

Thank you very much for this opportunity. I am honored to be a semifinalist for this award and I have been inspired by Alan's courage and dedication in the face of his cancer. My responses are below:

**- How has the adversity impacted your life?**

I feel that my diagnosis with stage IV neuroblastoma in 2000 and subsequent survival has been a large guiding force in my life and given my life direction and a career path. I am one of the lucky few to have survived high-risk neuroblastoma with no further events, although I have struggled since then to overcome my numerous late effects. At the Children's Hospital of Philadelphia (CHOP), I was enrolled on the most toxic clinical protocol ever used and was the only one of the three children on the protocol to survive. My experiences beating cancer and helping others do so has lead me to my dream of becoming a pediatric oncologist.

My late effects from chemotherapy and radiation impact my life everyday. Following my cancer remission, I was diagnosed with severe-to-profound bilateral hearing loss. I also had laparoscopic surgery in 2003 to remove my gall bladder, which had formed gallstones, likely related to my treatment. I continue to be monitored by an endocrinologist for growth issues, a nephrologist for cysts on the part of my left kidney which remains after my tumor resection, a cardiologist for possible heart effects from the chemotherapy, a dermatologist, an ENT doctor, and of course an oncologist. In spite of my many visits down to CHOP every year, I count myself incredibly lucky, for both my survival and the fact that I only have to see most of these doctors once a year for a routine checkup. I also feel incredibly blessed to have suffered no cognitive defects from my treatments and that I have been able to thrive in school.

**- What did the adversity teach you about yourself or life?**

I do not remember when I was sick and that particular adversity, but I live the adversity of my side-effects every day. This has required me to become an effective advocate for myself, a skill which has gone far beyond helping me to overcome my physical disabilities. This has given me courage to establish productive relationships with many different people, and helped me gain opportunities for myself. I have built a very strong relationship with my boss and former oncologist at CHOP, which not only got me my first internship in her lab but also a paid position there last summer. Learning from her has given me a great deal of perspective on the world which I would never have gained otherwise.

I will often take a moment to recall how blessed I am. Even today, almost 15 years since my diagnosis, the long-term survival rate for high-risk neuroblastoma has hardly changed. I consider how fortunate I am to be in a position to help those who are currently struggling with the disease, and those who will in the future. I feel that my adversity has taught me empathy for others, which is among the most valuable skills I can learn for my goal of becoming a pediatric oncologist. My adversities have given me

goals for my life and a target to work towards. I believe I have worked hard thus far on the path leading to my goal; I can only hope that I will have the strength to continue to fulfill this goal I have set for myself. I feel I owe it to those who have died facing my disease, as well as the doctors and nurses who worked so hard to save me.

- What have you done to help others?

I try to be highly involved in the fight against pediatric cancer from as many sides as I can. This year, I was the senior Technical Captain for the LMHS mini-THON, which was one of my favorite activities in high school. I have also spoken at the last four mini-THONs about my own story, the impact mini-THON had on my life, and the research I have done at the Children's Hospital of Philadelphia. I co-founded and was co-president of the LMHS Lemon Club, which serves as the school outreach program for Alex's Lemonade Stand Foundation (ALSF). Last year, we raised over \$1300 for Alex's Lemonade Stand. My choir, the Keystone State Boychoir, also performed at the annual ALSF Lemon Ball fundraiser in 2012, a performance which I helped coordinate.

In order to make an even greater difference in the lives of others, I have become involved in translational oncology research at the Children's Hospital of Philadelphia. This has been the single most valuable experience of my life. I joined the lab of Dr. Yael Mossé, an incredible doctor, scientist, and one of the greatest people I know, in July of 2013. I returned to her lab every summer since then, and I have been overjoyed to be able to take up the actual fight against cancer. During the time I have spent in the lab, my abilities and the level of work I performed has increased, even to the point where I effectively completed entire experiments under the supervision of a research technician. For me, this was as much of a contribution to those currently fighting neuroblastoma as I could make, and I am blessed to have been able to spend my time working for the cause in this way. Doing the work in Dr. Mossé's lab and getting to meet her patients inspires me and drives me to do everything in my power to help them.

Sincerely,  
Theo Hansel

Lower Moreland High School Class of 2015  
Harvey Mudd College Class of 2019