

Trapped with Robots

Kate Murphy

What do you think when I say “Robots”? Do you think about the Terminator or Terminator 2? Well that’s cool, but that is not what I think. Well then, what do I think? Two words, “trapped” and “mom.” Why? Let me tell you.

Imagine that you are trapped under a bed in a very messy room. The reason that it is a pig-sty is because an earthquake has hit your city and ruined your home. You’re trapped under the bed, and nobody can get to you. Can’t imagine that? Well, think about the movie *Twister* when the tornado hit Joe’s aunt’s house and trapped her so she couldn’t get out.

That’s where my mom comes in with her robots.

Yes, robots! My mom bought a Power Wheels toy jeep from Toys ‘R Us, and then made it into a search-and-rescue robot called Silver Bullet. Silver Bullet has about \$20,000 of circuits, computers, cameras, and sensors. She (all of my mom’s robots are female) can operate by herself, so when something happens to a building and humans can’t get in, she can. She carries a “baby” robot and then when she gets to a place where she can’t get in, she lets out her baby.

Yes, her baby! As I said, the mother robot lets out a baby robot, just like a kangaroo mommy carries her joey and lets the joey out. The joey robot is named Bujold. Bujold has cameras for eyes to see somebody or something. She doesn’t have a computer, so she has a tether to Silver Bullet. Grad students like Jenn Casper and Aaron Gage can radio Silver Bullet, who sends the directions to Bujold through the tether.

My job is to pretend I’m injured and trapped in an earthquake and then get rescued by Bujold. You could say that I have an acting career, but it’s not like I’m Drew Barrymore or Lisa Kudrow. Also being in robot demos is nowhere near being in movies, but it is nice to think of that. It is fun to work for my mom because I go to places that I would never dream of, I get to be on TV and in magazines, and when I meet people I get to tell the most amazing life story.

What I do is really just an easy trick that some dogs can do: Play Dead. Mom asks me to be the victim because I’m small and can fit in hard-to-get-to places. Also, she needs a live person because they give off heat, so Silver Bullet can see the person with her heat sensor and drop off Bujold. If we’re in Tampa, mom has me hide under a bed that used to be mine in a “search and rescue” room at her laboratory. If I’m with mom at a robot conference, I might lie down under a table or be covered up with stuff that looks like sheet rock. The trick to doing this is to just lay down and not make a sound. This can be hard if you have so much you want to say. I recommend thinking of all the fun things you have done and want to do again, and to try not to fall asleep.

Oh, the Places You’ll Go is a good book, and I can really relate to it. I have gone to some really awesome places like Montreal, Canada, and Portland, Oregon, for the AAAI robot competitions. I have made some cool friends at these compe-

Katherine “Kate” Murphy, 1987–2005



Long-time participants in AAAI and IJCAI (International Joint Conference on AI) robotics competitions will surely remember Kate Murphy. Kate would accompany her mother, Robin, and help her demonstrate rescue robots in those events’ early days. Declared the unofficial mascot of many teams, Kate also had an onstage role as the “rescue victim” in many of her mom’s demos, something she wrote about in a short book chapter¹ she published,

at age 12, and which we reproduce here with the kind permission of Academic Press: a tribute in her own words to this delightful young woman who helped make the robotics competitions a success, in her own inimitable way. Kate passed away on 23 January 2005 from complications of a kidney defect, a tragic loss not just to her family and friends but to all of us who remember her backstage warmth, wit, and enthusiasm.

—James Hendler

Reference

1. K. Murphy, “Trapped with Robots,” *Robots for Kids: Exploring New Technologies for Learning*, A. Druin and J. Hendler, eds., Academic Press, 2000, pp. 293–296.

titions, but most of them are not kids. There's rarely any kids, but there's a lot of really neat and smart adults who I want to be like. I love going with my mom on these trips because of how I am helping out.

I have gotten my fair share of publicity (what is a fair share I don't know, but who's counting?). I have been on an Austrian TV show and the local news. I was in some AI magazines a few times. I found out I was more famous than I thought. In the summer of '99, I was lucky enough to go to Space Camp. That was about a week after one of the robot competitions in Orlando. One of the counselors had seen it on the day that I was there with my mom doing my "survivor" act. One day he started talking to my group, "When I was in Orlando, I saw a little girl and her mother with robots. The mother was talking and the girl was playing dead while the robots were trying to find her." As I was leaving his talk, he said, "Oh Kate, the girl looked like you." And I said, "It was me!"

One of the many things I've learned is that nobody is perfect doing anything all the time, even robots. So yes, I have gotten "Robo Boo-Boos." I remember one time when one of the students was working with Bujold and drove her right at me. Bujold kept on going and hit me in the arm. The robots will do that from time to time when they are being teleoperated and the driver can't see me very well. Mom and her students want to make Bujold autonomous so it won't bump into people, but seeing distances is hard. When you get hurt, the best thing to do is to make a joke out of it, because the person probably didn't mean to. If you don't get up and yell, he or she won't feel really bad over some little scrape.

Weird is what I am sometimes called by my schoolmates. Some times you can tell when it is a joke. But when it is not, I just think that at least I know what is happening in the world and what we can do to help people. And they'll be the ones working at McDonald's.



Technically, I'm not trapped with robots, they just trap me into working with them because they're fun to be with. You may see robots as bad evil creatures in the movies, but in real life they are good and can save your life. With robots you get a better view of what's to come in the future. And robots have made me more interested in becoming a scientist. ■

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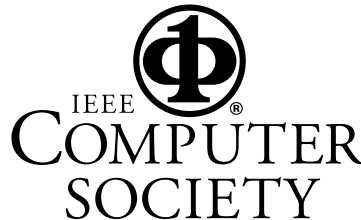
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