

Youth Priorities in National Policymaking on Artificial Intelligence



Comment of **the Emerging Technology Group (ETG)** to the White House Office of Science and Technology Policy's Request for Information on National Priorities for Artificial Intelligence.

Signed on the 7th of July 2023 by:

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Foreword

About ETG

The Emerging Technology Group (ETG) is a youth-led nonprofit dedicated to promoting the study of emerging technologies and leveraging them to solve real-world problems. Led by Sarosh Nagar and modeled off Google's X, ETG is a 'moonshot factory' — our teams leverage their skills in artificial intelligence, biotechnology, and more to conduct pro bono research, write policy proposals, and design technical tools to solve problems with more than 10 partners and collaborators, including government and international agencies, local NGOs, and firms across 5 continents. We also provide free technology education curricula and guest speak at professional development workshops, with our work cumulatively reaching over 3,200 students worldwide.

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Our Motivations for Commenting

Novel policies on artificial intelligence (AI) will affect the development of the AI landscape for decades to come. Young people, defined herein as those between the ages of 18 and 30, are among those groups most directly affected by the advent of AI, and thus novel policies should consider their concerns.

Disclaimer

ETG's comment is intended to provide further information to federal rulemaking agencies about the role of AI on young people. ETG's comment should **not** be construed as an endorsement of any given candidate, legislation, or other specific political activity.

Executive Summary

In this report, we provide key information on the role of artificial intelligence (AI) in young people's lives. Young people are key stakeholders who may be disproportionately impacted by issues such as AI-generated misinformation, privacy concerns due to large-scale data collection, and more. To address these challenges, we isolate two key areas not heavily discussed in current policymaking discussions: improving AI literacy among youth and improving youth engagement with AI governance. In particular, we analyze the advantages and disadvantages of potential initiatives, such as a public education campaign, that public and private institutions can take to help young people improve their ability to identify AI-generated content. We also discuss new programs to allow federal agencies to engage with young people, especially through a potential youth council for AI issues and engagement with the startup community. We hope the information provided in this report can be most useful to the White House Office of Science and Technology Policy (OSTP) to inform their policymaking.

Background

Artificial Intelligence and Youth

As early adopters of technologies, young people are often the first to harness the benefits of new tools—and become exposed to their risks. Today, artificial intelligence (AI) already touches many daily aspects of the lives of young people, impacting their relationships online, the manner in which they interact with social media, their experiences inside the classroom, and how they seek out and consume information in the digital sphere.

Of particular interest is how generative AIs spanning a variety of mediums are becoming integrated into the interactions of young people online. Generative AI dramatically lowers the barriers to content creation, resulting in art, text, and audio creative works supplemented or largely created by AI tools while also blurring the definitions of authorship and originality. Generative AI, in addition to creative passive forms of art, has also spurred the rise of more sophisticated chatbots, a notable example being Snapchat's introduction of its "My AI" chatbot.¹ At a time when social media's effects on teen mental health are under increased scrutiny, the

¹ <https://www.cnn.com/2023/04/27/tech/snapchat-my-ai-concerns-wellness/index.html>

rapid adoption of these AI tools poses new questions about the responsible use of technology for youth.

The issues of digital disinformation and misinformation are also of serious concern, particularly for young people and their digitally native lifestyles. With over 71% of Americans aged 16-40 receiving their news from social media,² AI has significant ramifications for how we consume information.³ From a misinformation perspective, using AIs to enhance or replace online search engines has potentially troubling consequences. The tendency of AIs to “hallucinate” by generating false information that passes scrutiny to the untrained eye is well-documented⁴ but could perpetuate misconceptions rooted in the underlying training data to the user. From a disinformation perspective, generative visual and auditory work conducted in whole or in part by AIs heightens risks of disinformation and facilitates the rise of deepfakes.⁵ For this cohort of young Americans who often consume news primarily via social media, discerning between real and fake content is yet another burden to contend with, despite the lack of formal training on this issue.

Underlying the delivery of content on social media is the wide-scale collection and storage of data, particularly for the digitally native generation of young people who have interacted with social media since its inception. As the demands for AI training data continue to grow, the privacy of young people’s data is being placed at risk, particularly in light of both the scope and longevity of collected data. Further complicating this issue is the current lack of mechanisms to “forget” or otherwise remove previously inputted data from AIs such as large language models (LLMs). For young people who must contend with these increasingly wide and long-lasting digital footprints, safeguarding the vast amounts of data closely associated with AI development is a priority.

In the classroom, the integration of AI may provide an opportunity for young people to help adapt to the future of work. By leveraging tools that enhance rather than supplant traditional classroom learning, young people can better prepare themselves for a shifting landscape of jobs and opportunities as AI eliminates existing roles and creates new ones. For

² David Bauder. (2022, August 31). *Survey finds young people follow news, but without much joy*. AP News. <https://apnews.com/article/young-americans-news-habits-8411cbe7e452352964ff3cc70cde551a>

³ Howard, P. N., Neudert, L.-M., Prakash, N., & Vosloo, S. (2021). Digital misinformation / disinformation and children. *UNICEF Office of Global Insight and Policy*.

⁴ Athaluri, S. A., Manthena, S. V., Kesapragada, V. S. R. K. M., Yarlagadda, V., Dave, T., & Duddumpudi, R. T. S. (2023). Exploring the Boundaries of Reality: Investigating the Phenomenon of Artificial Intelligence Hallucination in Scientific Writing Through ChatGPT References. *Cureus*. <https://doi.org/10.7759/cureus.37432>

⁵ Helmus, T. C. (2022). *Artificial Intelligence, Deepfakes, and Disinformation: A Primer*. RAND Corporation. <https://www.jstor.org/stable/resrep42027>

example, AI-assisted coding tools such as GitHub Copilot signal a future of accelerated technical development but also raise the bar for technical skill and training.⁶ At the same time, how can we work to preserve critical thinking skills that enable young people to play an active role in our communities and governments? Issues like plagiarism, which are top-of-mind for educators, provide an opportunity to revisit and assess traditional models of learning and to question whether students are being served by an education that best prepares them in terms of developing necessary skills.

The current generation of young adults has been experiencing a sharp decline in mental health, and AI may hold the key to addressing the issue. Psychiatric disorders among adolescents in the United States may be as high as 28%, with a treatment gap of 95% among those with common mental disorders such as depression and anxiety.⁷ There is promising evidence that generative AI can assist in delivering therapeutic treatment and guidance to youth seeking support.⁸ Adolescents may choose not to seek professional help due to fears of stigmatization, instead choosing to seek guidance from virtual chatbots. Tech companies looking to integrate AI chatbots such as Bard and GPT into their respective search engines need to be cognizant of the impact of their products on youth mental health. There are serious questions about whether the next generation of chatbots are capable of and responsible for handling mental health inquiries from concerned youths.

Given the specific impacts of AI on young people, improving youth involvement in AI governance may be a highly important policy priority. The lack of representation for the voice of the most technologically-native demographics may be particularly problematic as it means that democratic, representative institutions may not craft policies that are responsive to the needs and concerns of young people. Thus, in order to ensure that institutions are more responsive, governmental actors could consider creating forums, summits, and other avenues by which youth voices on AI topics may be amplified and used to inform policy. Such forums have historically been present at the international organization level but have been less prevalent at the federal and state levels in the United States.

The present moment represents a valuable opportunity to transform the current state and pursue design-based reforms to the nascent technology of AI early in its life cycle—how

⁶ AI for Good. (2018, May 17). How can young people seize the opportunities of artificial intelligence? *AI for Good*. <https://aiforgood.itu.int/how-can-young-people-seize-the-opportunities-of-artificial-intelligence/>

⁷ Andrew, J., Rudra, M., Eunice, J., & Belfin, R. V. (2023). Artificial intelligence in adolescents mental health disorder diagnosis, prognosis, and treatment. *Frontiers in public health*, 11, 1110088. <https://doi.org/10.3389/fpubh.2023.1110088>

⁸ Kannampallil, T., Ajilore, O.A., Lv, N. *et al.* Effects of a virtual voice-based coach delivering problem-solving treatment on emotional distress and brain function: a pilot RCT in depression and anxiety. *Transl Psychiatry* 13, 166 (2023). <https://doi.org/10.1038/s41398-023-02462-x>

can we best harness its benefits while safeguarding young people's digital engagement, fostering their digital learning, and securing their economic futures?

Improving Youth AI Literacy

Governments, firms, and other actors are increasingly concerned with addressing the challenges that AI poses on young people. A central part of these efforts has been attempting to improve young people's literacy of AI, such as enhancing their ability to identify AI-generated content, improving their understanding of the technical fundamentals underlying AI, and more. Public and private institutions may both have roles to play in this novel effort.

Public Sector Approaches

Government agencies and other public sector institutions could consider several policy efforts to attenuate the impact of AI on young people. These include legal provisions to limit minors' access to AI-generated content on social media, limitations on data collected from minors to be used in training datasets, and more. Given the widespread discussion of these issues in ongoing debates over efforts to reform Section 230 of the Communications Decency Act (CDA), we will not address those issues *ad nauseam* in this comment.

One area in which we believe there has been an unfortunate lack of attention has been efforts to improve education to help young people better identify AI-generated content. One potential case study comes from Estonia, where, since 2007, Estonia has included media literacy education in its K-12 curriculum.⁹ In Estonia, this content centers around improving young people's ability to identify manipulated statistics and spot false or potentially misleading information.¹⁰ However, it is feasible that this educational model could be extended to teach individuals skills such as identifying common features of AI-generated images, using tools like ZeroGPT to identify AI-generated content, or training individuals to identify false or improperly cited materials that have been incorrectly used by generative AI tools like ChatGPT.^{11,12} These educational approaches could greatly improve youth literacy in spotting AI-generated content.

⁹ Ugur, K., & Harro-Loit, H. (2010). Media literacy in the Estonian national curriculum. *Media literacy education: Nordic perspectives*, 133-144.

¹⁰ Ibid.

¹¹ Aremu, T. (2023). Unlocking Pandora's Box: Unveiling the Elusive Realm of AI Text Detection. *Available at SSRN 4470719*.

¹² Ibid.

However, given ongoing political discussions over the nature of educational curricula, as well as the limited federal authority over the issue, these educational efforts may be better incorporated into public campaigns by federal agencies as opposed to within the classroom. For such a campaign to be effective, however, it is likely that substantial interagency coordination on communications from the White House, Congress, and other federal agencies will be necessary. Additionally, such a campaign's effectiveness may be maximized only if it can take a bipartisan approach to ensure individuals from all sides of the political spectrum may be receptive to any such messaging in this area. These efforts, however, may still be worth trying to ensure young people are more adequately prepared to consume information critically in the age of AI.

Private Sector Approaches

The private sector may consider a proactive approach in addressing the two greatest concerns amongst youth online—trust and privacy. This section will highlight a few solutions that industry leaders can consider simple content moderation along with encouraging joint ventures to help support AI literacy initiatives among youth.

A new strategy to counter misinformation may involve “pre-bunking,” where rhetorical disinformation techniques such as scapegoating, whataboutism, or fear-mongering are spotlighted and debunked beforehand. Jigsaw, a Google unit to study and monitor online disinformation, has been disseminating pre-bunking ads about the Ukrainian conflict and refugee crisis in Eastern Europe to counter potential misinformation.¹³ Since the pre-bunking strategy relies on protecting users from future disinformation, a degree of foresight is needed. Here, a predictive AI algorithm can be helpful in identifying key trends in searches and incorporating new data from current events to predict potential areas of disinformation. Utilizing collected data, these videos or pre-bunking snippets can be disseminated to groups most susceptible to misinformation. A pre-bunking strategy combined with existing passive anti-misinformation measures, such as fact-checkers on videos and posts, may effectively mitigate the harmful effects of misinformation online.

Privacy is another major concern for youth, with 84% saying that they want more control over the data collected.¹⁴ Industry leaders could consider adopting a maximum-privacy default when it comes to collecting data on youths. Essentially, young individuals would have to

¹³ Harjani, T., Roozenbeek, J., Biddlestone, M., van der Linden, S., Stuart, A., Iwahara, M., Piri, B., Xu, R., Goldberg, B., & Graham, M. (2022). A Practical Guide to pre-bunking Misinformation.

¹⁴ Perez Vallejos E, Dowthwaite L, Creswich H, et al. The impact of algorithmic decision-making processes on young people's well-being. *Health Informatics Journal*. 2021;27(1). doi:10.1177/1460458220972750

manually opt-in to data sharing if they want a more personalized experience. Clear guidelines on information collected and what it means could be accessible to young users in this framework. While the U.S. currently lacks legislation regarding data collection and youth, companies could be proactive in protecting the privacy interests of young adults. A good example of this approach is the 15 code standards adopted by the U.K. to put the privacy rights of young people first.

Joint ventures between tech companies and youth-oriented organizations may help increase digital skills in marginalized youth. Companies such as Google or OpenAI can partner with health institutions to better connect youth seeking mental health support to resources. Already, a majority of students who use generative AI tools such as ChatGPT prefer its use to traditional search engines.¹⁵ Besides mental health, partnerships that result in new AI tools adapted for educational needs may help close the digital divide. There exist numerous educational distribution software such as Khan Academy or EdX, which are widely utilized by students and educators. A partnership between these organizations and technology companies to create free courses on AI literacy could be beneficial.

Incorporating Youth Voices into AI Governance

Youth Engagement with AI-Related Policymaking

In tackling AI-related issues, there remains a key opportunity for youth voices to be represented and heard. The impacts of AI on society are likely to be unevenly distributed, and therefore an accurate assessment of concerns through a network of feedback can provide much-needed perspective to inform policy decisions regarding AI at the national level. To achieve such an objective, the White House Office of Science and Technology Policy could consider the formation of a Youth Advisory Council on AI with three important tenets: representative feedback, informed engagement, and substantive dialogue.

Representative feedback within a youth advisory council begins with the composition of its membership. Diversity in the form of geographies is crucial, particularly in representing areas of the country that have, in the past few decades, not benefited as directly from advancements in computer programming and innovation. A variety of perspectives regarding career interests

¹⁵ Impact Research. "AI Survey." *Common Sense Media*, 10 May 2023, www.common sense media.org/sites/default/files/featured-content/files/common-sense-ai-polling-memo-may-10-2023-final.pdf.

and occupations is also necessary: for those who choose to pursue trade schools and those who enroll in four-year colleges and universities, their perspectives are valuable, especially in shaping an understanding of the future of work. Diversity in identities remains paramount; members can bring their own experiences to bear in analyzing and critiquing existing approaches to AI and its regulation. Representatives would largely derive their impact by engaging deeply with their communities and understanding what their peers are concerned, excited, or nervous about within this emerging field. This engagement could be regional AI youth consultations, modeled after the UN processes of youth declarations,¹⁶ in addition to virtual or in-person collaborations with schools and communities nationwide.

Fulfilling the goal of informed engagement is another worthwhile goal: Young people have the potential to be leaders in this topic, but they cannot do it alone. By engaging with technical experts, policymakers, community leaders, teachers, and developers at the forefront of AI, youth leaders can build shared wisdom and become knowledgeable about a rapidly evolving field. In addressing their own misconceptions and expanding their understanding, members of a potential Youth Advisory Council would have an opportunity to use their learning to serve as effective science communicators to their peers through both traditional and social media platforms. Having a useful discussion about the effects of AI must first be grounded in a fundamentally sound understanding of the technology itself, and youth council members can serve as a bridge to their communities to build that knowledge.

Finally, substantive dialogue would be a crucial component of any youth advisory capacity. By giving young people the opportunity to ask questions about the topics that matter and to feel heard and responded to by our government, a potential youth council would have the opportunity to strengthen civic engagement and demonstrate the value of governance. Taking inspiration from the youth council model as implemented at the municipal level,¹⁷ creating structured opportunities for youth input and inclusion into the decision-making process can strengthen a vital link between policymaking and the public.

Public Sector Engagement with Youth in the Private Sector

The United States remains one of the world's most vibrant hubs for startup companies and other private-sector actors that are engaged in sustained innovation in AI-related fields. Numerous successful companies with substantial investments in AI, such as OpenAI and Meta,

¹⁶ United Nations. (n.d.). *Youth Declaration*. United Nations; United Nations. Retrieved May 29, 2023, from <https://www.un.org/en/transforming-education-summit/youth-declaration>

¹⁷ Augsberger, A., Collins, M. E., & Gecker, W. (2017). Best Practices for Youth Engagement in Municipal Government. *National Civic Review*, 106(1), 9–16.

were founded or co-founded by individuals who were 30 or younger.^{18,19} Many startups at top incubators like Y Combinator are often led by individuals 30 or younger as well.²⁰

Enhanced engagement between public policymakers and the community of youth-led startups, however, offers several benefits for both sides. For policymakers, engagement with youth startup founders, especially in deep tech, may enable policymakers to take better stock of novel technology breakthroughs to ensure new policies are relevant to cutting-edge information. For startups, such engagement offers youth founders the opportunity to highlight their concerns with existing regulations that may impede their ability to innovate, as well as may lead to further opportunities for public-private partnerships or public-sector support for novel companies.

Improving such mutually beneficial engagement could occur through several policy avenues. The White House Office of Science and Technology Policy, for example, could consider convening an annual Youth Startup Forum to enable constructive dialogue between executive branch offices and novel AI startups. Additionally, executive agencies could consider sending more personnel to monthly or bimonthly meetings with startup accelerators or incubators to identify novel technology or startups of significant value for public-sector actors.

It is worth noting that such approaches are not entirely without downsides for both sides. There is no guarantee that public sector actors would avoid regulating novel technologies in ways that youth founders do not enjoy, and similarly, there are important questions about conflicts of interest that may occur if lateral personnel transfer occurs between both sectors. However, in this comment, we will refrain from commenting on specific regulations or personnel practices — instead, we simply wish to highlight the benefits of improved communication and engagement to inform better federal policymaking in rapidly emerging technology areas.

Conclusion

The comment above outlines potential ways to address the specific effects AI can have on young people, as well as the costs and benefits of different approaches. We hope this analysis provides useful insights to aid OSTP in its policymaking.

¹⁸ Nguyen, B. (2023, May 29). *Meet OpenAI CEO Sam Altman, who learned to code at 8 and is a doomsday prepper with a stash of gold, guns, and Gas Masks*. Business Insider. <https://www.businessinsider.com/sam-altman-chatgpt-openai-ceo-career-net-worth-ycombinator-prepper-2023-1>

¹⁹ Alef, D. (2010). *Mark Zuckerberg: The face behind Facebook and social networking*. Titans of Fortune Publishing.

²⁰ Mixpanel Team. (2022, August 22). *How to get into Y combinator*. The Signal. <https://mixpanel.com/blog/getting-accepted-into-y-combinator/>