

The Pop Ups. Stay seated. Three, two, one, ignition. Get ready for an adventure of magnificent proportion.

The Pop Ups. (Singing.) I don't know what you've been told, but we're in a golden age - so many discoveries that are jumping off the page. Wow in the world. Wow in the world. Wow in the world. Wow in the world. Wow in the world. Wow in the world. Wow in the world. Wow in the world.

The Pop Ups. With Guy and Mindy. We're on our way, Houston.

Mindy. Oh, hi. Excuse me. Can I just - is this seat taken? Well, it is now. Have a seat. Ok. Pleasure to meet you. The name's Mindy. What's yours? Oh, well, my name is Mindy, too. No way. Yes way. No way. Yes way. Get out of here. Ok. I didn't mean that literally.

Mindy. Oh, right. I should've known that because it's almost like we're-yes? We're almost the - we're the same person. Whoa. That was weird. Am I talking to myself? I'm talking to myself. Oh, boy. Am I crazy?

Guy. Mindy.

Mindy. Busted. Oh, no. Here comes Guy Raz. I'm back here, Guy Raz.

Guy. I can hear you talking. Where are you? I just came up...

Mindy. So, Mindy, you have to tell me what you were eating over here. It looks delish.

Guy. I can hear you talking.

Mindy. Oh, Mindy, thank you for asking. It's just a kale caesar salad that my buddy Guy Raz made from scratch and left over here to wilt.

Guy. Where are you? I... I...

Guy. I just came by to pick up my kale salad that I left.

Mindy. Kale salad. Ooh la la. But I made it better by replacing all the kale with Frosted Flakes.

Mindy. Whoa, whoa, whoa.

Guy. Whoa, whoa, whoa. Mindy, what in the world is going on here? There are two of you. Am I seeing double? What's happening?

Mindy. Oh, hey, Guy Raz. We were just talking about you.

Guy. And when you say we, you mean...

Mindy. Me and me.

Guy. Am I seeing double?

Mindy. No. You're just wearing two pairs of glasses. Here, take those off.
There. That's better.

Guy. Ow. Ow. Wait. Wait. Is that my kale salad? What did you do to it?

Mindy. I fixed it with Frosted Flakes.

Guy. You what?

Mindy. And now I'm eating it with my own reflection.

Guy. You're having lunch with yourself?

Mindy. Well, technically, it's your lunch. But, yeah, pretty much. To eat with myself, I needed a mirror. And that's why me and myself are eating your salad in the bathroom here. Do you want it back?

Guy. What?

Mindy. What?

Guy. No. Mindy, what is going on? I mean, you are sitting in the bathroom in front of a mirror, eating a bowl of Frosted Flakes salad and talking to your reflection.

Mindy. Oh I have a great explanation.

Guy. Somehow, you always do.

Mindy. So I just read about a new discovery that was made by some researchers at Nagoya University in Japan.

Guy. So there's a scientific explanation for all this?

Mindy. Of course there is. Why else would I be eating your salad in the bathroom mirror with my own reflection?

Guy. Right.

Mindy. So let me start by saying that there have been studies in the past that have shown that people eat more and enjoy their food more when they're eating it with other people. It's something called the social facilitation of eating.

Guy. Yeah. And speaking for myself, I would say that is true as long as you're not eating with other people in, say, a landfill or this bathroom.

Mindy. I'm picking up what you're putting down, Guy Raz.

Guy. Ok. So back to this research.

Mindy. And so these researchers wanted to find out if eating alone but looking at ourselves in the mirror would have the same effect as eating with another person.

Guy. Huh. That's interesting. So how did they do this experiment?

Mindy. Well, they got 16 people, mostly the age of grandparents, to come and eat popcorn for 90 seconds.

Guy. That sounds like a pretty short party.

Mindy. Well, it would be if they were all together and not sitting in a laboratory. But that was not the case here.

Guy. So they had to eat the popcorn alone?

Mindy. Well? It depends on what you mean by alone, Guy Raz.

Guy. Well, were they by themselves?

Mindy. Well, each one of the 16 people were not with other humans. So I guess you could say they were technically alone.

Guy. Ok.

Mindy. But if you mean, were they truly alone? Then no.

Guy. Well, were they alone or not?

Mindy. Well, in one group, the researchers had the people eat in front of a mirror so that they could look right back at themselves. And in a second group, the researchers asked the people to eat in front of a blank screen or, like, a blank wall. And then in the third group, they asked people to eat the popcorn while looking at a photograph of themselves eating popcorn.

Guy. This is making my head spin.

Mindy. Yeah. People will pretty much do anything for free popcorn.

Guy. So what did they discover after the popcorn ran out?

Mindy. Well, after the popcorn ran out, they asked these people to answer a few questions like, how much did you enjoy this popcorn that you were eating alone, and how much of it did you eat?

Guy. Interesting. So they wanted to compare how the popcorn tasted if you ate it all by yourself or if you ate it in front of a mirror or if you ate it just looking at a picture of yourself eating popcorn?

Mindy. You got it.

Guy. And what did they find out?

Mindy. Ok. So they found out that people eating in front of the mirror and even just in front of a picture of themselves seemed to enjoy their popcorn more and ate more of it than people eating totally by themselves.

Guy. That's amazing. So even if you're not literally with another person but just with an image of yourself or you in the mirror looking back, the experience of eating can be better?

Mindy. That's what these scientists in Japan concluded. And you know the coolest thing about it?

Guy. What?

Mindy. Well. This research could help solve the problem of loneliness.

Guy. Wow. Because feeling lonely is no fun.

Mindy. You got that right, Guy Raz. And lots of people all around the world get lonely, like people who might live by themselves and don't always get to eat dinner with friends or with family.

Guy. I can imagine that would make mealtimes feel pretty lonely.

Mindy. For sure. So these scientists in Japan are hoping that maybe this experiment will lead to new ways of helping people who are lonely feel less lonely when they're eating.

Guy. Because when someone feels like she's sharing her food with another person, then she's likely to eat more and enjoy the food more than if she was just eating alone?

Mindy. Exactly.

Guy. Now I understand. So this is why you invited yourself to eat my lunch in front of your bathroom mirror.

Mindy. I told you I had a good reason.

Guy. You always do Mindy. But now...You owe me a salad.

Mindy. Uh-oh.

Mindy. See if you can get yourself to make one, Guy Raz. Mindy and I have lots to catch up on before we wrap up here. Mindy. Here I go again. Mindy, I just have to say your hair looks magnificent. Thanks, Mindy. That's because I've been combing it with a salad fork. No way. Yes way.

No way. Yes way. No way. Yes way. Ok. Mindy, don't take this the wrong way. But I kind of need some alone time. What?

Guy. Whoa.

Mindy. You need some alone time? I need some alone time. Ok, I knew you were going to say that. Oh, what? Now you're Just reading my mind? Mindy, we share the same mind. Oh, just because we're the same person? Right. Right, Ok. This is getting weird.

Guy. What in the world is going on here? Whoa, whoa, whoa.

Mindy. She started it, Guy Raz. Sorry. Promise to stick together forever, Mindy? We don't have a choice, Mindy. I Love you. I love you, too.

Guy. But now you owe me a salad.

(Soundbite of transition.)

Guy. Hey, Mindy. Have you heard of the word crypsis?

Mindy. Oh, yeah, Guy Raz. Let me tell you a story. So one time, I was eating a bucket of Crispus fried chicken. It was so big, I actually climbed inside the bucket. And then just when I was about to take my savory last bite, I fell asleep in the bucket, napped there for the rest of the afternoon. So yeah. I love some Crispus fried chicken.

Guy. No, no. I don't think that's a thing. I said crypsis.

Mindy. Oh, crypsis. Well, in that case, no. I've never heard of it.

Guy. Well, neither did I until recently, when I happened to come across that Word in a scientific journal. And a scientific journal is just a fancy way of describing a magazine for scientists and researchers. And the journal I was reading is called Behavioral Ecology.

Mindy. So what did this journal tell you about this crypsis business and why it's so hard to say?

Guy. Well, it sounds like a complicated word. But it's a word scientists use to describe an animal that hides or camouflages its body in the wild to, you know, protect itself from predators or other animals that might try to eat it.

Mindy. Oh. So crypsis is like when one of those cool lizards that looks like tree bark blends in with the trees so well that you can't see it?

Guy. Exactly.

Mindy. Or when a white arctic fox lands in with a bag of marshmallows in your pantry?

Guy. You got it, Mindy. That's crypsis, when an animal is able to blend into its environment to protect itself from harm.

Mindy. So why were you reading about crypsis anyway?

Guy. Well, I came across a very interesting discovery that has to do with a very specific animal and how it blends into its environment. And that animal is the panda.

Mindy. The panda?

Guy. Yeah, pandas.

Mindy. But what do pandas have to do with hiding? I mean, everyone knows a panda is pretty much the easiest creature to see.

Guy. Well that's what a team of scientists from the University of California, Davis and Cal State Long Beach also thought, Mindy. And the story begins when these scientists wanted to find out how pandas got their patches.

Mindy. Yeah, that's a good question. How did pandas get their patches?

Guy. Well, as you know, Mindy, pandas are some of the most unusual and beautiful creatures in the world. And they're only found in the wild in central China. And, as you know, Mindy, they have a white head and body but also black, furry spots around their eyes and then black, furry arms and legs. And these spots are what gives the giant panda a piebald appearance.

Mindy. A pie what?

Guy. Piebald.

Mindy. Guy Raz, first we're talking about crypsis, then patches - now bald pies?

Guy. Well, not exactly, Mindy. Piebald is a word we use to describe things that are two different colors. And, normally, we use the word piebald to describe animals that are light-colored with dark patches. So, for example, a horse with giant spots or a black and white cow.

Mindy. Or maybe a bald eagle?

Guy. Actually, Mindy, that's exactly right. A bald eagle usually has a White head, a brown body and then some White tail feathers. And the bald eagle was actually named after the word piebald. So was another bird called the magpie.

Mindy. Magpie.

Guy. That's right. And a magpie is a sweet, little, black-and-white bird that is a cousin of the crow.

Mindy. Huh. So, basically, a piebald animal is just an animal with patches of light and dark.

Guy. Yeah. That's an excellent way to think about it.

Mindy. So why do pandas even have patches anyway? Why aren't they like other bears, you know, like, all black or all white or all brown?

Guy. Well, that's what these scientists I mentioned earlier were trying to figure out. And after doing a lot of research, they came up with an interesting theory, which is an idea that is backed up by scientific evidence.

Mindy. So what's the theory?

Guy. Well, Mindy, the theory goes something like this. What do pandas eat?

Mindy. Well, if I were a panda, I would eat panda cakes. Get it? But I'm pretty sure they probably just eat bamboo.

Guy. That's right, Mindy. Bamboo. And bamboo is not particularly nutritious, so pandas have to eat a lot of bamboo every day just to have enough energy to walk around.

Mindy. Ok. But how does that make their fur black and white?

Guy. Well, Mindy, because pandas are constantly eating and constantly searching for food, they spend part of the year in cold and snowy mountains and then part of the year in dark bamboo forests. And their white fur allows them to hide from predators in snowy areas. And their dark patches make it easier for crypsis - or hiding - in a dark bamboo forest.

Mindy. But who would go after a panda? They're so cute.

Guy. Well, pandas are generally safe from most predators. But panda cubs are sometimes hunted by snow leopards. And, of course, humans can pose a danger to pandas, as well.

Mindy. Not cool, snow leopards and humans. By the way, Guy Raz, how do pandas tell each other apart? I mean, they all pretty much look exactly the same.

Guy. Well, to us humans, Mindy, they may look the same. But each panda has a unique or one-of-a-kind patch of black fur around their eyes. And that's one of the key ways they can figure out who's who.

Mindy. Or they could just wear different color panda-nnas. Get it?

Guy. Not really.

Mindy. Well, I thought it was pretty black and white. Get it? You like that, Peter Panda? He doesn't speak English.