## Slice of MIT Podcast | Travel to Costa Rica with your Ears

[SLICE OF MIT THEME MUSIC]

**ANNOUNCER:** You're listening to the Slice of MIT podcast, a production of the MIT Alumni Association.

[MONKEY HOWLING]

**TRAVELER 1:** There we go.

**TRAVELER 2:** Do it again.

**TRAVELER 1:** All right. On cue.

**MARTIN:** We're on the way to Monteverde, and we stopped to look at a group of howler monkeys that

are right in the tree next to the road.

[MONKEY HOWLING]

They're making a lot of noise and objecting to us looking at them.

**HOST:** That's Martin, an MIT graduate on a recent trip to Costa Rica as part of the Alumni Travel

Program. He spotted these howler monkeys as we were driving through farmland and jumped

out to take pictures, and have some laughs.

[LAUGHTER]

[IMITATING MONKEY HOWLING]

[MONKEYS HOWLING]

**TRAVELER 1:** Let them describe themselves.

**TRAVELER 3:** He's had a lot of Alka-Seltzer last night.

**HOST:** Back in November, a group of MIT alumni travelers took a full sensory tour of Costa Rica.

They enjoyed the sights--

**TRAVELER 4:** You see where the laser was?

**TRAVELER 5:** Yeah.

**TRAVELER 6:** Oh, oh my goodness.

**TRAVELER 4:** Now look straight up form the branch.

**TRAVELER 5:** I see them.

**HOST:** --tastes--

**TRAVELER 7:** This reminds me of lychee.

**VINDAS:** And that one, you can only eat one.

**TRAVELER 8:** What happens if you eat the seeds?

**VINDAS:** Nothing. Did you eat the seeds?

**TRAVELER 8:** I think so.

[LAUGHTER]

**HOST:** --smells--

**TRAVELER 9:** Oh, it smells good. I can smell it.

**ALAN:** It smelled like strong coffee.

**HOST:** --and sounds--

**MARTIN:** Wow. Just listening to them is neat.

**HOST:** --of this nature haven. In this episode of the Slice of MIT podcast, we take you on that full

sensory journey. You'll learn why an American Quaker left prison in the 1950s to start a Costa

Rican town, and his difficult journey to get there. Spoiler alert-- the story includes sharks. You'll

get a lesson in mechanical engineering while on a canopy bridge, and witness sloths,

monkeys, and alien-looking bugs. Stay with us.

[MUSIC PLAYING]

To get us started, here's an MIT cheer from schoolgirls we visited in a village school in the

northwestern part of the country.

SCHOOLGIRL 1: Massachusetts

**HOST:** Institute.

SCHOOLGIRL 2: Institute--

**HOST:** Of--

SCHOOLGIRL 3: Of--

**HOST:** Technology.

SCHOOLGIRL 4: Technology.

SCHOOL GIRLS: Massachusetts.

[LAUGHTER]

**HOST:** Thank you. Muchas gracias.

Today's episode of the *Slice of MIT Podcast* is produced in association with the MIT Alumni Travel Program. They offer more than 35 trips a year to destinations all over the world, many led by MIT faculty. And they're booking now for a safari to Botswana and Zambia, a rail program in New England, and a custom tour of Switzerland. Hold your spot by visiting alum.mit.edu/travel.

Costa Rica is a small country in Central America roughly the size of West Virginia. And it boasts more than 200 volcanoes. Our group of travelers visited one of those volcanoes right when the sun was coming out.

MAX VINDAS: All right, everybody. Walk straight up this road all the way up until you find a big hole. Please

stop right before you get to it.

**HOST:** This is Max Vindas, our tour guide for the trip. Poas Volcano was formed over a million years

ago. That big hole he pointed out, that's a caldera, a large volcanic crater that developed after

the volcano erupted. Even though the volcano is not currently erupting, smoke constantly

emanates from it. Travelers Martin, Paul, Frank, Craig, and Kitsy describe the view.

KITSY: It looked like a-- I don't know-- cloud bursting from the ground. It's incredible. It's beautiful. We

are so lucky to have this sky.

**HOST:** We sure are.

**KITSY:** It's amazing. If I'd come up here and it was pouring rain, I would have been just crushed.

**HOST:** Right. Beautiful, not even that many clouds in the sky.

**KITSY:** No. It's just like they knew we were coming.

**HOST:** Beauty aside, the Poas Volcano has a very unique smell.

**FRANK:** It stinks. It's sulphurous. That's why they have a little sign that says 20 minutes and leave.

**CRAIG:** We needed a volunteer to just jump in, just see what happens.

**MARTIN:** They don't teach us much volcanology in economics class, I'm afraid.

different shades of green, and white, misty clouds.

While Martin couldn't apply his economics degree to the volcano visit, Bob could easily connect his coursework to our trek in the northwestern part of Costa Rica. Now let me pause and set the scene for you. Our traveling group visited the Monteverde Cloud Forest. Cloud

forest's like this one are named for the low-level clouds that hang just above the treetops.

And to get from one part of the rainforest to the next, travelers cross canopy bridges. Think long, U-shaped suspension bridges sometimes made of wood and ropes. The longest one on our trek was 984 feet and allowed our group up-close views of birds, diverse trees in all

Oh, yeah, and walking on them can be difficult. Now if you're an MIT grad, walking across one of these bridges brings up lessons in physics and mechanical engineering. Bob can still recall a lesson on resonant frequency from his time at MIT.

**BOB:** The frequency, or the resonant frequency, depends on the length of the cable and the

amplitude in which you pull it apart from the at rest position. And as it's allowed to reach its own movement, it will move the same distance above and below or left to right of the center

line. And it will go on and on and on.

It would go on forever if there was no friction. And it dies out due to the friction of the air. But it has a natural resonance. No matter who pulls it or anything, it will always vibrate at the same time, just like the strings of a piano.

**HOST:** But if our group of 19 was to march in step across the bridge, it would have the potential to

vibrate and sway even more than it was already doing. This is what happened with the

Millennium Bridge in London when it was first installed.

**PETER:** You're discovering firsthand why armies don't march over bridges in step. Bridges have

actually been brought down by that.

**HOST:** All this talk of classroom lessons made me ask Peter, does it remind you in any connection to

MIT, this experience?

**PETER:** Not at the moment. IDHTFP. I don't.

**HOST:** Let's take a detour for a moment and focus on music from nature.

VINDAS: OK. Let's go now. It's our turn.

[WHISTLING]

**VINDAS:** They're now in front of us here. See them?

**HOST:** That's all of us whistling. Max, our tour guide, had discovered a tree full of barbets. And we

were attempting to interact with them.

[BIRDS CALLING]

**TRAVELER 10:** Wow. Just listening to them is neat. Yep. There it is. Look at this one.

**HOST:** This is a typical activity in a country that's home to more than 800 species of birds. And one of

those birds is the black-faced solitaire. Throughout the trip, our group heard the lyrical call of

the slate gray crooner.

**VINDAS:** It sounds like a very melodic squeaky gate.

[AMBIENT SOUND]

**HOST:** Sometimes our bird sightings were more abrupt.

VINDAS: Quetzal, quetzal.

**TRAVELER 11:** See it or just hear it?

TRAVELER 12: Hear it.

**HOST:** We had just caught a glimpse of the resplendent quetzal.

[WHISTLING]

**HOST:** The trip was a birder's delight. We spotted wading birds, egrets, herons, storks, fiery-throated

hummingbirds, toucans, and bright red macaws, just to name a few. Paul and Susan shared

the results of their bird counts.

**SUSAN:** We've been keeping track of all the birds that we're seeing, and we're over 100 now.

**PAUL:** I think so. I'll have to recount.

**SUSAN:** We're well over 100. And I think maybe three of them are migrants that we see at home.

**PAUL:** No, more than that. But still.

**SUSAN:** But not many, not many more.

**PAUL:** Not many more.

**SUSAN:** So it's very exciting.

**PAUL:** Yeah, all these new birds.

**SUSAN:** To see all the new birds, to see the animals, to see the monkeys.

**HOST:** For many travelers, spotting a new animal for the first time was momentous.

**VICKY:** This is the first sloth of my life.

**TRAVELER 13:** OK. Who can count his toes--two or three?

**VICKY:** We should all look. It's the real thing.

**HOST:** That's Vicky. Her goal of the trip was to see a sloth. And Costa Rica didn't disappoint.

**VICKY:** One, two, third branches off to the left. He's just hanging there.

**HOST:** Can you see his face?

**VICKY:** He's swinging a little bit. He's moving a little bit.

**HOST:** Sloths are furry, monkey-like mammals that hang from trees and feed off leaves. They move

very slowly. The sloth we had spotted, turns out it wasn't a he at all.

**TRAVELER 14:** Baby, baby, baby. It's got a baby.

**TRAVELER 15:** She's climbing backwards down the tree with her baby on her tummy, but she's turning around

so we can't-- to hide the baby, to preserve, keep the baby nice and safe and out of sight. But

she is moving incredibly fast, which is giving us a tremendous number of shots, good pictures

from a variety of perspectives.

**HOST:** We also got pretty close to another Costa Rican animal, this one much faster moving.

**VINDAS:** White-faced capuchin.

[CHATTER]

**TRAVELERS:** Whoa. There he is, right there.

Great entrance.

[CHATTER]

**TRAVELERS:** Oh, yes, where the branch is-- hopping across that way, going up.

[CHATTER]

TRAVELERS: Wow.

**HOST:** The monkey had climbed down to the bottom of the branch and stared right at all of us.

**VINDAS:** That's a well-trained monkey.

BOB: OK. Who's got the bananas?

VICKY: I ate mine.

**HOST:** Bananas are also a popular treat for another common creature in Costa Rica, butterflies. Of

the 20,000 known species of butterflies in the world, an estimated 10% live in Costa Rica

alone. At the butterfly sanctuaries we visited, these beauties snacked on fermented bananas.

**TRAVELER 18:** Oh, yeah. They're all over. Well, one landed at my finger. I guess it looked like a piece of

rotting banana.

**FRANK:** I'm seeing lots of blue morphs, and nobody's sitting still long enough for a picture.

**HOST:** Frank is describing the famous blue morph butterfly with bland dirt brown outside wings when

it's at rest. But when it opens its wings, it shows off an entirely different color.

**FRANK:** Azure? I don't know. Like a nice, clear aqua. Just sitting there being astonishingly gorgeous.

**HOST:** Lois summarizes her love of butterflies this way.

**LOIS:** I said if there weren't butterflies in heaven, I didn't want to go. But I'm paraphrasing Ben

Franklin because he said if there wasn't beer in heaven, he didn't want to go.

**HOST:** Other creatures we spotted evoke different reactions.

**LORI:** That's a crazy looking critter.

**HOST:** What color is it?

**LORI:** It's white with sort of brownish, blackish spots and sort of greenish, like a pale greenish all

over. And it looks like it's got spiky things coming out of it. I've never seen anything like that.

**HOST:** Lori is talking about the katydid bug we had spotted at the start of our nature hike. All of us

crowded around the scope to take a look at this alien-like critter.

**LORI:** It looks like something from outer space.

**TRAVELER 18:** It almost looks more like a seahorse.

LORI: Yes.

**HOST:** All of this excitement gave travelers Peter and Sonia a moment to reflect.

**PETER:** On most of these tours, the group has generally been interested in big things. And on this tour,

they're excited about a bug. And that makes it unique and very pleasant. Sonia and I are

always the ones that are excited about everything-- plants, animals, insects, whatever. And we

seldom have any company.

**HOST:** 

While a small insect taught us the atypical sensibilities of our own tour group, a meeting with pioneer Marvin Rockwell taught us a different lesson-- how to persevere despite seemingly endless obstacles. At well over six feet tall, Marvin has a quiet yet smiley demeanor. And he speaks with a slow matter-of-factness that reveals an Alabama twang. He's 93. And he has a prison record.

**MARVIN** 

So we were arrested and sentenced to a year and a day in prison.

ROCKWELL:

**HOST:** Marvin is a Quaker. And because of his religion, he and several Quakers from Fair Hope,

Alabama refused to register for the draft required under the US Universal Military Training Act of 1948. The group ended up serving a third of their sentences in an American prison and got

out on good behavior-- no surprise there.

**MARVIN** 

ROCKWELL:

So after we were released from prison, we and others in the Meeting got to talking about it and

decided, well, maybe we ought to leave the United States, see if we can find someplace a little

less militaristic.

**HOST:** And they were attracted to Costa Rica's stable government and economy. But most

importantly, in 1948, the country had decided to abolish its army, under the leadership of

President Jose Figueres Ferrer, a 1926 MIT alumnus himself. Costa Rica actually re-allocated

its military budget to education and now boasts the highest literacy rate in all of Latin America.

On October 27, 1950, Marvin left with his sister's family and all of their possessions. They

caravaned down in a truck and a Jeep through Mexico, Guatemala, El Salvador, and

Nicaragua.

**MARVIN** Well, my sister and two nieces slept on the load of things in the back of the truck. And the rest

**ROCKWELL:** of us set up camp cots on the ground around to sleep.

**HOST:** Because of problems with export licenses, customs agents, and no real roads in Nicaragua,

they didn't actually arrive at the border of Costa Rica until New Year's Day, 1951. The journey

had taken 66 days. And nearly half of that time was just spent traveling 12 miles through

Nicaragua.

**MARVIN** Well, we crossed the border into Costa Rica on January 1, 1951. And we drove a couple

**ROCKWELL:** hundred yards. The truck got stuck in the mud.

**HOST:** The group decided to set up camp by the nearby river and go swimming.

**MARVIN** When we came up from going swimming, a man said, you better not swim in that river. There's

**ROCKWELL:** sharks in the river. Sharks in the river? We thought we must have misunderstood him. Next

morning, we went down, saw this fin going up the river and back down. Yes, there are sharks

in that river.

**HOST:** They had swam in a river connected to Lake Nicaragua, the only place in the world where

freshwater sharks live. Despite the sharks, the delays, the rain, and the mud, Marvin's group

kept going. When I asked him if he ever worried he had made a mistake trekking to Costa

Rica, he simply said--

**MARVIN** Well, no, we had faith that we could make out.

ROCKWELL:

**HOST:** After more months of travel, they did eventually make out. The group purchased a tract of

3,400 acres in the northwestern part of Costa Rica. They named the town Monteverde, literally

mountain green in Spanish, after the lush, green, mountainous landscape.

MARVIN So when we founded Monteverde, we were 11 families, 44 persons. Of the original 44, there's

**ROCKWELL:** still six of us.

**HOST:** The group set about building their town. When it came time to think about ways to raise

money, they decided to produce cheese. And they raised calves for the milk. They purchased

50 Guernsey heifer calves. And they actually brought them to Monteverde a few at a time in a

Jeep. And they built a little factory with a secondhand, wood burning boiler to pasteurize the

milk. For the cheese molds, they decided to get a little creative.

**MARVIN** For molds, we used Quaker oats cans.

ROCKWELL:

**HOST:** Monteverde Cheese Company now produces over 8,000 pounds of cheese a day.

MARVIN Cheddar, sharp cheddar, smoked cheddar, gouda, emmental, edam, baby Swiss, smoked

**ROCKWELL:** provolone, Parmesan, manchego.

**HOST:** The area is now known for its locally made cheeses. So the lesson here?

**MARVIN** Live according to your convictions and have faith.

**ROCKWELL:** 

**HOST:** 

The pioneers' belief was to make their area a little better than they found it. The group is responsible for taking part in conservation efforts that now include thousands of acres of protected land used for national parks and rainforest preserves. Craig explains.

**CRAIG:** 

They started a conservation reserve here that's now enlarged to 100,000 acres of land that will change the history of this country. His life was so powerful, and this is a story where one person can make a huge difference.

**HOST:** 

Now, more than 25% of Costa Rica's landscape is dedicated to wildlife preserves and parks. Costa Ricans and tourists alike can spot a sloth for the first time, listen to the melodious black-faced solitaire, or compete in a howling contest with the country's howling monkeys. And behind those preserves are many more Marvins, Costa Ricans determined to protecting their natural riches for everyone to enjoy. No doubt the country will continue to attract equally enthusiastic tourists like the MIT Alumni Group, folks that are excited by the littlest outer space bug, the breathtaking volcanoes, and the inspirational stories of others that have made this world a better place.

That's it for this month's *Slice of MIT Podcast*. Where have you traveled with the MIT Alumni Travel Program? Tweet us @mit\_alumni.

Check out our website for photos of many of the stories from this trip. Many thanks to Max and all 19 travelers of the MIT group as well as the MIT Alumni Travel Program for their comments, enthusiasm, and sense of humor. You were fantastic travel buddies.

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[SLICE OF MIT THEME MUSIC]