

How the Mind Can Exist in a Physical Universe

By Stefani Nellen (originally published in AGNI)

Stefan asked me to hold his hand while he emailed the research proposal.

“Does it look good?” His hand was hard and warm. He could snuff out a candle-flame by making a fist around it.

“It looks good,” I said. I did not understand the mathematics very well, but my English was better than his, and I had proofread the thing many times. The title was *Almost Complete Sets*.

“Do it. Then let’s go out and get drunk.”

The whole night he kept talking about *them*: the two men who would read his proposal. Monroe and Kelling. Mathematicians and computer scientists, both in their sixties, famous for having written a book called *Natural Induction*. They were said to have one mind split between two bodies. Stefan had shown me pictures of the two of them, always together, first young, then ageing, and always talking.

We ordered another beer and the sausage platter. It was close to two in the morning, and Stefani asked me to take his hand again.

“I want to be in the same room with them and hear them talk,” he said. “Or just watch them breathe or sleep. Anything.”

“You will.” I picked out a piece of bread from the basket, dragged it through the pork fat, and bit into it.

“If this works out, it will be because of you. You helped me so much. You’re a genius. Come with me. At least for a few weeks, until you have to teach again. We could be like them, you know? We could work together.”

“Let’s see what they say first.”

The reply came the next day. Becky, the administrative assistant Monroe and Kelling seemed to share, wrote: *We would be happy to have you. What is your funding situation?*

Stefan had a small scholarship and a little savings. Enough to stay in Pittsburgh, Pennsylvania, USA, for six months. He jumped away from the computer and onto the bed.

“Yes!” He braced himself with one arm against the ceiling and bounced on the mattress. “I want to drink! I want to suck everything out of their minds until I puke! I want these guys. I want both of them. I want them in my bed.”

I climbed up to him. “Will I do for now?”

“Come with me,” he said. “Say yes.”

On our second day in Pittsburgh, Monroe and Kelling took us out to dinner. They arrived together in a long, low car that looked as if it could float and soar. Monroe was driving. Kelling wore a beige linen suit and light leather shoes. His face was smooth and his gray curls neatly cropped, as if he hadn’t changed his hairstyle since he was a boy. Monroe’s face was wild and alive, with rolling eyes, thick eyebrows, and full lips. He wore khakis and running shoes and a short-sleeved orange shirt.

The heat felt strange on my legs and shoulders. It was late May and already as hot as our summers in Germany. And a thunderstorm was coming, ominous clouds drifting in from the east.

Kelling sat next to me in the back, behind Monroe. “Did you bring any kitchen appliances from overseas?” Kelling asked.

“Like our favorite coffee grinder?”

“We didn’t bring anything,” Stefan said. “The currency is different in the States.” He said “the States” as if he came here all the time.

“You mean current,” I said.

“Yes.” He turned to look at both Kelling and Monroe. “It’s not as if Mira is a housewife or something. She helped me with the proposal. We basically wrote it together.”

“That’s nice,” Monroe said.

We drove past a fake Greek temple, a fake medieval castle, a fake hacienda. The road was winding and rising and falling, and there didn’t seem to be a beginning or an end to it. The sky grew dark, and thunder was rumbling.

“So what would each of you take if you went to live somewhere else for half a year?” I asked the two Americans.

“I’d take a scalpel,” Kelling said, “so I could perform experiments on myself. I read somewhere that organs, healthy organs, are beautiful.”

“I could eat, guys,” Monroe said. “What about you?”

I wondered whether Monroe and Kelling were a couple. But Monroe was married and had a son. Stefan had shown me his web- site. Monroe’s wife looked young enough to be his daughter. Stefan said she looked like me.

The car was a manual transmission, and at each of the many intersections Monroe stopped and started with a bump. “We’re going to the Rock Bottom,” he said.

“They have great burgers,” Kelling said. “But since I’m in my golden years, I’ll get the senior special.”

“You used to glorify old age when we were young.” Monroe said.

Kelling brushed the sleeves of his suit with the back of his hand. “I didn’t know it would be like this.”

The Rock Bottom was at the Waterfront, a mini-village of shops and restaurants on the bank of the Monongahela River. When we got out of the car, the sky looked ready to attack. Cold gusts of wind hit us, and the air smelled of rain. At the center of the parking lot stood a pole with the largest American flag we had seen so far, the stars like menacing eyes.

“Is it true that the flags here have to be taken down for the night?” Stefan said.

“Don’t say flags,” Monroe said. “Just say ‘the flag.’”

“Sorry,” Stefan said.

“Right, someone should take it down,” Kelling said. “Make sure it’s protected. Like *The Book of the Sikh*. You remember?”

“A book with a bedroom,” Monroe said. “A book with a bed.” Lukewarm raindrops began hitting our skin. Kelling turned to Stefan and me.” We should probably go inside.”

“Sorry, guys,” said the girl with the headset. “We don’t have any tables right now. We can put you on the list.” She handed Stefan a flat, blinking gadget that looked as if it was made for blowing up pretend mines in a kids’ war game. “We’ll page ya when we’re ready for ya!” she said.

Stefan turned the plastic detonator in his fingers. “Do I need to do anything?”

“Nope. Have fun, guys. Next in line?”

“So will it start to purr when we stop paying attention?” Kelling said. “Like Schrödinger's Cat?”

“Excuse me?” the girl said, getting a little annoyed.

“Do you have an estimate for when you'll be ready?” Monroe said.

“Half hour, maybe? Next.”

We stood under the awning of a women's clothing store for women who had somehow skipped puberty. The largest open store we could see was a place called Dick's Sporting Goods.

The rain was coming down in sheets now, but no one seemed to be upset about it except me. “Let's go to this Dick's place,” I dared to say. By now, I was the one carrying the pager.

“I'm getting cold.”

The store was vast and bright and smelled of rubber and synthetic fabric, with baseball bats and running shoes and basketballs and ice skates and tennis rackets displayed in long rows. A baseball game was playing on a muted screen on the wall. The players were the only moving things in the store.

“Look at that,” Monroe said, approaching a display of cereal bars. “It looks like an almost complete set.”

“Did you know cereal bars may be used for many things?” Kelling said. “I use them to prop up my bookshelf.”

“And look at this.” Monroe lifted a running shoe from the rack next to the bars, a black shoe with purple stitching.

“Are you a runner?” Stefan asked.

“My wife is,” Monroe said. “I trot along.”

“What happens is, you walk around the block together,” Kelling said. “Then you go inside, and Charlotte starts her run. You told me.”

“Then it must be the truth.”

Stefan was training for a marathon, so I knew what direction the conversation would take now. Kelling didn’t look like he was listening, either. His eyes were half closed and his mouth half open, as if he were gathering his thoughts. The pager in my hand started buzzing and flashing lights.

Monroe froze. “What is that? Turn it off!” He looked at me, hostile and frightened. “And who are you? Do you work here?”

At the Rock Bottom we sat in one of approximately a thousand booths, all upholstered in ale-colored leather. Stefan and I sat opposite Monroe and Kelling. The air conditioning was turned up high, and, damp now, I wished I’d brought a jacket. The waitress placed our food before us. I had ordered a *mouth-watering, home made barbecue honey chicken burger topped of with sizzling onions and our secret sauce*. I took a bite and chewed. Kelling and Monroe had not touched their soups.

“I’ve been noticing that something is wrong with me for a while,” Monroe said. “Little things, like forgetting my keys or losing my train of thought, and it gradually got worse. And then, these lapses. Like waking up from a dream, only you’re not in your bed. And you.” He turned to Kelling. “You didn’t say a thing!”

“I didn’t notice. Probably I didn’t want to.”

Monroe turned back to Stefan. “I got the diagnosis in March. I probably should not have accepted your proposal, considering.”

“You sounded as if you were passionate,” Kelling said to Stefan.

“Yes,” Monroe said. “And the idea was—and maybe it was egotistical of me, or of us—”

“Definitely—”

“The idea was to do as much as possible for as long as possible. Did I already say that?”

We laughed uncomfortably.

“We’re both glad we could come,” Stefan said. “Right?”

“Yes,” I said.

“The prognosis isn’t great,” Monroe went on, “but the way we work, we figured . . . we figured the other can always take over.” He turned to Kelling. “You can take over, right?”

“Stefan will be here six months. Nothing much will change in six months.”

“But you could take over.”

Kelling began to stir his soup, finally.

“We’re really the same person,” Monroe said. “In that sense, nothing will change.”

“Nonsense,” Kelling said. “Everything will change.”

After dinner, Monroe and Kelling ordered a sampler of artisanal beers, and Monroe walked Stefan through the conceptual steps of the proof they wanted to work on. They started sketching things on napkins, spilling beer, and dipping bread in the same bowl of soup. Monroe was clearly showing off, and Stefan joined him, talking rapidly, interrupting, apologizing, and nodding eagerly as Monroe wrote. Kelling picked up one of the discarded napkins and studied it. I was

shivering and my teeth were chattering; he noticed and offered me the jacket he had taken off and hung up to dry. Monroe asked for the check.

The parking lot was well lit, and there was soft music coming from small speakers in the flowerbeds. The water on the car had beaded into little islands. Monroe played with his keys, jingling them between his fingers. He looked older again in this light, as if dinner had drained him.

“I haven’t told anyone yet,” he said to Stefan and me, “only you. There’s still the department, our colleagues, the funding agencies—well, screw them. There’s Charlotte. And our son. Oh, boy.” He shifted the keys on his palm with his thumb. “So many people counting on *this*,” he pointed at his head, “and it’s not working.”

It was a hard moment to witness, the way watching my mother and then my father die had been hard, and yet a small, icy part of me vowed that I would be walking out of here alive and that was all that counted.

“Do you drive?” Monroe asked Stefan. “Maybe you could drive us home.”

I sat next to Stefan, with Monroe and Kelling in the back. The keys were in the ignition, but Stefan took his time inspecting the dials and adjusting the mirrors. He touched the stick and moved it lightly in place, then checked the pedals. “Here we go,” he said. “Ignition.” He backed out in one smooth, continuous motion, making as tight a turn as possible and barely avoiding the car parked on our left. He then shifted gears without a hitch and we were on the way.

“Do you know where we need to go?” I said.

“Sure.” He glanced in the rearview mirror before changing lanes.

“How can you remember the way?” I said. “I have no idea.”

“It comes with being a driver. You watch the road differently.”

As we made our way back along the winding road, past illuminated houses and golden streetlights, Monroe started talking to us. His voice was soft, and he sounded as if he were talking in his sleep. “If there’s one thing I regret, it’s that I won’t have a chance to think about the final mystery,” he said. “We used to wonder whether machines could be intelligent, but we never understood the machines that *we* are. We are our mind. We’re everything we need, and desire, and fear, and remember.”

Then the only sound was that of the tires on the asphalt and a mild *thunk* when Stefan shifted gears. I turned around. Monroe and Kelling were holding hands.

Monroe’s house was large and stately, but it was dwarfed by the garden: flame-colored peonies, clouds of blue and white baby’s breath, climbing roses with buds as big as apples, plump succulents, a pillar of onion grass. This garden was an army of beauty. Crickets were chirping and two lamps shone next to the front door, swarmed by moths.

“Are you okay leaving the car here and walking home?” Kelling said to Stefan and me. “I’m going to walk to my house.”

“We’ll be fine,” I said. I heard footsteps crunching on the pavement: a runner. I recognized her from the pictures Stefan had shown me. From up close, she looked older, with lines around her mouth and eyes, but she wore her hair in a high ponytail like a girl’s.

“Hey there, guys.” She wiped the sweat off her chin with her fingers and thumb. She had veiny hands. “Back already?”

“Charlotte,” Monroe said. “Our guests from Germany.”

“Nice to meet you. Sorry I’m so gross and sweaty. You must be jetlagged. You want to come in, have a drink? Chip’s almost done with the kitchen. You want to say hi?” Chip was Monroe’s son. I wondered what he was doing to the kitchen.

“Actually, I’ll be heading home,” Kelling said. “It’s past my bed-time. Say hi to Chip for me.” He turned to us. “It was a pleasure meeting you. I guess I’ll see you tomorrow?” Without waiting for a reply, he turned and walked away, both hands in his pockets, the suede patches on his elbows eyeing us.

“You’re staying, right?” Charlotte said to Monroe.

“I’m sorry,” he said, “I need to go, too. We were talking about some problems at dinner, and you know how it is . . .”

“The work.” Charlotte put her hands on her hips and pushed back her elbows, highlighting the nubs of her clavicle and the shape of her nipples. Her armpits were stubbly.

“I’m sorry. I’d be useless here anyway.”

Stefan handed Monroe the car key, and Monroe put it in the front pocket of his shirt.

“Take that offer of a drink, will you?” Monroe said to us.

We watched him leave. Monroe also walked with his hands in his pockets, but faster than Kelling.

“He’s superstitious,” Charlotte said. “*Work* only works at Kelling’s place. Come on in.” She started for the house before we could answer.

The foyer was larger than Stefan’s new apartment, and to the left and right were sitting rooms with polished wooden floors and heavy furniture. In a corner of the room on the left was a

hanging bamboo chair, and in the chair, one leg folded under the other, sat a boy who looked about eighteen years old, reading a book.

“I’m going to take a shower,” Charlotte said. “Chip, will you give our guests a snack and something to drink? They’re from Germany.”

“Where’s Dad?” He didn’t look up.

“Working.”

“Surprise,” Chip said, now to us, and got up. “I’m Chip. Nice meeting you. Let’s sit outside, the kitchen is a mess. What do you guys want to drink?”

“Just water,” we said.

“Follow me.” I noted the book he’d left in the chair: *Natural Induction*.

The kitchen smelled of fresh paint, and the furniture was covered in plastic held in place by blue masking tape.

“You’ve been painting all on your own?” I said.

“I like to keep busy.” He filled a carafe with water from the tap and put it on a tray along with some glasses. “Fruit,” he said, reaching for a bowl of Granny Smiths. “Peanuts. Are you allergic? No? Peanuts. Where are the peanuts?” He parted the plastic and opened the top cabinets to peek inside. He was barefoot and wore baggy shorts and had a smear of paint on the back of his calf. His hair and skin were the same color as Charlotte’s, his lips as full as Monroe’s. I didn’t dare to look at him too long, he was so beautiful.

“Why don’t you go sit outside on the porch,” he said. “It’s that way. I’ll be right out.”

The backyard was surrounded by shrubs and Rhododendrons that had not been cut in a long time. A torn hammock hung from a chestnut tree. Fireflies hovered, larger than I’d

imagined them to be; I had imagined them as sparks, bright and fast, but they pulsed gently and regularly, as if passing along a message.

I sat in a wicker chair, Stefan in the porch swing opposite me. “He’s gorgeous, don’t you think?” I said in German.

Stefan nudged the ground with his toes and started to swing almost imperceptibly.

“And a mathematician, too,” I said. “Did you see the book he was reading?”

“Why are you telling me this?”

“I’m not like Kelling. I *do* notice things. I know what you want.”

“And what is that?”

“You want what they have.”

“Yes. With you.”

I shook my head. “I was always a stand-in. And I got you here. Now I want to go home. He can take over, don’t you think?”

Chip came back with the tray and set it down on the low table between us. He sat on the swing next to Stefan.

“It’s beautiful out here,” I said.

“The yard is mostly Mom’s thing,” Chip said. “She’s obsessed with plants.”

Stefan crossed his legs and gazed up at the sky, which had cleared, with several constellations visible despite the light from the house.

“You must have had a lot of overseas visitors,” I said.

“Yeah, I guess. Dad invites a lot of people. And then he leaves.”

“Your father is brilliant,” Stefan said. “He and Kelling are a great team. They are really more than just two people.” He turned to me. “Can you say it like that?”

“You can,” I said.

A firefly hovered over the table. Chip emptied his glass and trapped the firefly. Now it was only an insect. “I think I know what’s going on,” he said. “With him and Kelling.”

“What do you mean?” I said.

“The quote-unquote work. Always at Kelling’s place. You guys are Europeans. You get it, right?”

The firefly under the glass was crawling around the seal between the rim and the table, seeking a way out.

“Should we tell him the truth?” I said in German.

“About what?” Stefan said.

“The disease.”

“No way.”

“Did I offend you?” Chip said.

“Don’t worry,” I said. To Stefan, I said in German: “I think Monroe wanted us to tell them. He told us to stay and have a drink, and then he ran off.”

“Are you talking about me or my dad?” Chip lifted the glass. The firefly had stopped glowing.

“Sorry,” I said, “It’s rude of us to speak German in front of you.”

“No, I like the sound.” The firefly crawled towards the edge of the table, and took off.

In German, Stefan said: “I want the six months. I don’t want to think about the rest.”

I picked up an apple and weighed it in my hands.

Chip leaned forward. “Guys,” he said, “I told you, I already know. It’s no big deal.” He

was bluffing. He didn't know anything, he only suspected. He looked far younger than his father, obviously, but so similar: the wide eyes, the stubborn nose. The lips.

After a while, Charlotte came out to join us wearing jeans and a white men's button-down shirt with cuffs, her shirttails out. Her hair fell long and slick on her shoulders. She sat down in a wicker chair next to me. "So quiet?"

Chip pushed the glass bowl towards her. "Have some peanuts, mom."

She reached for the peanuts with her eyes closed and brought them, one by one between her fingertips, to her mouth. "So here we are. Holding down the fort."

"I need to tell you something," I said, "about your husband."

"I thought you might. Don't tell me just yet." She leaned back in the chair and inhaled. "It's nice and quiet out here." She sounded half asleep. The fireflies were pulsing in the darkness as if there were an infinite number of them and as if it could not be dark forever.