3324 NW 135th St.
Oklahoma City, OK 73120
phase2online.com
405-698-3722

March 27, 2024

Dear National Telecommunications and Information Administration,

On behalf of Phase 2, a software consultancy based in Oklahoma City, I am writing to provide comments in response to your Request for Comment ("RFC") on "Dual Use Foundation Artificial Intelligence Models With Widely Available Model Weights" (Docket No. NTIA–2023–0009).

As a software company at the forefront of artificial intelligence development, we believe that maintaining an open and transparent ecosystem for AI research and development is critical for driving innovation, supporting U.S. competitiveness, and ensuring this transformative technology benefits society as a whole. We are concerned that overly restrictive regulation of open AI models would undermine these important objectives without meaningfully reducing risks.

Following are the viewpoints we wish to express on select questions in the RFC that have the potential to impact us as a company and the industry as a whole.

Question 2: How do the risks associated with making model weights widely available compare to the risks associated with non-public model weights?

The risks associated with making AI model weights widely available are relatively limited compared to the substantial benefits of openness and transparency in this field. While there are potential risks that bad actors could misuse open models to generate disinformation, invade privacy, or create other harm, these risks are largely speculative at this stage. There is little concrete evidence that open models pose significantly greater dangers than closed,

3324 NW 135th St.
Oklahoma City, OK 73120
phase2online.com
405-698-3722

proprietary models developed by private companies. In fact, the lack of transparency around closed models means the public has no insight into their potential risks and downsides.

Open models, in contrast, allow for broad scrutiny by the AI ethics and security community to proactively identify and mitigate risks. Openness enables collaboration across academia, civil society, and industry to develop best practices and technical solutions to make models more robust and aligned with societal values. Restricting access to model weights would significantly impede this important work.

Claims that open models uniquely enable bad actors to generate deepfakes, spam, or other harmful content are overblown. Malicious users have numerous paths to access powerful AI capabilities, and shutting down open research will do little to change that. Broad access to AI technology is inevitable as computational costs decline. The U.S. should focus on maintaining its competitive edge through supporting an open ecosystem, not restricting it.

Regarding equity concerns, open models are far more likely to reduce disparities by enabling a broader range of researchers, startups, and communities to access and shape this transformative technology. Consolidating control over foundation models to a small group of tech giants would be far worse for equity. Historically, open-source software has been a powerful force for democratizing access to technology.

While open models could potentially be misused by authoritarian regimes, the much greater risk is these regimes developing their own advanced AI capabilities in the absence of democratic values. U.S. leadership in AI depends on cultivating a thriving open research community. We should pair openness with proactive efforts to bake in democratic values and individual rights.

Openness and transparency should be the default for AI development, with narrowly tailored restrictions only for specific high-risk use cases. Broad access to foundation models is essential for U.S. competitiveness, scientific progress, and the responsible development of AI in line with societal values. Policymakers should embrace open models as a key enabler of American innovation and work with industry and academia to mitigate risks through targeted measures, not sweeping restrictions on openness itself.

3324 NW 135th St.
Oklahoma City, OK 73120
phase2online.com
405-698-3722

Question 6: What are the legal or business issues or effects related to open foundation models?

The history of open-source software provides a useful analogy for understanding the potential impact of open AI models on innovation, competition, and intellectual property. Just as open-source software has driven immense value creation and technological progress over the past few decades, we believe open AI models will be a powerful catalyst for innovation across industries.

Making foundation model weights widely available lowers barriers to entry and enables a broader range of companies to develop AI applications. This is particularly beneficial for startups and small businesses that lack the resources to develop foundation models from scratch. Open models level the playing field and ensure the economic gains from AI are widely distributed. We expect this to drive competition and innovation in sectors like healthcare, education, and marketing as more players are able to leverage AI to build groundbreaking products and services.

While some argue that open models undermine the incentive to invest in AI development, the open-source software ecosystem demonstrates this is not the case. Companies can monetize open models through value-added services, enterprise features, and complementary software. An open ecosystem grows the overall market opportunity in AI rather than hindering it.

We believe the broader societal risks of labor disruption and economic concentration from closed AI models currently outweigh the risks of open models being misused for malicious purposes. The economic risks are orders of magnitude greater in the near term than speculative concerns about advanced AI systems going rogue. While the latter may represent a greater existential threat, there is no direct evidence that current model architectures or compute scales pose such a risk.

The concentration of economic power in the AI industry is a growing concern that cannot be ignored. As AI becomes ubiquitous across sectors, the potential for a small group of companies to dominate the global economy increases, leading to inequality, reduced innovation, and limited consumer choice. It is crucial to address this issue now before AI technologies cause massive economic disruption.

3324 NW 135th St.
Oklahoma City, OK 73120
phase2online.com
405-698-3722

Promoting competition in AI is critical to preventing economic overconcentration. However, the enormous cost of hardware necessary to train state-of-the-art models and the undersaturation of AI talent pose significant challenges. Even top research universities lack the resources to train new models at a meaningful scale, limiting their work to smaller-scale projects using existing models. Policymakers, industry leaders, and the public must collaborate to promote competition, ensure fair access to AI, and prevent the concentration of power.

This constraint on innovation has consequences beyond economic concentration and stagnation. The biases and beliefs of researchers at the few companies capable of building world-class models are already influencing training and fine-tuning protocols. As these models are increasingly used for core computing and decision-making across all sectors, the potential for concentration of power will be enormous.

Addressing these challenges will require billion-dollar initiatives and public-private partnerships at the state and federal levels to empower universities and businesses of all sizes. The forward-thinking work by the State of Oklahoma to encourage AI development, as exemplified in the final report of Oklahoma Governor Kevin Stitt's Task Force on Emerging Technologies (https://oklahoma.gov/content/dam/ok/en/governor/documents/Task%20Force%20Emerging%20Technologies%20AI%20Strategy%20for%20State%20Agencies%20in%20OK.pdf), provides an excellent model for other states to follow. The seeds of innovation will come from fostering greater competition and talent development.

Avoiding the economic pitfall of overconcentration can lead to a more hopeful future. While there will undoubtedly be major economic disruption across all fields, the productivity gains, creative empowerment, and labor improvements enabled by AI have the potential to benefit all of humanity.

From a legal perspective, the choice of open source license for model weights is important and warrants careful consideration. Permissive licenses like MIT and Apache 2.0 place minimal restrictions on commercial use and modification, maximizing flexibility for developers. More restrictive licenses like the GPL require derivative works to be released under the same license terms, which can limit commercial applications.

3324 NW 135th St.
Oklahoma City, OK 73120
phase2online.com
405-698-3722

We believe permissive licenses are most conducive to innovation in the AI ecosystem. They provide legal clarity for developers while imposing minimal constraints on commercialization. Avoiding license proliferation and incompatibilities is also important to prevent fragmentation. Efforts to standardize around a small set of proven open licenses would help reduce friction.

At the same time, certain use case-specific restrictions may be appropriate for foundation models that are high-risk or have major societal implications, such as in healthcare. Targeted restrictions on commercial use in sensitive domains, along with transparency and reporting requirements, could help balance openness with public interest protections.

Ultimately, we believe policymakers should establish intellectual property frameworks for open models that preserve flexibility for commercial innovation while mitigating risks. This could involve safe harbors for research and development and tailored rules for sensitive applications. Broad restrictions on open models would be counterproductive and undermine U.S. competitiveness.

In conclusion, Phase 2 believes that open foundation models will be a major driver of technological progress and economic opportunity in the coming years. Policymakers should embrace openness as the default paradigm while developing targeted legal and governance frameworks to address risks. Doing so will ensure the U.S. remains at the forefront of AI innovation in the face of rising global competition.

Thank you for the opportunity to provide our perspective on this important issue. We look forward to further dialogue with NTIA and other stakeholders to advance responsible AI development.

Sincerely,

Jeremy Waller

Director of Consulting Services & A.I.

Phase 2 Development, LLC