



The Bulletin
msgsQ&A

***Mathematics and Statistics
Graduate Students Association***

Although time machines do not exist (I'm still holding out hope), people engage in a form of time travel all the time. Except rather than happening in a neon lit vehicle on a rain drenched night with a grumpy frizzy white haired person straining to turn the lever on, it occurs in the recesses of our minds. We find ourselves thinking about "What could've been!". In the jargon of Psychology, it is called 'counterfactual reflection'. There is a certain glory and gore to think about such a scenario.

This month we are asking the members of our department about where they would've ended up career wise if they had chosen a different path. The answers that we have gleaned through the interviews give us a chance to peek at how their individual jigsaw puzzles would have looked like had the pieces been arranged a bit differently. For a quite a few, even though those past interests have not earned professional validation, they have evolved into hobbies on the side, so there is a sense of co-existing realities.

This issue would not have been possible without our very considerate interviewees, a big shout out to you all. Kudos to our resident matriarch Maria for shaping the clay of ideas and interviews into the current edition. I also extend my heartfelt thanks to my partners in crime, Eswar and Abhishek, for doing a lot of the heavy lifting.

Before you start reading the interviews, I would like to remind you that MSGSA is organizing the Annual Christmas Holiday Party on the 1st of December. I implore everyone to attend. It ties with MSGSA's recent attempts at bringing people in our department together of which this bulletin is a part.

Happy Reading, Happy Weekend!

*Abhishek Guin,
Editor*



Dr Liz Stanwyck in Cozumel, Mexico

I tell my students that I still don't know what I want to become when I grow up! I am interested in everything -geology, bird watching, bird biology, the ocean, entomology.

I guess if I wasn't a statistician, I would be a scuba diving instructor or a marine biologist. This passion started 7 years ago, after I received my doctorate. I just wanted to go on adventures. Every summer, I like to visit a marine park in Cozumel, an island of Mexico, which is really beautiful and well protected. If you ever wanted to go to space as a kid, this will whet your appetite - it is completely alien. You can see all these forms of life that are completely different from what you observe on land.

It is also very precarious; when you are underwater you have to keep track of air consumption and the water pressure, so there are some calculations involved!

Moreover you get to meet exciting people. Last year I met the primary oceanographer of NOAA (National Oceanic and Atmospheric Administration) and he had very interesting stories about scuba diving in Alaska and seeing narwhals - the unicorn of the sea! Another cool thing is that you have the chance to visit shipwrecks and swim where people used to walk, view the galleys and the bedrooms and notice how the ocean has taken over the ship.

Scuba diving is a peaceful sport and nothing like you have seen before. The animals just move differently - it is fascinating! It is also a lot of fun, I would recommend it to everyone.



I don't really have to scour my brain too much to answer this question. I would have definitely been a psychologist pursuing a career as an actor. I have always been interested in understanding how people think, how they feel, why they react in a certain way to situation at hand, what differentiates each individual and how emotions affect our lives. I also feel that I have always been a good listener. It is easy for people to open up to me and I am always eager to understand and comfort people.

As far as acting is concerned, it has been a longstanding passion to boot. I think theater is the best form of art which requires one to be versed in its psychological aspect as well: you cannot portray a character if you do not completely understand it. I remember watching various theater performances and feeling that I want to be up there on the stage. I have memories of my childhood when I was trying to set up small performances with my cousins. I even wrote a scenario once! Later on, I actually took part in two plays. Till date, it has been one of the most memorable experiences of my life. I will never forget the feeling that I had when the performance was over and people started clapping with a big smile on their faces.



Maria Deliyanni in a traditional Cypriot attire for a play



Bradford Peercy
Professor, Mathematics

Hard to say for sure. My interests have always been along the lines of Mathematics and Biology. In my undergraduate, I majored in Mathematics with minors in Biology and Chemistry. I was initially inclined towards medical school. I enjoyed learning about the Biological and Physiological processes and how they worked. But the labs did not inspire me a whole lot. Towards the end of my undergrad, I got an opportunity to do a project that involved Mathematics and Biology. It was a modest project on statistical distribution of bone density. That probably triggered my shift to Mathematical Biology. It showed me that one does not necessarily have to go into the medical field to address these questions. So, I think if I had not pursued

a degree in mathematics, I most probably would have gone to medical school.

Outside of that, I represented my university soccer team during my undergraduate. I looked at it more as an opportunity to represent my university and visit other schools and never as a career option. Also, I played the piano and did a little bit of theatre growing up. I did plays and musicals, church choirs and things like that. After that I primarily sang in high school productions. I got to play King Arthur in Camelot, which was my senior production. I also played Tybalt in Romeo and Juliet. When I went to university, I thought about taking up theater, but it mostly involved people who were dedicated, like theatre majors, so I did not join in at that point.



If I were not into statistics, I would've liked to study law/history. It is an extremely interesting and intuitive subject for me. I used to think that if I am ever done with Stat and wanted to study something more, it would be Law. Instead of defending cases as a lawyer, I would love to understand the situations and circumstances that led to the creation of various laws. I think or may be I am convincing myself to believe that both disciplines share similar ethos, where we understand and learn from past data.



Rabab Elnaiem with her dad
PhD, Statistics

I cannot point out how and when this passion began - it is a part of who I am. I used to spend a lot of time watching documentaries and catching up with politics. I like digging back into the past and understanding what happened and why it has happened.

When I was a kid I liked both Math and Law/History. The strong relationship I have with my dad was also another reason for me to study Math. I remember that we used to have our fun time by doing long division together. My decision for choosing Statistics was mainly influenced by my dad and also because I feel that the society at large appreciates science over fine arts or history. I do not regret choosing statistics for my studies. In fact, I would not consider taking up Law as a profession since that sometimes might require a compromise of my beliefs and ethics which I am not willing to forego.



Prof. DoHwan Park with her daughter Julia, at Observation deck on 121st floor Lotte Tower Seoul, Korea

I have been doing Statistics since my undergraduate days, it has been so long now that I can't imagine myself being engaged in something else. If I were to think of an alternate job, I would really enjoy being a meditation instructor. We spend a lot of time thinking about research and meditation is the time when we can relax. Just like a good night's sleep infuses us with a lot of energy to expend during working hours, meditation as a routine in the midst of a workday helps us to be more focused and productive.

In fact, while thinking about this question, an image popped in my head of me being in 3rd grade and saying that when I grow up I want to be a mom!

I really don't remember why I wanted that, but mostly I believe it was because of my relationship with my mom. I thought my mom was raising me, so I also wanted to have kids and raise them later on. But now that I am a mom to an 8 year old, I realize that it is not that I am raising my daughter, in fact we are growing together! It is true even as a teacher or an advisor. We grow with the students. Being a mom is rewarding but sometimes it is a reality check as well. I used to have a stereotype about my own personality. But having a kid makes me question them!



When I was little and people were asking me what I want to be when I grow up, I was always saying "I want to be a puppy!". But since I couldn't be an animal, I always wanted to work with animals. That's why I would definitely enjoy being a zoo keeper, if I was not in my current field of work.

While being in high school, I volunteered at the Philadelphia Zoo for two years, which was a lot of fun. I worked in the education department where our goal was to get people to not be scared of animals. I mainly worked with reptiles because other people weren't comfortable enough to work with them. It was a very interesting experience for me, working with all these different types of snakes. You probably don't realize, but snakes have different personalities. There was one particular snake that was really mischievous and was always trying to cause trouble!



*Janita Patwardhan
PhD , Mathematics*

Zookeeper would definitely be my dream job, along with being a chef. I like to cook a lot. I really enjoy tasting different dishes and trying out different cuisines. I also really like to cook for others because I get to introduce new flavors in people's palettes.



Muddappa Gowda
Professor, Mathematics

I did not think of anything else. I was good at Math and did not have to work very hard, it came to me naturally. There was a period during my school days when I used to be crazy about cricket. But something clicked in me and I started to focus only on Math. There was one teacher who influenced me so much during pre college that I decided to pursue a career in Math. I stuck with it, came to this country for my PhD and here I am!

For me, it's the excitement of doing Math - learning and transmitting the ideas. That's a very pleasurable pursuit, I cannot give it up for anything. I remember a story to share: There was a teacher in my class of 140 students, who taught us Geometry.

The first day he offered one rupee (Indian currency) to everyone who solved a particular problem. So we all rushed back home and solved the problem. The next day it was surprising for him to see that 100 students had solved the problem. He said, I do not have 100 rupees, so instead let me give you another problem, and if you solve this one, I will give you two rupees instead of one. Next day 90 students solved the problem and so on. This is how we learnt the thrill of solving problems!

During my undergraduate days, we were reading books written by American professors whom we considered as "big people" and working with them was a dream we all shared. One of them was my eventual advisor Prof. Walter Rudin with whom I worked on complex analysis.

After my graduation, I attended a talk in the Computer Science department. I realized one of the problems that was posed could be solved easily by extending it into an infinite dimensional space. I showed the speaker my idea and he encouraged me to publish it. That's how I got into optimization and I work exclusively in this field till this day.

For me, the important thing in life is to be open to new ideas, to learn as many disciplines as possible and just go wherever it takes you, as long as you are excited about it. After all, being happy and creative is what matters in life.



If I were not studying statistics, I would have probably majored in English literature, following it up with teaching or doing research and playing music on the side. I have always had an affinity for Math and English literature. My dad gave me an option at the end of high school - for whether I wanted to study Math or English literature. I got into Stat as it seemed like the more lucrative career option at the time. I have continued to cultivate my interest in English on the side.



Reetam Majumder during one of his performances

My musical endeavors began in my undergrad. I played drums for a while and then switched to guitar and since then I have been playing guitar and related instruments. I played guitar professionally for a little while in Mumbai, but it was consuming a lot of my time, so I eventually gave it up. I have always had a clear distinction in my head between what I like doing as a creative pursuit and what I would prefer to be my career. I enjoy playing music but never considered it a serious career option. I have stuck to Stat as my vocation, which I also luckily enjoy.

I really like what I am doing here and wouldn't rather be doing anything different. But if I had to choose something, professionally it would have been some kind of planner because this is what I am doing on a daily basis here. We also call it firefighting because we put out all fires!

Apart from that, my absolute dream job would be to own a farm and work with horses. I started riding in 2002 when my daughter was taking classes and continued till 2011 when I fell and broke my hip.

Her instructor bought a farm with horses and we were helping her with it pretty much on a daily basis. It was a hectic experience but we really enjoyed doing it. I loved working with horses and I miss it tremendously. I even enjoyed cleaning the stalls, I found it to be very cathartic and soothing after a long day.



*Maggie Kennedy
Manager of Math & Stat department*

The only instance when I had a hard time, was when one of the horses in the farm went down with colic. I had to walk her around for 3 hours and then we called the vet who inserted an NG tube down her nose - horses do not like that! Later on, every time I was around her, she had her ears pinned back (which is usually a sign of hostility among horses) and she was trying to bite me. I worked with her 8 years after the incident but she could not forget what happened that day and the fact that I was there.



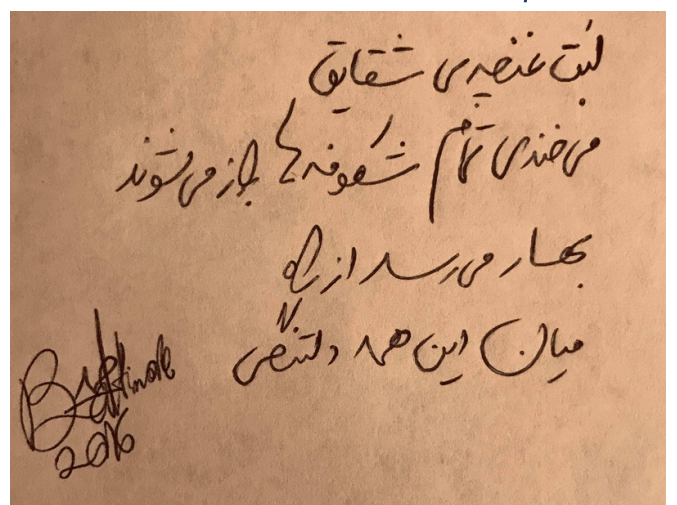
*Ahmad Mousavi
PhD, Mathematics*

There are two things that I really love to do. First and foremost is reading books and my love for poetry. Part of me is a person who is hyperactive and the other is someone who prefers being more silent, by myself which is reflected in my aforementioned interest. Thus I would like to own a bookstore myself. I enjoy reading contemporary poems. My favorite poet is Forough Farrokhzad (Iranian poet). I do write some poems in Farsi. Three years ago, I did plan to publish a book with my poems and since it was my first, I had to shell out some money.

Circumstances forbade that from happening. I hope to do it eventually.

One of Ahmad's poems

The second thing I would love to be engaged in, is owning and managing a coffee shop. I even collect music to eventually play there. I would name the tables of the coffee shop after the names of different poets. I have already picked the name - "Cafe Ashenaei" which in Farsi roughly translates to "the time you get to know a new person and start getting familiar with each other" (mainly as part of a new relationship). For me, this is a best period in someone's life



*Your lips, an anemone bud
You smile, all blossoms bloom
Overwhelmed with gloom
Yet spring comes*

since you don't really think about any restrictions, responsibilities, societal pressures and just enjoy the time spent together. In my experience, a coffee shop is a perfect setup for folks getting to know each other and I will cherish to witness this "phenomenon".