Transcript for Lisa Feldman Barrett | How Emotions Are Made (Episode 616) Full show notes found here: https://theartofcharm.com/616/

LISA:

In fact, when is the last time you saw anyone win in an Academy Award for scowling when they're angry? Right now we have, you know, some people who scowl when they're angry but that's pretty unusual.

JORDAN:

Welcome to The Art of Charm, I'm Jordan Harbinger. On this episode we'll be with talking with Doctor Lisa Feldman Barrett. She is an innovator in the field of psychology and one of the world's foremost researchers on emotions. Today's discussion includes the idea that emotions aren't what we think they are and what we've thought they are for the past few hundred years -- a concept called effective realism, how our brain predicts what we think we're hearing and seeing and how this can affect our behavior and reactions. And we're also going to investigate how emotions are influenced by culture and how certain cultures have emotions that other cultures have never even seen nor experienced. And last but not least, how we can expand our emotional palates to become more adept at both describing and feeling more nuanced emotions and feelings. All this and more on this episode with Doctor Lisa Feldman Barrett.

And by the way, if you're new to the show, we'd love to send you some top episodes and the AoC Toolbox. That's where we discuss the science of people and discuss concepts like reading body language and having charismatic nonverbal communication, the science of attraction, negotiation techniques, social engineering, networking and influence strategies, persuasion tactics, and everything else that we teach here at The Art of Charm. Check that out at <a href="mailto:theartofcharm.com/toolbox">theartofcharm.com/toolbox</a> or in our iPhone app at <a href="mailto:theartofcharm.com/iphone">theartofcharm.com/iphone</a>. Also at <a href="mailto:theartofcharm.com">theartofcharm.com</a> you can find the full show notes for this and all previous episodes of the show. Whether this is your first or 500th episode of AoC, we're always glad to have you with use. Now, let's here from Doctor Lisa Feldman Barrett.

Thank you for joining us on the show today.

LISA: My pleasure.

JORDAN: You publish a lot of stuff. It's kind of nuts. Why? What's going

on here?

LISA: Well, a couple of things. First, I have a fairly large lab. I have

about 20 full time people in my lab -- full time scientists. And it's my job to train them and to make sure that their research careers are developing well so that requires publications. Also, we have a lot of lines of research in my lab so that means a certain number of publications for scientific discoveries in each of those lines. I would say that the amount that I publish is not that different from other influential scientists in neuroscience. Maybe a little more than what you might see in

the typical psychology lab.

JORDAN: Gotcha, okay. And you do focus on the nature of emotion from

both psychological and neuroscience perspectives which is actually is surprising because I think a lot of what I've been reading in business books or what I've been seeing even in psychology books -- they only focus one of those perspectives. And the problem with that is, there's a lot of antiquated models of the brain and things that we, I don't know, read in 1970 that people are still spouting off. Myself included, frankly, because I didn't know about the nature of emotions and that's what we're

going to talk about today, hopefully.

LISA: Yeah. The way I like to think of it is like this. Psychology is the

science of the mind. The categories of mental events that we use really were bestowed to us by the ancient Greeks and we still use many of the categories that were around in ancient characterizations of mental life. So it's really mental philosophy that's being tested in the laboratory. And as a consequence, psychologists start with categories like anger, sadness, fear, and they go looking for the physical basis of

those categories.

And that's a very different and somewhat fraught approach compared to say, starting with the structure and the function of the nervous system and asking, "Given how our brains are structured, what kind of a mind could a brain like this produce? What would emotions look like in a brain like this and does every person have to create the same kinds of emotions or emotions at all?"

JORDAN:

I'm really looking forward to this because I think it's going to turn a lot of what we think we know on its head. Especially for our show, our core through line, if you will, is enhancing emotional intelligence and talking about things that are adjacent to that. First things first though, emotions are not what most people think they are. So, let's talk about what they're not and then of course, what are they?

LISA:

Sure. So, many people assume that emotions are these fundamentally animalistic experiences and actions that sometimes cause us to do and say things that we would rather not. So for example, the ideas that, lurking inside our deep animalistic parts of our brain, there are circuits -- let's say a circuit for fear, a circuit for anger, a circuit sadness, and so on. And that when something in the world triggers this circuit, let's say for fear that may be a snake slithers by -- the circuit causes a stereotypic, a very specific facial expression that everyone in the world makes and can recognize, a stereotypic or very classic kind of physical pattern that everyone in the world experiences, and the assumption is that everyone in the world has these circuits and these facial expressions and these bodily patterns and that other animals may also have them as well. So, the idea is that inside our highly evolved brains, we have this inner beast, that lurks in these highly conserved circuits.

JORDAN:

Right so the animal brain, the reptile brain, and things like that that we just can't control or that we can, I guess Plato thought that we could control by being very logical and thoughtful and deliberate.

LISA:

Exactly. So we can blame Plato again here. Although other philosophers and scientists have certainly elaborated on the original idea. But, you know, Plato's original idea was that the human mind, what he called the psyche, was divided into three parts: animalistics kind of appetites, like hunger and sex and so on, emotions which he called the passions, and he represented these or symbolized them as two wild stallions that had to be controlled by a rational human, a charioteer driver. And this idea that we have, kind of a lizard brain that is wrapped by, what's a so-called limbic system, which is where our emotions live, and that these two parts of the brain constitute our inner beast and are controlled by our highly evolved cortex, which is where rationality lives.

This is a cherished view of human nature that scientists and everyone else have really tattooed onto the brain. Evolutionary biologists and neuroscientists have known for quite some time now that the brain is not structured this way and it didn't evolve this way. Brains as they get bigger, across the span of evolution, reorganize themselves in the same way that companies, as they grow, reorganize themselves to stay efficient.

JORDAN:

And we now know that individual emotions don't live in specific parts of the brain. So there are no stallions controlled by the charioteer. Where are our emotions then? If we now know from your research, that they're not in one specific part of the brain, where the heck are they?

LISA:

That's a great question. So, all of human neuroscience began with the question of where in the brain does anger live, sadness live, where does thinking live, where does memory live, where does seeing live?

The idea was that each event that we have that we distinguish in our experience, could be found in different sets of neurons. And at first, they were talking about brain regions, and then when that failed, scientists went looking for distinctive brain circuits or networks and when that failed, they went looking for patterns across the brain on the assumption that, you know, every time you're angry your brain will comport itself into the same pattern.

The fact is you can find a pattern, for anger let's say, but that pattern is -- it's like an abstract, statistical summary. It doesn't actually exist in anybody's brain. It's just a summary that we can use to diagnose highly variable brain states. So, I guess what I would say is where in the brain anything lives is not the right question, the really -- a better question is how does the brain make emotion? How does make anger? How does it make sadness? Your brain is billions of neurons which are, you know, wired together in a big network and that network is bathed in a chemical system that changes how easy it is for neurons to pass information back and forth and speak to each other.

So the way to think about it instead is that, this one big structure can take on trillions of different patterns and anger, for you, is some population of patterns that are whole brain states. And anger for me will be some population of patterns too and we assume that there's some similarity between those patterns because otherwise we probably wouldn't be able to communicate with each other. We wouldn't be able to recognize each other's experiences of anger and we wouldn't be able to talk about anger in a way that is meaningful enough for us to communicate well. But there's no requirement that, let's say someone who lives in a culture where there's no knowledge of anger, no concept of anger, that their brains would be able to make those patterns for anger because their brains haven't wired themselves in such a way to allow that to happen.

JORDAN:

So, emotions, they're not universally human, they're culturally based. They're constructs.

LISA:

What's universally human is that all brains wire themselves to the social and physical surroundings that they grow in. So, your brain and my brain and people who were raised in North America, our brains learn to wire themselves in such a way that they could make anger. In other cultures, people's brain wire themselves to make the experiences that they learn in those cultures.

JORDAN:

So what's an example of an emotion that doesn't exist in North American culture that exists somewhere else that maybe you can explain to us in a way that we can understand?

LISA:

Sure. So because our brains have the capacity to make new patterns they've never made before -- so they can take experiences that we've had from the past and use them in the present to make brand new recipes. Think about the brain as having a set of all purpose ingredients, kind of like flour, water, and salt. So, flour, water, and salt in your kitchen you can use to make lots of different recipes for lots of different foods and sometimes you can even use those ingredients to make non-food items like glue, right? And so similarly, your brain has a set of all purpose ingredients and it can actually use those ingredients to make new experiences that you've never had before.

So for example, there's an emotion concept that exists in Dutch called 'gezellig', which means, kind of warmth and comfort and coziness and with people that you're familiar with and that you feel close to. As you can tell, it's taking me many words to describe to you what this emotion is and you're probably able to understand it and you might even be able to make that feeling because your brain can do, what we call, conceptual combination. It can take your knowledge of different emotions that you've experienced in the past and put them together in brand new ways. Scientists call this being generative, that you can generate new patterns out of combinations of old patterns. But it's effortful and you know, it takes me many words to describe it to you and -- as opposed to me just saying the word 'gezellig' to you, where your brain can, you know, in the blink of an eye, construct that feeling because it's had a lot of practice doing that.

JORDAN:

So when we feel happy, sad, angry, or any other emotion, according to the book, it's not because our brain is reacting to events in the world, it's doing something -- predicting and not reacting. What is that? How does that process work and what does that even mean?

LISA:

Yeah, so, to us it feels like we -- stuff is in the world and we see the stuff because it's there and it -- you know, light from my computer screen enters my eye and makes it to my brain and that's why I see you, that's why I see the computer, that's why I see all the things around me and so on. To you it seems as if you are just listening to the sounds that I make, the words that I'm speaking, and -- but in fact, you have had decades of experience listening to the English language, and as a consequence, your brain is not reacting to my words, it's actually predicting every single word that comes out of my --

JORDAN: Mouth, right.

LISA: Exactly. And if I were to say something that you didn't predict,

it would feel really surprising to you. You know like, once upon

a time, there was a beautiful princess who -- what do

princesses do? They --

JORDAN: Yeah, I don't -- danced in the castle or something.

LISA: Yeah, you haven't -- clearly haven't read enough fairytales

right?

JORDAN: Yeah, I'm a little rusty on that.

LISA: Once upon a time there was beautiful princess who lived in a

beautiful castle on a hill, you know, as opposed to once upon a time there was a beautiful princess who died a horrible death

full of blood and guts and terror.

JORDAN: Right, so then my prediction wouldn't work in that case, or

would be off.

LISA:

Exactly. And so predictions don't mean who's going to win the World Series next year necessarily, predictions -- your brain is actually predicting every sight, every sound, every feeling in your body, and we know this for a couple of reasons. The first reason that we know it is that, we can look at the structure of the brain and understand that it's structured that way. The second reason we know this is that actually predicting and correcting those predictions -- so your brain makes a prediction about -- on the basis of what's going on right now, it's predicting what it's going to hear and see and smell and taste and feel in the next moment, and then it actually gets information from the world that it then uses as evidence that it compares to its predictions. So for example, if I ask you in your mind's eye to imagine a red Macintosh apple of the sort that you eat --

JORDAN: Sure.

LISA: Okay, and can you imagine kind of holding that apple in your

hand and taking a bite of that apple and feeling the hardness -your teeth sinking into the hard skin and the crunch of the bite

and so on, can you hear that?

JORDAN: Sure, absolutely.

LISA: Yeah. And some people can even, kind of, taste the tart sweetness of the apple and so on. In all of these cases that

we've just described, the reason why you can kind of see the ghostly apple and taste it and hear it and so on is because certain parts of your brain are actually changing the firing of sensory and motor neurons in other parts of your brain. That's

what we call a simulation or a prediction. Your brain is

predicting what you would see, what you would taste, what you would hear, and so on, if an apple were actually present, using your past experience of apples. But let's say I actually pulled out an apple and handed it to you. Then your brain would actually take information from that apple and compare it to its

prediction.

And so let's say, for example, that your predictions were perfect. The fun and interesting thing about this is that no information from the apple would actually make it very far into your brain because your neurons are already firing in a way that captured it. Prediction is extremely efficient from a metabolic standpoint, and brains are very expansive organs. So, neurons are expansive to keep alive and running so it's really good to have a very efficient brain. If, however, when you bit into the apple, maybe it was a little sweeter than you predicted, your brain might correct its prediction and then you would experience that additional sweetness. Or it could be the case that your brain might decide it doesn't care about the additional sweetness and your brain would kind of stick with its prediction so your experience of the apple would be somewhat less sweeter than the amount of sugar that was actually in the apple.

## (COMMERCIAL BREAK)

JORDAN:

So if these predictions influence what we see then this has implications, as you mentioned a little bit in the book and in some of your work, in law for example. If I'm an officer of the law and I'm in a stressful situation and I predict that this person is dangerous and then they pull out a remote control for their TV or even just their iPhone, or nothing in fact.

LISA:

Or even just maybe have their hand kind of come close to their belt, for example. Yes, exactly. So, the cool thing about prediction, you know, is that it allows us to have games like baseball and tennis. I mean, baseball and tennis wouldn't exist as sports if we didn't have predicting brains. When you see the interaction between like a batter and a pitcher, you know where the pitcher is trying to psyche out the batter. The pitcher is trying to manipulate or influence the batter's predictions because where a batter swings -- it's not like a batter looks at a ball and then sees it and then starts to swing, because your nervous system is not structured in a way where it can mount a response fast enough to do that.

If the batter had to wait to see the ball, by the time the batter could get his arm up and swinging, the ball would be like, way past him already. So the batter has to predict where the ball is going to be and then his brain is predicting where the ball is going to be and then it starts to make the swing according to where the predicted ball is going to be. Put that in the context of policing, let's say. Or, put that in the context of being a soldier or in the military. What's happening is that the brains of police officers and of assailants and of the average person walking down the street, you know, they're all making predictions about whether someone is likely to be a threat, whether someone is likely to have a weapon, and sometimes those predictions can lead to very tragic consequences.

JORDAN:

Are there ways in which we can make our predictions more accurate and less subject to these kind of emotional -- or this interference -- or the metabolic efficiencies of our brain?

LISA:

Absolutely. I mean we do it all the time. We -- driving becomes very automatic, playing baseball you could actually improve. Any kind of skill that you have you develop that skill, you improve that skill because your brain is getting better and better and more accurate and more efficient in its predictions. So what this means though is that this is actually true in any domain of life. If you want to improve your emotional life, for example, you can do some things to make your brain better at making predictions about emotion and constructing those emotions in exactly the same way that you would practice any other skill.

JORDAN:

So we can't necessarily control our feelings in anyway, right? We can't use thoughts to control these feelings. That's an outdated model, correct?

LISA:

I would say that it's an outdated model to think -- to believe that thoughts control feelings. I absolutely think you can control your feelings, there are lots of different ways to do it, but thoughts don't control feelings, perse. I think that's certainly our experience of how things work and our whole theory of human nature is that the mind is a battleground between thinking and feeling where, you know, it used to be the case that good behavior or effective behavior was when thoughts controlled feelings.

Then, you know, Antonio Demasio and some other neuroscientists showed the importance of feeling and so that battleground became more like a healthy competition between thinking and feeling. And I think that an emotion is a whole brain state, a thought is a whole brain state, they're just different patterns that your brain takes in succession, right? And so, you definitely can control your feelings, but it's not in the way that the typical model, I think -- the typical ideas really -- people's typical idea's don't really capture that. The idea that emotions and cognitions, or thoughts and feelings are at odds with each other and one is controlling the other in the interest of behavior, is not really correct.

JORDAN:

So if emotions are not necessarily universal in the way that they are experienced by us people, they are culturally influenced, does that mean then that the way that we physically manifest these, for example our facial expressions, are also not universal?

LISA:

Sure, well here's what I would say. Just think about your own life. You've seen people smile in anger, you've seen people cry in happiness, people do all kinds of things with their faces. So for example, my husband makes a stereotypic scowling anger face when he's concentrating really hard. He doesn't make this face when he's angry. In fact, when is the last time you saw anyone win an Academy Award for scowling when they're angry? It's just not -- you know there are very few people, you know, on television or in the movies who actually scowl when they're angry. I mean, right now we have, you know, some people in politics who scowl when they're angry but that's pretty unusual.

Most of the time, people do many different things with their face when they're angry. Sometimes they'll widen their eyes, sometimes they'll squint, sometimes they'll smile, sometimes their face will be completely still, sometimes people laugh in the fact of anger. And similarly, what your body does in anger, depends on what the situation is and what your action is going to be because your body -- the physiology of your body, your heart rate and your breathing and so on, didn't evolve to have emotions, it evolved to keep you alive and well, to allow you to move your body. So, in some situations you might yell in anger but in some situations you might sit quietly. In some situations you might withdraw. There are many different things that you do and what your body does follows from what your behavior is going to be.

JORDAN:

So why do these expressions, these sort of stereotypical expressions even exist in that case if they're not accurate?

LISA:

Yeah, that's a great question. So the first thing I would say is they don't exist everywhere. For example, my lab has gone to Tanzania to study the hunter-gatherer culture called the Hadza people who have been hunting and gathering in Africa since the Pleistocene. And I can assure you that in our data, they don't recognize scowls as anger and pouts as sadness and wide-eyed faces as fear and so on. Nor do they give any evidence of stereotypically making those faces in the way that our classical ideas about emotion suggest. Those facial expressions are stereotypes and the stereotypes were not discovered by any scientists, they were stipulated by scientists beginning with Darwin, actually.

So, Charles Darwin wrote a book some years after he wrote <u>On</u> <u>the Origin of Species</u>. He wrote another book called <u>The Expression of the Emotions in Man and Animals</u> and in that book he specified, he stipulated, what he thought the facial expressions for each emotion were and he believed them to be universal and there was a lot of really interesting stuff about the history there and what he said and how he's been mischaracterized and how he actually was inconsistent with

his earlier writings in <u>On the Origin of Species</u> and so on. And I discuss all of this in my book but the bottom line is the scowling anger face and the pouting sad face and the smiling happy face are stereotypes that were stipulated by scientists, they weren't discovered by studying people.

JORDAN:

So that would imply then, that as far as emotions are concerned, there's no single human nature if we're just wiring ourselves to wherever we happen to live.

LISA:

Exactly. The interesting thing about our brains -- you know, one of the great adaptive features of our brains is that our brains wire themselves to their physical and social surroundings. So, a human brain has the capacity to make many different kinds of human minds. What unites us as humans and what gives us our similarity to other animals, is not that we have some kind of universal mind that our brain can make only one kind of mind and that mind has, you know, ancient features that it shares with other animals, that's just a really compelling story. People love that story but it's just a story.

JORDAN:

So if emotions are not hardwired, they're not, as you call it, fingerprinted, and there's not this stereotype anger, smile, happy, how is facial recognition software and stuff going to work? It's not really.

LISA:

Yeah, so here's the thing, I think that the technology that companies are developing has the potential to be super powerful, in that, it's possible for me to be able to learn something about your vocabulary of facial movements that you make when you're emotional. So maybe when you're angry, maybe you scowl sometimes, but maybe you also have other characteristic movements when you're angry and maybe it's possible to learn what those are.

So maybe it's the case that you have 10 and they're different whether you smile in anger or pout in anger or widen your eyes in anger but stay quiet, maybe that's somewhat situationally determined for you. And maybe, I share some of those, or maybe I share some that are not identical but they're similar enough that you and I can guess and what each other is feeling pretty well. I guess what I would say is, technology has the capacity to do something that scientists have never been able to do really well and that is to observe people very intensely and capture a lot of rich, contextual information so that we can start to see what the regularities are in people's behavior.

So, maybe you have some regularities, maybe I have some, maybe they overlap a lot, maybe they overlap a little, but the idea that there's one face for anger, one face for sadness, one face for disgust and so on -- and that software is going to learn to read those faces, that's just -- my prediction is that's never going to work and it's going to be a hell of a lot of money and person hours and opportunity wasted.

JORDAN:

So if emotions are not universally felt, and they're not really universally expressed, especially among cultures, is that not going to cause problems with negotiations? I'm imagining at the U.N, there's just all kinds of confusion when it comes to reading people and they just can't do it, I mean it's not possible. But the fact is, if we don't know that we can't do it, that's even worse.

LISA: Yeah, so doesn't it? Aren't there a lot of confusions?

JORDAN: Sure.

LISA: Aren't there a lot of problems? Yeah, exactly. Imagine being in

a negotiation where, you know, in our culture, when you nod it means yes and when you shake your head it means no. Well, imagine being in a culture where, you know, shaking your head means yes or maybe and nodding means no. Try to put those two people together and -- well there are cultures, actually, like that, right, where shaking your head means yes or it means maybe, probably, and nodding means no. So facial movements are pretty much the same. For example, my

husband, when he scowls when he's concentrating really hard, people sometimes do think he's angry.

Sometimes people have such confidence about their own ability to guess, to make predictions about what someone else is feeling, that their confidence leads them to believe that they know something about the emotions of someone else that that person themselves doesn't know. So, you know, my husband was married before he met me and he got a divorce and he went to see a therapist who was insistent on telling him that, you know -- the therapist asked him a question and he answered while scowling. The therapist said, "Oh, you're really angry?" and my husband said, "I'm not really -- no I'm not really angry," and the therapist proceeded to try to convince him that he really was angry but he just didn't know it. And that was the shortest therapy session on record, ever in the world, I think, because my husband was --

JORDAN:

Yeah.

LISA:

-- just out of there. And I have to tell you, my own students, like when they're giving a practice talk in the lab, I think for the longest time, they found it a very scary proposition, not just because I ask challenging questions, but because I probably also knit my brow when I'm concentrating. And so, you know, as long as you and I have a similar enough background that we can guess reasonably well, it doesn't have to be perfect, right, but reasonably well. We can communicate okay. But a lot of confusions in communication, both within a culture, and across cultural boundaries, occurs because beliefs about emotional movements being universal when in fact they're really not.

JORDAN:

So in other words, variation not uniformity -- what we're experiencing here, in terms of the expression of emotion.

LISA:

Yeah, variation is the norm. And in fact, this idea that variation is the norm, comes from Darwin. So in <u>On the Origin of</u>
<u>Species</u>, Darwin discussed what many people think to be one

of his most important conceptual innovations that really transformed biology into the science that it is today. And that's the idea that a species of animal, let's say Cocker Spaniels, are a highly variable set of individuals, right? So there's no perfect Cocker Spaniel with a perfect nose size and a perfect coat and perfect ears and perfect tail and so on, just in the same way -- it's a stereotype, just in the same way that scowling in anger is a stereotype. Instead what you have are a set of highly variable animals, highly variable individuals, and the conditions of nature select some of that variability.

So maybe in a certain situation, dogs with longer noses are preferred, and in another situation, dogs with thicker coats are preferred. Similarly -- oh, let me just say this, that the idea of natural selection couldn't exist if you didn't have meaningful variability in animals. And similarly, your brain has the capacity -- if you grew up in a culture where anger exists that anger is -- people feel anger and their brains can make anger, then your brain doesn't make one anger, it can make a whole population of angers. It's able to select which one it's going to make based on which one is going to best fit the situation that you're in where best is defined by whatever worked in your past.

## (COMMERCIAL BREAK)

JORDAN:

So there goes all that money spent on training TSA agents and training police to recognize the emotional pattern in somebody and things like that. That's all moot.

LISA:

Yeah, I mean, with no knowledge of a particular person, you can guess pretty well whether someone is in a pleasant state or an unpleasant state. You can guess pretty well whether they're really worked up or whether they're really calm. But for example in an airport, has it ever happened to you that you've missed your flight or your flight's been cancelled but you have to be some place? You get really worked up and what you're feeling is fear and anxiety, and what the gate agent sees is anger.

JORDAN: Mmm.

LISA: I don't know if that's ever happened to you but it certainly

happened to me and I watch it happen every time I take a flight where, if something goes wrong -- sometimes people are angry but a lot of times they're just super anxious, there's a lot of uncertainty, they don't know if they're going to be able to get where they're going. And gate agents often experience that as anger as opposed to fear. Well, the same could be true for TSA agents, and in fact, the TSA were trained, for a number of years, using a program that's based on this classical view of emotion and there were congressional hearings about this because, after spending almost a billion dollars, it was discovered that

the detection procedure didn't work.

JORDAN: Wow.

LISA: Largely it didn't work because if somebody has ill-intent, it's

not going to be broadcast on their face. There's no guarantee that what you would do if you had malintent would be the same thing that I would do or the same thing that someone from another country would do. Behavior is highly, highly

contextualized.

JORDAN: Tell me about effective realism. This was an interesting

concept and it kind of goes along with what we talked about before where police, for example, see things based on the way that they're feeling. What else is encompassed in this concept?

LISA: Yeah so, remember how I said, when you're simulating the

apple, you're imagining how it looks and how it tastes and so on? Some parts of your brain are changing the firing of other neurons in other parts of your brain, right? And then these are the predictions that are then confirmed or corrected by the world. Well the parts of your brain that launch those

predictions are also the parts of your brain that control your

body.

This is something I discuss in the book and there's a lot of evidence to back up this observation that I'm making. I cover, you know, a little bit of it in the book and then I have extensive endnotes in the book and also webnotes online that people can go to to learn more about this. But basically, your brain is wired in a way, such that, the predictions it's making are predictions that stem from the need to control the body. It may same to you, and to me, and to every other scientist as if -- every other person, as if our brains are meant for thinking and feeling and seeing, but actually our brains evolved for the purposes of controlling our body.

And so it's not the case that you see something and then you act, it's the case that your brain starts to prepare your body for action. Those preparations also contribute to the predictions of what you're going to see and hear and taste. So, in this moment, your brain predicts what your body needs to do next and those predictions also influence the predictions of what you'll see, and what you'll hear, and what you'll taste, and so on. So what does this mean? Well when your brain makes a prediction that your body needs to move, that your heart rate needs to increase, that you need to breathe more deeply and so on, you feel that.

You feel the sensations of those movements as simple feelings of feeling pleasant, feeling distressed, feeling worked up, feeling calm. And those feelings, as I said, they result from predictions that are also driving what you see and what you hear and what you taste. In every moment of your waking life you have these very simple feelings, whether or not you're having an emotion. And sometimes your brain turns these feelings into emotions when they're particularly strong, but these feelings also exist in moments that are not emotion. For example, when you're perceiving someone else.

So, if you've ever had a moment where you think, "Wow that guy is super nice," or, "Wow that guy's an ass\*\*\*\*," those are moments of affective realism where you have a very strong feeling but you're experiencing that feeling as a property of

what you see, of what you hear, not as a property of your own reaction. And this is where the idea of 'hangry' comes from. You know that people, when they're super hungry, are just -- they experience that as anger, for example. It's not a mistake, it's that they're using the experience of feeling hungry -- or they're using hunger as an ingredient to making anger. Affective realism means that you don't see something and then have a feeling, that you -- really that you see what you feel, right? There's a lot of evidence that this is the case.

So, for example, there's evidence in the real world. For example, if you're interviewed for medical school or on a day -- if you go to medical school -- this is also true for being interviewed for jobs, for example. But the medical school example is quantifiable. If you interview with someone on a rainy day versus a sunny day, you know, things will go better for you at an interview on a sunny day. The interviewer will like you better.

If you interview with someone before lunch, versus right after breakfast -- well, right after breakfast they're feeling pretty good, right before lunch, they're probably feeling pretty hungry and uncomfortable and discomfort will be influencing the kinds of predictions that they're making about you. In fact there was a study done with judges showing that when you look at the judgements that judges make about parole for people, they make very, very different decisions right before lunch than they do right after lunch.. Right before lunch they're feeling unpleasant and they are using that unpleasantness as a source of evidence that something must be -- that the prisoner doesn't deserve parole. There must be something about him that's dangerous or problematic. Whereas after lunch, that unpleasant feeling is not there and so they're more likely to grant people parole after lunch. And I can give you lots and lots of examples.

In our lab for example, we can make people feel unpleasant, without knowing it, and then have them look at pictures of people while we're making them feel unpleasant without them

knowing it -- without them knowing the cause of it, and they look at those people and they see those people as less trustworthy, less likeable, less attractive, less reliable. Similarly, we could make them feel pleasant without knowing it, and they see people as more reliable, more trustworthy. They even see the people as smiling, even though the faces are completely neutral.

JORDAN:

That's so interesting and I feel like our brains -- it's not necessarily a trick that's played on us, it's simply an efficiency that is less objective than we think it is.

LISA:

Well, you know the illusion of the dress? You know, is that dress -- you know is it black and blue or is it gold and white, right? Some people see it as one, some people see it as the other. That's a really great example I think of showing you just how every experience you have, everything you hear and see and taste and feel, is your construction. There's nothing about our experience that is completely objective. It may feel to you as if it is, but your brain is not wired to work that way.

JORDAN:

Because when we look at the dress -- and we can probably throw this link in the show notes, if you see it one way -- when I look at it, it is white and gold, there is no question. There's no blue, there's no black, but other people will swear by that exact same thing. And so, the difference in color perception really is -- it sounds like what you're saying, it's just a metaphor for the fact that we all perceive things really differently. It's just that this is a really obvious side by side comparison if you're sitting next to your friend and they see it completely differently than you do.

LISA:

Yeah so, a study is about to be published which shows, really clearly, that the people who see the dress as white, are what are called 'larks.' They're kind of -- they're like day people, they're up a lot during the day, so they're exposed to a lot of sunlight which has a bluish kind of tint to it. So their brains are predicting that the bluish tint will be there and so they're factoring it out of their viewing of the dress so they tend to see

the dress as white. Whereas people who are night owls, they tend to be up a lot in the night, means that they're exposed to a lot of artificial light, which is -- has a yellowish tint, so their brains kind of predictively adjust for that and so they see the dress as blue and black. And it's a beautiful set of experiments, lots of subjects, replicated, so it shows really clearly that your -- even something as basic as your experience of color is predictive. You are not seeing the world as it is, you are seeing the world through the lens, literally, of your past experience.

JORDAN:

Is there anything we can do to -- on a practical level -- to become more aware of our emotional filters of our perceptions or the subjectivity of our emotions?

LISA:

Absolutely. There are many things that you can do. I mean, first of all, one thing that you can do is, be very mindful in the moment. So your brain ignores a lot of potential information because it's predicting it's not very useful for regulating your body. But the more mindful you are, the more pay attention to small changes around you, the more opportunity you have to control what you feel.

So for example, right now for example, you're sitting on a chair and there are sensations that are available to you that you normally wouldn't pay any attention to but you will as soon as I mention them. So for example, you could pay attention to the feeling of the back of the chair against your back and the feeling of the seat of the chair against your legs, and you could pay attention to whether or not you're breathing quickly or slowly. And you could slow your breath down, for example, which actually makes you -- your nervous system -- it calms your nervous system to do that.

When you're out and about, you could be paying attention to the fact that it's -- at least in the Northeast, where I live, spring is happening and so you might see little leaves of little flowers -- of crocuses, popping up through the soil. You know, even if there's still snow on the ground. This is something that if you're walking really quickly, to get from one meeting to

another, you completely ignore. But when you pay attention to these small things, they give you the opportunity to cultivate emotions that you normally wouldn't feel, that can be very pleasant and they give you much more control.

Another thing that you can do is you can learn a lot of words for emotion. Because, you know, if it's really the case that your past experiences used by your brain to predict and construct the present, and it's doing this very automatically without a lot of effort on your part, then if you cultivate new experiences in the moment, those become the predictions that your brain uses to create emotions in the future. So by spending time right now, learning new emotion concepts and words and cultivating those experiences, it's little of investment of energy now but then, you'll be able to make those emotions in the future, very, very automatically, which, you know, gives your brain more choice over which emotions to make, which ultimately is a good thing.

JORDAN:

So it's kind of like developing your talent as an artist by instead of seeing blue, green, yellow, and red, you're like, "Well okay, I've got purple now. All right, that's fine." But now you've got 17 different shades of blue, where to a guy like me who's not involved in the art world, they all just look like blue, but they have different names for somebody who's experienced in using them.

LISA:

Exactly. It's exactly the same. Another example is a sommelier. You know, sommeliers can tell the difference, not just between, you know, red and white wine, or not just between, let's say -- you know, a chardonnay and a pinot grigio, but they can tell the difference between many, many, many different varieties, let's say of chardonnays and in fact, they can sometimes tell you the exact vineyard that grapes came from. So, what they're developing is expertise. They're paying attention to details and starting to use those details very automatically, to create distinctive experiences that for a non-expert -- that a non-expert really can't do.

JORDAN:

Is there anything that I haven't asked you that you want to make sure you deliver, in terms of the concept of emotions and emotional filters, and the way that we express ourselves?

LISA:

I guess what I would say is that understanding that your brain predicts, understanding that you are an architect of your own experience, does not allow you to just snap your fingers and change how you feel. That is just not possible for most people because your brain is just -- it's not wired like that. What this set of ideas does, and when I say ideas I mean these are ideas that are backed up by decades of research as I discuss in the book.

These observations, these insights, broaden the horizon of your control over your emotions. They give you lots and lots of suggestions for things that you can do to control and architect your emotional life in a way that is more pleasing to you. They empower you in a way -- when you try to control your emotions, you're not just trying to do it in the moment, which is frankly the hardest time to do it. There are all sorts of other things you can do that can improve your emotional life, where the horizon of your control is really broadened and you have more options for how to exact control. I think that's one thing these insights do. The other thing these insights do is they give you more awareness and new strategies for communicating better with other people which will have an impact in every domain in your life, whether it's the law or in -at work or, you know, communicating with your lover, or raising your kids, or what have you.

JORDAN:

Thank you so much for coming on the show today. This has been really, really enlightening.

LISA:

Thank you, it's been my pleasure talking to you.

JORDAN:

Interesting stuff here from Doctor Barrett. I really didn't know that emotions were constructed by the brain and that were culturally influenced. I had a feeling that there were nuances there but I had no idea they were completely constructed, not

only by the brain but by our culture and by the cultures that we live in, the people that we're around, the surroundings we find ourselves in, and I had no idea you could expand your emotional palate. I think that's also just completely fascinating.

Great big thank you to Doctor Barrett. The book title is <u>How</u> <u>Emotions are Made</u> and that will be linked up in the show notes for this episode as well. And if you enjoyed this one don't forget to thank Doctor Barrett on Twitter. We'll have that linked in the show notes, naturally. Let me know what you thought of this one. Tweet at me your number one takeaway from Doctor Barrett. I'm @theartofcharm on Twitter. Boot camps, our live program details are available at <u>theartofcharm.com/bootcamp</u>.

We are each art projects. This is channeling my Jason Silva here. We can curate our input and curate those around us and shape our future selves. And The Art of Charm is really the study of how this is done and how to do it for ourselves and that's what you're going to learn at boot camp. You can really join thousands of guys who have been through the program, they'll become your network for life. And to see people become part of the AoC family and the growth they experience over the next months and years is really amazing. It's super rewarding. We would love for you to join us so check that out at theartofcharm.com/bootcamp. We also have our 30 day challenge at theartofcharm.com/challenge. That's about improving your networking and connection skills, inspiring those around you to develop a relationship with you, both personal and professional.

And we'll also email you our fundamentals Toolbox that I mentioned earlier on the show which includes some great practical stuff, ready to apply, right out of the box, on reading body language, charismatic nonverbal communication, the science of attraction, negotiation techniques, networking and influence strategies, persuasion tactics, and everything else that we teach here at The Art of Charm. It'll make you a better networker, a better connector, and a better thinker. That's

theartofcharm.com/challenge or text 'charmed,' in the U.S. to 33444. For full show notes for this and all previous episodes, head over to theartofcharm.com/podcast.

This episode of AoC was produced by Jason DeFillippo. Jason Sanderson is our audio engineer and editor, and the show notes on the website are by Robert Fogarty. Theme music by Little People, transcriptions by <a href="mailto:TranscriptionOutsourcing.net">TranscriptionOutsourcing.net</a>. I'm your host Jordan Harbinger. Go ahead, tell your friends because the greatest compliment you can give us is a referral to someone else, either in person or shared on the Web. Word of mouth is everything so share the show with friends and enemies. Stay charming and leave everything and everyone better than you found them.