



COMMONWEALTH of VIRGINIA

Executive Department

EXECUTIVE DIRECTIVE NUMBER FIVE (2023)

RECOGNIZING THE RISKS AND SEIZING THE OPPORTUNITIES OF ARTIFICIAL INTELLIGENCE

By virtue of the authority vested in me as Governor, I hereby issue this Executive Directive to ensure the responsible, ethical and transparent use of artificial intelligence technology by state government in order to protect the rights of Virginians and develop targeted, innovative uses for this emerging technology to help deliver a best-in-class state government.

Importance of the Initiative

The widespread availability of artificial intelligence (AI) products will rapidly expand our analytical power over the coming years. These enhanced computing systems have the potential to increase productivity, transform work and impact the way government operates. The technologies also pose significant challenges, including job displacement, social and privacy intrusion, and the potential for both positive and negative impacts on education. Policymakers at both the federal and state levels are working to understand this technology and establish necessary guardrails; however, the pace is too slow.

The Commonwealth of Virginia is home to a rapidly evolving entrepreneurial ecosystem and one of the most innovative workforces in the nation. Virginia's colleges and universities lead the nation in technology research and development, and the most critical national security and military intelligence institutions in the United States are headquartered in Virginia. These unique factors charge Virginia with a responsibility to spearhead a policy environment that drives trust, safety and security in the development and deployment of AI technologies.

While the nation seeks to understand and adapt to this fast-moving technology, the Commonwealth urgently needs standards and protocols to frame the adaptation of AI across state government. Virginia must proactively and deliberatively prepare for this transformative technology to take advantage of the benefits while mitigating the risks.

Preamble

In order to establish internal guardrails for the use of AI technologies and identify the best uses and practices across state government in a timely manner, I am directing the Office of

Regulatory Management, in coordination with the Chief Information Officer and relevant Secretariats, to establish standards for the use of AI technology by state government and identify areas for piloting and testing of AI to make government work better for Virginians. The Commonwealth must meet the challenges and opportunities posed by this transformative technology, ensuring that the Commonwealth remains competitive and innovative in the years to come while protecting its citizens from its risks and potential threats.

Directive

Accordingly, pursuant to the authority vested in me as the Chief Executive Officer of the Commonwealth, and pursuant to Article V of the Constitution of Virginia and the laws of the Commonwealth, I hereby direct the Office Regulatory Management, in consultation with the Chief Information Officer and relevant Secretariats, to take the following actions:

- I. Legal and Regulatory Environment
 - a. Review, in consultation with the Office of the Attorney General, existing laws and regulations that may apply to AI, such as privacy laws or intellectual property laws, and determine if any updates or changes are necessary to address AI-specific issues and ensure the public is properly protected.
 - b. Ensure that the use of AI by state government is transparent, secure and impartial and that there are sufficient safeguards in place to protect individual privacy rights.
 - c. Make recommendations for uniform standards for the responsible, ethical and transparent use of AI across all state agencies and offices including:
 - i. Information technology (IT) and systems standards to govern the use of AI by state agencies.
 - ii. Education guidelines for the use of AI in K-12 public schools and higher education institutions.
 - iii. Policy standards for when and how AI can be used within state government, such as requiring disclaimers and approval processes.
 - iv. Legal standards for state agencies and departments which may require legislative changes.
- II. Education and Workforce Development
 - a. Work with the Department of Education, SCHEV and our institutions of higher education to develop a plan to accomplish the following goals:
 - i. Promote guidelines for the use of AI tools which would impact learning and prohibit cheating on schoolwork.
 - ii. Examine the potential uses of AI tools for personalized tutoring, especially in K-12.
 - iii. Include AI-related topics within technology, computer science and data analytics courses in K-12 and higher education to ensure students are equipped with the skills and knowledge needed to succeed in a rapidly changing world.
 - b. Examine efforts to include AI technologies in workforce development.

- i. Ensure that Virginia’s K-12 students are prepared for future careers that involve AI technologies, including partnerships with community colleges, workforce development programs and industry associations.
- ii. Support opportunities for Virginia colleges and universities to contribute to AI research and training, through collaborations with other academic institutions, private companies and government agencies.

III. Modernization of State Government

- a. Identify opportunities for the secure and transparent use of AI technologies to improve efficient and effective state government operations.
- b. Evaluate the potential effects of AI technologies on state government functions and workforce, including changes to the nature of work, and recommend how Virginia can best prepare and support state government employees through this transition while protecting Commonwealth data and public privacy.
- c. Develop ethical guidelines and best practices for the use of AI in state government decision-making, with a focus on ensuring transparency and accountability in AI algorithms and decision-making processes.

IV. Economic Development and Job Creation

- a. Work with the Virginia Economic Development Partnership to develop a plan to accomplish the following goals:
 - i. Identify potential industry clusters that may benefit from AI in Virginia, such as healthcare or transportation.
 - ii. Explore ways to encourage AI innovation and entrepreneurship, including incubators, accelerators and other programs that support startups and early-stage companies.
 - iii. Assess the risks and opportunities of AI on the labor market in Virginia, including which types of jobs may be displaced by automation and which new jobs may be created.
 - iv. Develop strategies to support workers impacted by AI.
 - v. Coordinate with schools and workforce programs on steps needed to develop an AI-ready next generation.
- b. Work with the Virginia Department of Energy to better understand the impact of AI on our power generation requirements within the Commonwealth resulting from the expected increase in energy demands due to the growing computing capacity requirements necessitated by increased adoption of AI.

The Office of Regulatory Management in coordination with the Chief Information Officer shall complete the above actions and deliver its recommendations by no later than December 15, 2023.

Effective Date of the Executive Directive

This Executive Directive shall be effective upon signing and shall remain in full force and effect unless amended or rescinded by further executive order or directive. Given under my hand and under the Seal of the Commonwealth of Virginia this 20th day of September, 2023.



Glenn Youngkin
Glenn Youngkin, Governor

Attest:
Kelly Gee
Kelly Gee, Secretary of the Commonwealth