

Dear Ohio Legislators in Contemplation of House Bill 559,

Thank you for the gift of your time in service to our nation and the state of Ohio as lawmakers. I am a physician with a multi-state practice of medicine who's family ties run north and south through Ohio in various branches of medicine. Founder of the Fogarty Institute for Innovation and former Stanford Vascular Surgeon Tom Fogarty, MD who grew up in Cincinnati, Ohio is a distant relative. Dr. Tom Fogarty spent some time with my uncle Thomas A. Fogarty, formerly of USA Today editorial staff on the confirmation of our common ancestry as published by Hugh A. Fogarty who was the managing editor of the Omaha World-Herald for 3 decades¹. On the maternal side of my family are physicians who are related to an Ohio citizen and pioneer in Neonatal Intensive Care Medicine named Paul A. Byrne, MD. Dr. Byrne has a career that stretches back into the days of epidemic pediatric viral illnesses of the 1960s and it is upon the professional and Hippocratic family ties here that an educational discourse seems most appropriate.

House Bill 559 has some clearly needed updates and revisions for modern medicine. One of the major updates is in the language of science and surveillance of immune system status. In North Dakota, where I hold the position of Chairman of Radiology at UND, we made system-wide updates in the School of Medicine to vaccination policy in January of 2017 to include the use of antibody testing or "titer-checks" to substitute for vaccine records. As we have a number of Somali students in the northern plains who's families originally landed in the Twin Cities, many of the foreign born students of science and medicine have them in other languages. These records are not easily interpreted for the "record of immunization" indicated in HB559. Additionally what happens when vaccine records are lost? We frequently have had catastrophic floods in and around eastern ND and western MN, in some instances paper records of vaccination have been lost especially in those U.S. families who are more migratory. In western ND we have a migratory workforce for the Bakken oil patch. We frequently see the difficulties of records integration in to modern PACS and EMRs in our hospital systems out here in the northern prairies. Flooding in the Ohio river systems can of course impact school records and family documents. Vaccine records are not really proof of immunity, they are documentation of market participation. Titer levels which are measured for proof of efficacy of FDA labelled vaccines are a more robust and scientific record for children and families to affirm that their children are not putting others at risk with compromised immune systems.

By adding the gold standard of individual proof of immunization (titer levels) to this bill, you will have done your citizens and communities a great service in education of the fact that our own immune systems record our exposures to disease (natural immunity) and vaccines through antibodies produced from these exposures. It will also lower the risk of social discord in the future during epidemics. Annually, we really don't have the ability to mobilize enough vaccine in the influenza season for everyone in the country. When

there are manufacturing issues of contamination as we have seen in the past with vaccines, you can see how the industry is already stretched to the limit on a yearly basis for vaccine production in this series. Why not be truly scientific and practice individualized medicine in children with titer checking as the rest of the world of medicine is doing outside of pediatrics with pharmaco-genomics? The concept of proving a need for an intervention like a vaccine is based in Hippocratic ethics. The macroeconomics and population based healthcare outcomes for immunizations could be called “vaccinomics” which is a term coined by world renown Mayo Clinic vaccine researcher Greg Poland, PhD.

There may be cost concerns for this approach, but in reality this approach is a cost saver to society and Ohio families. Attached is a cost analysis I submitted to the North Dakota legislators involved in a bill for ABA therapy coverage that delineates the resource capture and cost savings for hospitals in ND on just one vaccine schedule with the ethical approach to checking titers before vaccinating with boosters that may be entirely unneeded on the individual level. Additionally in my own professional life, I have had multiple titer checks over the years as my vaccine records were lost in chaotic divorce while I was a pre-medical student at the University of Chicago. My only education into the used of titer checks for documentation of immunization status was not in medical school, it was just before medical school as I was matriculating at the University of Nebraska Medical Center².

My children and quite a few families in North Dakota have had titer-check modifications to the CDC schedule. The CDC schedule is not based on science but rather policy, just ask your self why the first vaccine is not even a childhood illness and is completed in a 3-4 shot series in the first year of life before measles, mumps and rubella are even given. There is an efficacy problem that the veterinarians see within early life vaccines and they have identified this in the concept of maternal immuno-interference. Thus, we may have more effective immunizations by better timing than what CDC policy concerns have incrementally created in the modern schedule. The obvious conundrums in the CDC schedule itself are opportunities to create a cost savings to our public health and insurance apparatus. In my experience as a physician advising titer check protocols in North Dakota children, there is a general reduction of 40-50% of the overall shot load by avoidance of unneeded boosters. Ethically, if the intent of all the science behind vaccines is to produce a safe antibody level, then why would we not apply this directly to our children or at least educate ourselves to the possibility?

As an educator in medicine there may be some complex FERPA and HIPPA crossroads regarding confidentiality issues in this bill that may face a challenge down the road that the Attorney General’s office may have direct resources towards. For my academic records through the years and in medicine, this is a controversial issue and we have had to deal with these interfaces in other medical and psychiatric issues with our students at UND. Ultimately, the intentions of this bill are good but their implementation will be

difficult as there will be many privacy concerns in your Ohio citizens. Additionally, as the renown physician and inventor of the market leading rotavirus vaccine Dr. Paul Offit has commented that children can handle 10,000 vaccines at once, the truth is they are daily exposed to hundreds if not thousands of antigens from many infectious agents that we have no immunization to counter³. These daily exposures are actually an efficacy test of our children's native immunity. When children are immunocompromised how do we best catalog the immune status of the children around them for these disease which have no vaccines yet? Titer assays are the only scientific way to capture all this data in a way that the law actually becomes implemented with real utility. If there is an epidemic of a rare strain of parvovirus, by this law using the microscope of titer checking you will have actionable and helpful data. Hopefully this has helped your deliberations, my favorite DVMs in the Great Plains seem to be well ahead of us in human medicine with these concepts discussed here. Our dogs are getting titer checks around the country and it just seems like a no brainer that our children should too.

Edward F. Fogarty, III, MD

For the Ohio Advocates of Medical Freedom

1. <http://academic.csuohio.edu/jeffresl/FrankFogartyHomePage.htm>
2. https://bismarcktribune.com/news/opinion/mailbag/a-proposal-on-vaccinations/article_e41b2f91-d75f-511d-92d7-eeef199e8f91.html
3. <http://pediatrics.aappublications.org/content/109/1/124>