

Fifty Shades of "Jay"

Introduction

When Stanford health economist Jayanta ('Jay') Bhattacharya was nominated as the new Director of the National Institutes of Health (NIH), I was uncertain what to think. On the one hand, he was a Stanford M.D./Ph.D and tenured faculty member who had competed for and received some NIH grants in the past (as revealed by a quick search of NIH Reporter). There was no evidence that he had any experience with either clinical or basic science research, given my low expectations about nominees from the Trump administration, it could have been worse. On the other hand, his major claim to fame appeared to be his co-authorship of the "Great Barrington Declaration", a document that argued against policies implemented and under consideration to manage the COVID pandemic at a time that there were many unknowns and tremendous concerns about hundreds of thousands or millions of perhaps preventable premature deaths.

I watched his confirmation hearing (https://www.youtube.com/watch?v=H7zWUKFk1gQ) with great interest. I was troubled considerably when he described indirect costs as "a kind of tip" that universities receive related to their research grants. Other than political motivations, how could a serious person go into a Senate confirmation hearing unprepared for a topic that was sure to be covered? How could he not bother to become more well-informed about this topic? There were literally hundreds of people at Stanford and around the country who could have helped get him up to speed.

I have been closely monitoring NIH progress and policies throughout the year. When Director Bhattacharya began making public statements of various sorts that revealed his lack of knowledge about NIH, I started to send emails in good faith to share my knowledge about NIH programs with him to help him perform his important job more effectively. At first, he did not respond at all and when he did, he responded using the term "ideological boondoggles" without definition. This ill-advised behavior substantially decreased my hopes for his interest in receiving input about NIH programs and policies as it seemed that he had entrenched political perspectives.

I have, nonetheless, continued to email him on occasions where his public statements or policy changes reveal his ignorance of NIH programs, his political rather than scientific motivations, or his hypocrisy. I believe that speaking truth to power is a great responsibility, especially for someone who has been so privileged throughout his career.

This is a compilation of these emails in their original form (except some typographical errors corrected). I have provide introductions to search email or series of emails on a given topic to provide context and other useful information.

Your comments are welcome.

Autism Causes Initiative

Background

On April 21, 2025, NIH Director Bhattacharya gave a presentation to the NIH Council of Councils. This is a group, made up of individuals from the various Advisory Councils, which provides oversight over NIH initiatives that cut across the NIH Institutes and Centers (https://dpcpsi.nih.gov/council).

This presentation is available on the meeting videocast (https://videocast.nih.gov/watch=56725). At around 1:55:00 in this videocast, Director Bhattacharya discusses a new initiative to identify the causes of autism based on linking databases.

NIH Initiative: Understanding ASD

- · NIH is launching an Initiative
- Integrating diverse data enabling researchers to examine complex factors influencing ASD rates.



I had heard some information about this new initiative before and had concerns about how it would work and what information it would be seeking and integrating.

However, my overarching sense in watching this was Déjà vu. In 2007 when I was leading the NIH Director's Pioneer Award program, we had an application from Professor Peter Bearman from Columbia University. The Pioneer program involves interviews of the finalists, so I had seen Professor Bearman present his proposal, which was funded.

Here is the Abstract (https://reporter.nih.gov/project-details/7341534#description)

Abstract Text

This project is designed to understand the rapid increase in autism prevalence in the United States over the past two decades. Proposed are new analyses of complex, multilevel temporally sensitive data sets that will enable me to determine the extent to which familial, environmental, gene-environment, and diagnostic drift/substitution are driving the autism epidemic. Detailed attention to and models capable of capturing social network and social influence underpinnings of the epidemic are developed. New analysis models for intercalating spatial and social network data are developed. These models where appropriate are extended to a wide range of developmental disorders that have increased rapidly in prevalence.

The proposal involved integrating databases to try to understand the rapid increases in autism prevalence 18 years ago. The major concerns from the reviewers involved whether he would be successful in getting access to and linking the proposed database.

He was quite successful. Indeed, we has elected to the United States National Academy of Sciences in part because of his accomplishments with this project. Indeed, he was selected to present a briefing to the National Academy upon his induction and chose to speak about this project.

I thought Director Bhattacharya should be aware of this project and its results since it was fully germane to the new initiative and had been funded by NIH, and indeed, funded by a flagship program associated with the NIH Director's office.

I felt that he deserved a heads-up about this, so I sent him an email.

Tue, Apr 29, 2025 at 10:37 AM

Autism causes and NIH funding

Dear Dr. Bhattacharya:

I watched your Council of Councils presentation with interest.

I was Director of NIGMS from 2003-2011 and led the NIH Director's Pioneer Award program after its first year. In 2007, this program funded an award to Professor Peter Bearman at Columbia University entitled "Social Determinants of the Autism Epidemic".

https://reporter.nih.gov/search/Em2xW 9mLUq2FuBVBIF9NQ/projects

This award which was based on integrating diverse data sets was quite successful. Here is a briefing he did at the National Academy of Sciences annual meeting a decade ago.

https://www.youtube.com/watch?v=6_pQLJewHMA

I am glad to try to answer any questions.

Best, Jeremy

I received no response.

On May 7th, NIH released an announcement about the new initiative https://www.nih.gov/news-events/news-releases/nih-cms-partner-advance-understanding-autism-through-secure-access-select-medicare-medicaid-data

Director Bhattacharya was quoted in this announcement:

"This partnership is an important step in our commitment to unlocking the power of real-world data to inform public health decisions and improve lives," **said NIH Director Dr. Jay Bhattacharya**. "Linking CMS claims data with a secure real-world NIH data platform, fully compliant with privacy and security laws, will unlock landmark research into the complex factors that drive autism and chronic disease – ultimately delivering superior health outcomes to the Americans we serve."

This announcement raised concerns with me that the data integration strategy might not include key features that had been identified in Professor Bearman's study.

I wrote to Dr. Bhattacharya with these concerns.

Wed, May 7, 7:31 PM

Autism Causes Study

Dear Dr. Bhattacharya:

I saw the announcement "NIH, CMS Partner to Advance Understanding of Autism Through Secure Access to Select Medicare and Medicaid Data" in which you are quoted.

I hope you had a chance to watch the 18-minute YouTube video of Dr. Peter Bearman's presentation at the National Academy of Sciences regarding the causes of the autism epidemic (https://www.youtube.com/watch?v=6_pQLJewHMA) that I shared with you more than a week ago. As I noted, this is based on work largely funded by an NIH Director's Pioneer Award awarded in 2007. If you watched the presentation, you undoubtedly appreciated the importance of including geographical information (which revealed clusters of cases that appear to be driven by social rather than toxicant exposure) as well as the importance of information about parental age and other factors related to the timing of childbirths.

Will this information be captured in the envisioned integrated data sets? Obviously, such data cannot be added later if the individuals in the data set are effectively deidentified.

Again, I am happy to try to answer any questions you may have.

Sincerely, Jeremy Berg

Again, I received no response.

Concern about the Level of Remaining NIH Appropriations

Background

The Trump administration had taken a series of actions that had substantially slowed down the rate at which grants were awarded and, hence, appropriated funds were committed. I, and many others in the scientific community, were growing increasing concerned that NIH was reaching a situation where the agency would not have sufficient time to get all of the appropriated funds committed.

While I had been tracking how far behind fiscal year 2024 NIH was getting in fiscal year 2025, I had not thought hard about how to place this in context. I realized that a sensible way to do this was to look at history rates of funding over the past decade.

I downloaded the relevant data from NIH Reporter and related websites and performed an analysis.

The report I generated is shown below:

Time Remaining for Award Making in Fiscal Year 2025

Jeremy Berg 5/4/2025

The Rate of NIH Grant Making and the Risk of not Investing the Entire NIH Appropriation in Fiscal Year 2025

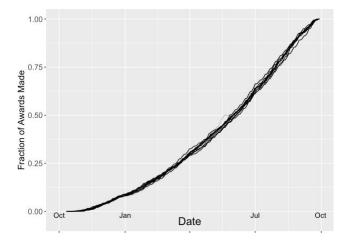
NIH has 27 institutes and centers, of which 24 have grant-making authority. In addition, some grants are funded through the NIH Office of the Director's Common Fund.

The rate does NIH award making

Data about NIH awards are available in the NIH Reporter database.

Data for fiscal years 2015-2024 reveal that the number of awards of all types (not including subawards) ranged from 50007 in fiscal year 2015 to 63483 in fiscal year 2024.

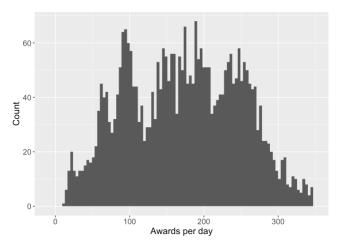
A plot of the fraction of awards over the course of these fiscal years is shown below:



The curves are very similar. They are not linear. The rate of making grant awards is relatively low at the beginning of each year and then increases before tapering off at the end of the year. This is due to several factors including the appropriations process (almost always delayed) and the timing of grant application submission opportunities, and the timing of advisory council meetings for grant approval (which occur three times per year).

The daily number of grant awards ranges from 0 to 719. However, rather than just looking at daily rates, a more informative quantity is the rate over a more extended period of time.

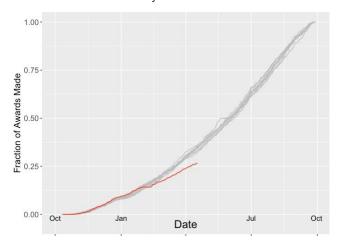
A histogram of the average daily rate over 30 day periods is shown below:



The median for the distribution is 174 with the 80%ile of 246, that is, 80% of all average daily rates are below this value.

Results for fiscal year 2025

The results for fiscal year to date can be added to the previous graph:



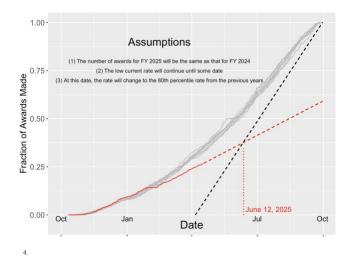
This shows that the curve for fiscal year 2025 started off along a normal curve but then, with the grant "pause" at the beginning of the Trump administration in early February 2025, the fiscal year 2025 diverged, lying below the other curves. It has remained there, due to a relatively low rate of award release.

Does NIH have sufficient time to release its full appropriation in fiscal year 2025?

We can address this important question but we need to make some assumptions. One set of limiting assumptions are:

- The number of awards for fiscal year 2025 will be the same as that for fiscal year 2024
- ² The low current rate will continue until some date;
- 3. At this date, the rate will change to the 80th percentile rate

from the previous years. The results from these assumptions are shown below:



From this analysis, the rate must change on or before approximately June 12th or there will not be sufficient time to release an adequate number of awards.

Alternatively, either the subsequent rate of award release will have to exceed the 80%ile rate or the sizes of awards will need to be increased so that more funds will be released with a smaller number of awards.

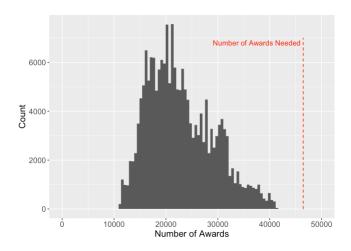
Sustained funding over five months

For the period from May 1st to September 30th, the number of awards that are needed to be made is 46444 and the amount of funding that needs to be distributed is \$27.25 B. This must occur over 152 days. Has this every occurred?

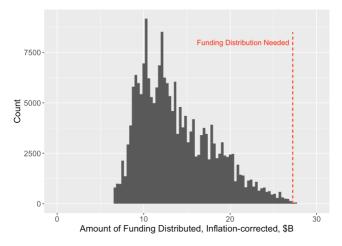
This can examined by looking a fiscal years 2015 to 2024 over windows of 152 days. The amount of funding in each year was corrected for inflation to 2025 dollars.

The results are shown below.

For the number of awards, it appears that this number in unprecedented over this period of time.



In terms of inflation-corrected amount of funding distributed, this appears to be nearly unprecedented. The maximum amount of inflation- corrected funding distributed over 152 days was \$27.65B in fiscal year 2020.



This analysis suggests that it is even more imperative that the rate of fund distribution accelerate as soon as possible.

I decided that it was important to share this analysis with Director Bhattacharya as he did not have any experience with managing the NIH appropriation. Indeed, most NIH Directors never gain this knowledge as this is managed at the level of NIH institutes and centers who have the actual funding authority and responsibility for NIH grants. Furthermore, I had no knowledge whether Director Bhattacharya had connected with any of the data analysis teams at NIH who could address this sort of question if asked.

I wrote to him on May 4th and shared this analysis.

Urgent: Appropriated funds must be distributed urgently

See the attached letter and report.

I would appreciate the courtesy of an acknowledgement of receipt.

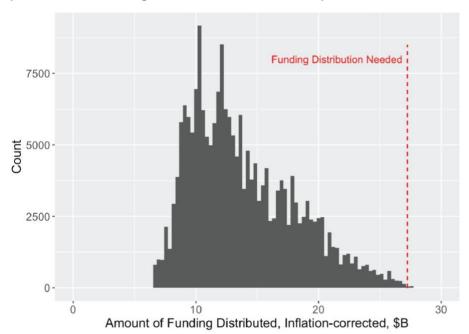
Sincerely yours,

Jeremy M. Berg, Ph.D. Director, NIGMS (2003-2011) George W. Bush and Barack Obama administrations

May 4, 2025

Dear Dr. Bhattacharya,

Many have been concerned about the slow pace of NIH grant making. I recently completed the attached analysis. The bottom line is depicted here which contrasts the historical pace of funding commitment over 5-month periods with the amount of the fiscal year 2025 remaining to be committed after May 1, 2025.



A histogram of the amount of funded distributed over all 152 day periods from fiscal years 2015-2024. The amount of funding needed for 2025 lies at the extreme edge of this distribution.

I realize that some of the events that contributed to this slow place occurred prior to you assuming the role of NIH Director. However, there is no evidence that the pace has increased since you started.

Perhaps your greatest responsibility as NIH Director is to ensure that the funds appropriated to NIH by Congress are invested to help understand and promote issues related to the health of the American people. Certainly, there are many outstanding applications available to fund at NIH that have been (or soon will be) peer reviewed and approved by NIH advisory councils.

The American people expect you to do your job and work with the Institutes and Centers to make sure that these appropriated funds are committed through approved processes by the end of the fiscal year in September. From this analysis, the rate must change immediately or there will not be sufficient time to fund an adequate level of awards.

Sincerely yours,

Jeremy M. Berg, Ph.D.

Director, National Institute of General Medical Sciences
2003-2011 (G.W. Bush and B. Obama administrations)

I received a response the next morning:

May 5, 2025, 8:41 AM

Jeremy,

I received your letter and analysis. Contrary to the assertion you make in the letter, my job is to make sure that the NIH spends the money that the American people have entrusted us with on projects that advance the health and longevity of the American people. Spending on ideological boondoggles and on dangerous research, the conduct of which risks causing a pandemic for instance, does not advance those goals. I'm committed to making sure funds allocated to the NIH are spent wisely. Thank you for your input.

All the best, Jay I was pleased that Director Bhattacharya responded, but disappointed (and even a bit stunned) that he would use a term like "ideological boondoggles" without defining it.

This gave me a better sense of his approach to these issues which has informed my future strategies in dealing with him.

I responded to him:

May 5, 2025, 10:10 AM

Dear Dr. Bhattacharya: Thank you for your prompt response. Of course you have responsibility to make sure that funds are spent wisely.

Please note that my analysis does not include the effects of any of the grants that have been terminated. I presume some of these would fall into the category of "ideological boondoggles". The level of funded available for commitment would be even higher if these are included.

What percentage of the pending applications do you believe fall into the categories of contributing to pandemic risk or being "ideological boondoggles"? I would guess it is much less than 10% even with the most expansive definitions. Applications that fall outside of these categories are apparently not being funded at rates that will allow the funds entrusted to NIH by Congress and the American people for the people to gain the benefits of these appropriations.

Sincerely, Jeremy Berg Sent from my iPhone

I did not receive a response to my question.

The Surprising Scientists Hit by Trump's D.E.I. Cuts

The N.I.H. has terminated hundreds of diversity grants awarded to young researchers, many of whom come from the very places that supported Trump.

(https://www.nytimes.com/2025/07/10/us/trump-science-nih-grants-dei-cuts.html?unlocked article code=1.VU8.e5oB.sGxegBP Ilin&smid=url-share)

This article highlighted several white scientists from disadvantaged backgrounds of various sorts who had successfully competed for grants from the NIH MOSAIC (Maximizing Opportunities for Scientific and Academic Independent Careers) program. This is a K99-R00 transition award program that funds a mentored postdoctoral experience and then provides research funding if an awardee can obtain a suitable academic position. They are both highly competitive and quite prestigious. The MOSAIC program was a version of this program that was developed to encourage scientists from groups traditionally underrepresented in biomedical research.

The purpose of the Maximizing Opportunities for Scientific and Academic Independent Careers (MOSAIC) Postdoctoral Career Transition Award to Promote Diversity (K99/R00) program (https://grants.nih.gov/grants/quide/pa-files/PAR-21-271.html) is to support a cohort of early career, independent investigators from diverse backgrounds conducting research in NIH mission areas. The long-term goal of this program is to enhance diversity in the biomedical research workforce. The MOSAIC K99/R00 program is designed to facilitate a timely transition of promising postdoctoral researchers from diverse backgrounds (e.g., see Notice of NIH's Interest in Diversity) from their mentored, postdoctoral research positions to independent, tenure-track or equivalent research-intensive faculty positions.

The Notice of NIH's Interest in Diversity has been taken down, but is available from the Wayback Machine

(https://web.archive.org/web/20250123164512/https://grants.nih.gov/grants/guide/notice-files/NOT-OD-20-031.html)

There are four categories of diversity specifically laid out in this notice:

- A. Individuals from racial and ethnic groups that have been shown by the National Science Foundation to be underrepresented in health-related sciences on a national basis
- B. Individuals with disabilities, who are defined as those with a physical or mental impairment that substantially limits one or more major life activities
- C. Individuals from disadvantaged backgrounds, defined as those who meet two or more selected criteria
- D. Women in scientific disciplines where women have been shown to be underrepresented

Applicants who applied to the MOSAIC program had to provide an explanation justifying their eligibility, but the application was otherwise analogous to the parent K99/R00 program, and the level of competition was the same for both programs.

The grants in the MOSAIC program were terminated by the Trump administration because the MOSAIC program was categorized as a "DEI" program. These promising young investigators had their careers disrupted by these ill-informed actions that were deemed illegal by a federal judge first appointed by Ronald Reagan.

While I was a bit concerned about one interpretation of the New York Times article (we should be concerned about these grant terminations because they involve white people and not just racial minorities), I was glad to see coverage of the richness (dare I say, diversity) of these programs. Given that Director Bhattacharya had not demonstrated that he was spending much of his time understanding what NIH programs actually supported, I thought it was important to share the New York Times article with him.

Thu, Jul 10, 2:19 PM

Dear Dr. Bhattacharya: I wanted to make sure that you had seen this article (https://www.nytimes.com/2025/07/10/us/trump-science-nih-grants-dei-cuts.html?unlocked article code=1.VU8.e5oB.sGxegBP llin&smid=url-share [Gift Link]) and attached.

This story captures just a few of the talented young scientists who have been caught up in the anti-DEI, anti-"ideological boondongle" agenda to which you have been contributing.

Sincerely yours,

Jeremy M. Berg Director, NIGMS 2003-2011

I did not receive a response.