

An open letter on why I will be marching for science on April 22, 2017 in Washington DC....

On Thursday, the President's proposed budget recommended to Congress cuts in spending for our elderly and children, on the arts, and on science, instead diverting our tax dollars to increasing the US military might. I could speak to each of these, but will limit this short treatise to just the cut to science and what it means to me as a nurse for nearly 30 years, and a nurse scientist and educator for the past 10. This proposed budget will cut \$403 million from **health professions and nursing workforce programs and \$5.8 billion (20%) from the National Institutes of Health**. The current statistics regarding the nursing shortage are staggering: RN vacancy rate of 8.1%, a faculty vacancy rate of 6.9%, and a projected 1.2 million vacancy rate over the next 6 years.

Let me put this in perspective. Right now our students witness RNs on a busy med-surg floor managing 5-7 patients, performing and documenting all assessments, giving their medications and all treatments, keeping from falling, in some cases feeding and providing very intimate care, educating so the patient knows what to do when they go home, arranging for postdischarge services, giving pain medicine, turning grandma every hour so that she doesn't develop a bedsore, and coercing Mr. Grumpy pants to get out of bed and walk down the hall so he doesn't develop a blood clot, ileus, or atelectasis. Now envision trying to do this for 10-14 patients every single day: forget giving pain medicine, performing a decent assessment... things will be missed and patients will die. Because the nurse missed something. How long will nurses continue to derive satisfaction in a job in which no one is happy with them and their patients die because they just didn't have enough time, couldn't move fast enough, couldn't stop and just process their assessment findings about Mrs. Jones before she coded?

Maybe as an educator, we should just rush students through a nursing program? Make programs less rigorous so we have more bodies doing a job? Should we replace qualified nurses with techs and robots even as has been suggested? Perhaps we don't need those prerequisites of science, literature, and humanities because some think that nurses are only wet maids? Perhaps they don't even need to be smart or have a college degree. Should I lighten up my requirements that a nurse understand and describe the interventions that influence preload, afterload, and contractility? Do they really need to know how the heart works and what that abnormal sound they heard means? They could just follow orders and don't really need to know for themselves the optimal care of a person with a STEMI, PE, AAA... why we never give calcium channel blockers to persons with heart failure and always give the ACE inhibitors? Let's just cut those lectures.....

As I turn my attention to the 20% cuts to NIH funding, let me just share with you that I have been funded by NIH with my research focused on two areas: 1) helping patients better self-manage their heart failure, and 2) helping to identify and prevent the development of heart disease in persons who have survived cancer. If NIH can't fund my research, who will? Our very short-sighted and uneducated president believes research should be funded by private industry who can then capitalize on the inventions. Pharmaceutical and device companies don't care about trying to help a patient stay out the hospital, have a better quality of life, or understand their risk of heart disease earlier so that they can prevent having a heart attack **because they cannot make money off of this**. We know that 35-75% of all hospitalizations in persons with heart failure are directly attributed to the patient being unable to manage their disease...not because they weren't given the right medicines or because they didn't have the right device. But because they couldn't follow all of the orders, know how to identify their symptoms, couldn't get transport to see the doctor, didn't understand why 13 medicines a day were prescribed, or how to eat a low sodium diet. That's my research, trying to help understand and develop programs that help people help themselves. My research has shown benefit and improvement, but

exactly who will pay for this type of research going forward? Who in this administration cares about research that won't make them rich, but instead is for the good of the common man?

Finally, we know that people who have survived cancer have an 8-fold risk of developing heart disease than the general population. To this day, we do not know the exact mechanisms of why this is or how to prevent it. Further, we don't have evidenced based guidelines regarding when we should start doing tests to determine if the patient is at risk before they develop full-blown disease and pass the point of where we could have intervened early and prevented heart failure or a heart attack. This is the type of research funded by NIH and not even of the slightest interest to pharmaceutical or device manufacturers. This is nursing research, for the betterment of humanity, not for the padding of my pocket-book.

And so I will march for science on 4/22/17, for every one of the patients I have helped heal, helped teach, helped ease their pain, and the many that I've lost. For every nursing student that I've taught that now utilizes some wisdom God blessed me with. Ultimately, I march for them.

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