the encyclopedia. I went to the– it was called *The Book of Knowledge*. It was, like, the multi-volume encyclopedia at the media center. And I looked at homosexuality and it just said it was this "aberration unique to humans, caused from too much attachment to mother or maybe too much attachment to father."

No one really knew, and that it didn't occur in the natural world. And that was it. And so the message I got was that, "There is something that went wrong with you." It's, I knew it was true. It was unavoidable. It was so absolutely clear to me. But it was also something that was, that was wrong. And so I went out to the other side of that, and I came to love my "unnaturalness" in a way. Like, I loved being queer, I love not being normative, and I would never trade it now. But there's a lot of, you know, I was in a sort of a purple area with pretty accepting parents, and there's a lot of teenagers who don't survive that journey to get to the other side of it and learn to love what makes them queer or unusual. Right. And for those kids in particular. That messaging, that you are unnatural, that there is something essentially wrong with you that takes you outside of the way the natural world is meant to be is something that they don't overcome. You know, there was, The Trevor Project just had some stats last year where they surveyed LGBTQ youth and found that 43% had considered suicide. And I think a lot of that is from these messages about unnaturalness.

And so what I wanted to do in *Queer Ducks* was to make it clear to those young readers that one thing is absolutely true: that there is an abundance of scientifically validated and revalidated information confirming that different gender identities, different sexual expressions, the whole diversity of what we have *and then some* is all really present in the natural world. And it's just the story you're being told that eliminates that. It's just this history of science that we have to get over. But you belong in the natural world, and that is a source of comfort. And one of the things I loved talking to these researchers in the Q&A is one of them is trans. He was assigned female at birth and then transitioned and he had top surgery. And that whole transition point when he was in his twenties was really difficult, you know, sort of negotiating family, negotiating colleagues, wondering whether to come out in these very rural spaces because he was studying sheep in, you know, Idaho. And it was when he was off in the field with his binoculars, looking at these sheep, there for a week, sleeping in a tent, did not have to worry about, "How are people going to interpret me? I am just a creature among creatures. I am in the natural world." This all important and stressful idea of categorization and figuring out your categorization fell away. And it was just being part of the natural world. And that is something that is essential to all of us and and really, really important for young queer people to hear. So that is why I wanted to gear it towards a younger audience.

JVN [01:01:37] I wrote down and, like, like, wrote, like, drew a circle around it, like, ten timesI wrote "Belong." And I feel like in *Over The Top*, my first book. I talk about like this huge fear of, like, not being normal. Like growing up, like, I really wanted to be "normal." But what I meant by saying "being normal" is that I wanted to belong. Like, I didn't want there to be something about me that, like, you know, made me stick out or, like, didn't, like, let people still, like, want to interact with me. So it's really like, ultimately, no matter what, like, we want to belong. And it's so interesting that you had to come to that journey of, like, you know, owning your thing that made you different and owning your thing that made you like otherly. But then come to find out in your scholarship, you couldn't be any more fucking normal or natural if you tried. Because, like, the same sex or poly or all of these different shades of sexualities and existences, they already do exist in the natural world. And it goes back to like

who was telling those truths in the first place. So it's like we always have belonged. We always have been "normal." We always have been, you know, acceptable into truth. But it's like the truth and the truth that we get presented is not always the same thing. And I just think that it's like really it's this sense of belonging that unites just humans. Like, we just want to belong. Like, ultimately, we just want to belong. And so I think that that's so important. And I think it's so beautiful that you did this work in *Queer Ducks*. And in the US right now, books are being banned left, right and center. You also note that books with queer themes are often targeted. What was it like to write *Queer Ducks* in this moment?

ELIOT SCHREFER [01:03:03] Yeah, and when it was after I wrote it is when this recent surge happened but basically cynical right wing politicians realized they could score major points and fire up communities by claiming that there was sexually inappropriate or they call it "pornographic" material in schools and in public libraries. And really what they're saying is LGBTQ content. And there's a separate move towards claiming CRT and that books about race shouldn't belong as well. And that's happening in parallel, which is obviously, given what I know about the importance of representation for young people, really, really troubling. But beneath it all these, this idea that you can wall out queerness, that is essential to this argument. Right, that if in our town we don't have books that even mention it. So therefore a young person can't read a book and think, "Oh, you know, I decided I'm a, I'm a I'm a boy now, even though you thought I was a girl."

JVN [01:04:03] It's the good old Chechnya theory, "There's no fucking gay people here. What are you talking about?"

ELIOT SCHREFER [01:04:08] Right. Right. Exactly. And so this, the thought is, if we seal ourselves off, we keep that messaging out, our children will grow up straight, it'll be like it always was. And the one thing that's very clear from all the natural sciences is that same-sex sexual behavior, that changing sex, which a lot of animals do, or having a different gender expression, which also happens in various animals. That is not something that comes from the outside. It is something that is inherent in the fact of being an animal. We have this diversity deep within our history from millions of years of evolution, and it's proven by the fact that it's shared by all these vastly different branches of animals. And so there is no walling it out because it comes from inside. Like, the call is coming from inside the house. The queer call is coming from inside the house.

JVN [01:05:00] And, this is our last question, I swear, in your Q&A with academic Sydney Woodruff, you say, "I've been wondering lately if queer people are especially drawn to nature." I know that it's definitely happened to me in the last two years. Like I never thought I was that into nature, but turns out like I'm fully obsessed. And also, what's your relationship with nature?

ELIOT SCHREFER [01:05:19] Yeah, I. You know, Sydney Woodruff was a great example because Sydney's Black and when he was young didn't feel like hiking was something that

Black people did. So like when Sydney got to college they said, you know, "Oh, I just, I don't know. I've been in the wild a lot, but I don't hike. But then they realized, like, 'Oh yeah, I'm a hiker. I just thought that was what white people could do.'" Like, we have all these versions that we get as children of like, "I can't camp. Like, that's not something I have access to. It's not the way I work." But the thing about nature is that you don't, you don't have a certain version of yourself that animals know. Like animals just know what you're doing in the moment and what your, what your actions are. And that is what they interpret, like, it seems quite clear that animals don't have they don't slot us into categories when they, when they see us. And it's something that I, I love about that being in the wild is that you get the sense of a pleasant kind of oblivion, like, sort of like, like, like, you're meditating, like no one's trying to pick out what you are or who you are or what you're like. Instead, you're just, just existing. And I think, I think of that, you know, trans researcher that I was talking to that felt such peace the moment that they were just sitting on a rock looking at their sheep, that it was just a moment of relief from this relentless categorization that we find ourselves in, within human societies. And isn't it, isn't it a relief that, you know, animals are like us and yet don't, don't map each other out and diminish each other's statuses based on what they've decided to identify you as.

JVN [01:07:07] Hmm hmm. Hmm. Hmm hmm. Wow. What an episode. Eliot Schafer, thank you so much for your time. We're obsessed with you. Your book *Queer Ducks* is available. Thank you so much. We love you so much. Thank you so much for your time and your scholarship and your work. We're so appreciative of you and god, did you do so good on Getting Curious.

ELIOT SCHREFER [01:07:24] Thank you so much for having me. This is a blast. Thank you.

JVN [01:07:29] You've been listening to Getting Curious with me, Jonathan Van Ness. My guest this week was Eliot Schrefer. You'll find links to his work in the episode description of whatever you're listening to the show on. Our theme music is "Freak" by Quiñ - thanks to her for letting us use it. If you enjoyed our show, introduce a friend - and please show them how to subscribe. You can follow us on Instagram & Twitter @CuriousWithJVN. Our socials are run and curated by, you guessed it, Middle Seat Digital. Our editor is Andrew Carson. Snaps for Andrew! Getting Curious is produced by me, Erica Getto, and Zahra Crim. Go listen to our next episode now!