Date of Hearing: May 1, 2025 Fiscal: Yes

## ASSEMBLY COMMITTEE ON PRIVACY AND CONSUMER PROTECTION Rebecca Bauer-Kahan, Chair AB 222 (Bauer-Kahan) – As Amended April 7, 2025

#### **PROPOSED AMENDMENTS**

SUBJECT: Data centers: energy usage reporting and efficiency standards: electricity rates

#### **SYNOPSIS**

Over the past five years, the development of artificial intelligence (AI) systems has accelerated rapidly, with the potential to transform the economy. These systems include large language models, such as OpenAI's ChatGPT and Google's Gemini, general-purpose chatbots trained on massive amounts of information and adaptable to a wide range of tasks. Despite their growing influence, how these systems actually operate and the specifics of their training remain largely opaque.

Recently, many AI developers have announced major investments in expanding data centers to support more powerful computing needs required to train increasingly sophisticated AI systems. However, these expansions have revealed that the training and deployment of AI systems are extraordinarily energy- and resource-intensive. This raises important questions about whether the existing electrical grid can handle the significant increase in electricity demand generated by AI technologies. Additionally, there are concerns that the costs associated with ensuring grid resilience could be unfairly passed on to other ratepayers, many of whom may not directly benefit from these technologies.

This author-sponsored bill would address these concerns by requiring developers of the largest and most power-intensive AI systems to publicly disclose the amount of energy consumed during the training of their models. The bill would also require the California Energy Commission (CEC) to adopt energy efficiency standards for data centers to ensure that California's climate goals are not compromised in the pursuit of technological advancement. Additionally, data centers would be required to provide specific information to the CEC before beginning operations. The CEC would be mandated to include energy consumption trends for data centers in its Integrated Energy Policy Report. Further, the bill would require the California Public Utilities Commission (PUC) to consider whether the costs and expenses associated with new data center developments should be passed on to other ratepayers who may not directly benefit from the facilities.

This bill is supported by the Center for AI and Digital Policy, the Transparency Coalition, and a variety of environmental organizations, including the Sierra Club. It is opposed by various trade organizations, including TechNet, the California Chamber of Commerce, and the California Blockchain Advocacy Coalition.

While the bill currently focuses on reporting requirements related to the energy consumption involved in training AI models, it is important to note that energy usage continues even after

deployment. As noted in Comment #8, Committee amendments would expand the reporting requirements to include the energy usage of AI models post-deployment.

*This bill was previously heard by the Utilities and Energy Committee, where it passed with a 13–5 vote.* 

# THIS BILL:

- 1) Defines the following terms:
  - a. "Artificial intelligence" or "AI" means an engineered or machine-based system that varies in its level of autonomy and that can, for explicit or implicit objectives, infer from the input it receives how to generate outputs that can influence physical or virtual environments.
  - b. "Computer room" means a room within a building whose primary function is to house electronic equipment and that has a design information technology equipment power density exceeding 20 watts per square foot or 215 watts per square meters of conditioned floor area.
  - c. "Covered model" means an AI model developed using a quantity of computing power exceeding 10^25 integer or floating-point operations.
  - d. "Data center" means a building the primary function of which is to house one or more computer rooms with an energy demand of at least 5 megawatts.
  - e. "Developer" means a person, partnership, state or local government agency, or corporation that designs, codes, trains, or otherwise produces a covered model.
  - f. "Information Technology Equipment" includes computers, data storage, servers, and network or communication equipment located in a computer room.
- 2) Requires a developer before using a covered model commercially, or before making a covered model available for use by a third party, to do both of the following:
  - a. Calculate both of the following:
    - i. The total energy, in megawatt hours, used to develop the covered model.
    - ii. The percentage of total energy used to develop the covered model that was generated in California.
  - b. Publish the energy usage data estimated on the developer's internet website.
- 3) Requires energy usage data published to be all of the following:
  - a. Publicly available for as long as the developer continues to use the covered model or continues to make the covered model available for use by a third party.
  - b. Provided at no cost to a user of the developer's internet website.

- c. Accessible and comprehensible to a natural person with ordinary cognitive abilities.
- 4) Requires the CEC to adopt efficiency standards for data centers that do all of the following on or before January 1, 2027:
  - a. Are technologically feasible and cost effective.
  - b. Align with California's greenhouse gas emission reduction targets.
  - c. Require new data centers and substantial alterations to existing data centers to incorporate load-management and load-shifting capabilities, including the ability to participate in demand response programs.
- 5) Requires data centers to report all of the following information to the CEC before initially operating as a data center and following any change that materially affects the correctness of information previously provided to the commission:
  - a. The name of the data center.
  - b. Any physical addresses associated with the operation of the data center.
  - c. The internet website of the data center if the data center has an internet website.
  - d. A telephone number and email address for a point of contact for the commission to communicate with the data center.
- 6) Requires the CEC to include energy consumption trends for data centers in its integrated energy policy report.
- 7) Requires the PUC to determine whether those costs and expenses are just and reasonable in an application by an electrical corporation to recover costs and expenses arising from, or incurred as a result of, the construction of a new data center or a substantial alteration to an existing data center.
- 8) Requires the PUC to minimize the shifting of costs attributable to the construction or alteration of the data center to ratepayers who do not directly benefit from the data center in determining whether costs and expenses are just and reasonable.

## **EXISTING LAW:**

- 1) Mandates the PUC to ensure that all charges from a public utility shall be just and reasonable. (Pub. Util. Code § 451.)
- 2) Mandates the CEC to develop energy policies that conserve resources, protect the environment, ensure energy reliability, enhance the state's economy, and protect public health and safety. (Pub. Res. Code § 25301(a).)
- 3) Requires the CEC to generate an Integrated Energy Policy Report, or IEPR every two years, which will include, among other things, an assessment of resources and a forecast of reliability and energy usage. (Pub. Res. Code § 25302.)

 Grants the CEC the authority to hold public hearings and stakeholder processes to best assess the necessary reporting and efficiency standards for buildings. (Pub. Res. Code § 25402(b)(4).)

## **COMMENTS**:

#### 1) Author's statement. According to the author:

Across California, energy-intensive data centers are being built to support the rapid expansion of the artificial intelligence (AI) industry. These data centers increase energy demand and frequently require expansions to the electrical grid; together, these factors threaten to increase energy costs for Californians. AB 222 creates accountability for data centers by increasing transparency around their energy use, adopting energy efficiency standards, and preventing grid development costs from being passed onto ratepayers. California's energy costs are already among the highest in the country, and ratepayers should not be forced to bear the additional costs of AI development.

2) **AI and GenAI.** The development of GenAI is creating exciting opportunities to grow California's economy and improve the lives of its residents. GenAI can generate compelling text, images and audio in an instant – but with novel technologies come novel safety concerns.

In brief, AI is the mimicking of human intelligence by artificial systems such as computers. AI uses algorithms – sets of rules – to transform inputs into outputs. Inputs and outputs can be anything a computer can process: numbers, text, audio, video, or movement. AI is not fundamentally different from other computer functions; its novelty lies in its application. Unlike normal computer functions, AI is able to accomplish tasks that are normally performed by humans.

AI that are trained on small, specific datasets in order to make recommendations and predictions are sometimes referred to as "predictive AI." This differentiates them from GenAI, which are trained on massive datasets in order to produce detailed text and images. When Netflix suggests a TV show to a viewer, the recommendation is produced by predictive AI that has been trained on the viewing habits of Netflix users. When ChatGPT generates text in clear, concise paragraphs, it uses GenAI that has been trained on the written contents of the internet.

GenAI tools can be released in open-source or closed-source formats by their creators. Opensource tools are publically available; researchers and developers can access their code and parameters. This accessibility increases transparency, but it has downsides: when a tool's code and parameters can be easily accessed, they can be easily altered, and open-source tools have the potential to be used for nefarious purposes such as generating deepfake pornography and targeted propaganda. By comparison, closed-source tools are opaque with respect to their security features. It is harder for bad actors to generate illicit materials using these tools. But unlike open-source tools, closed-source tools are not subject to collective oversight because their inner workings cannot be examined by independent experts.

3) **Data Centers and AI.** Data centers are facilities that house critical computing infrastructure, including servers, data storage systems, and network equipment. These facilities support a wide range of functions, from running web-based applications and supporting e-commerce to ensuring cybersecurity operations. Data centers can be located on-site at a company's premises, operated

as colocation facilities where businesses rent space for their servers, or exist as cloud data centers, where companies lease computing infrastructure from third-party providers and outsource the maintenance of physical hardware.<sup>1</sup> According to a Lawrence Berkeley National Laboratory study, data centers currently account for approximately 4.4% of total U.S. energy consumption. However, this energy use is highly concentrated in specific regions, such as Northern Virginia and California's Bay Area.<sup>2</sup>

Data centers have become a cornerstone of the AI revolution. Training sophisticated AI systems, such as large language models (LLMs), requires tremendous computing power (measured in floating-point operations per second, or FLOPS) and extensive data storage, both of which are provided by modern data centers. Unlike most traditional computing tasks, which rely primarily on central processing units (CPUs), AI systems utilize graphics processing units (GPUs). CPUs are designed for the sequential processing of information, making them ideal for everyday electronic devices. In contrast, GPUs excel at parallel processing, enabling them to handle the massive datasets required to train AI models more efficiently.<sup>3</sup>

AI systems are typically trained to recognize patterns and generate predictions based on statistical analyses of user inputs, processes that demand immense and simultaneous computations. Consequently, GPUs have become the workhorse of AI development. Notably, GPUs are now being specifically engineered for greater stability and efficiency to better meet the operational demands of data centers.<sup>4</sup>

4) **AI's Amped up Energy Boom**. Several major companies investing in AI, including Microsoft, Google, and Meta, have announced multibillion-dollar commitments to expand their data center infrastructure and boost computing power.<sup>5</sup> It should be noted that Microsoft has recently pulled back on some of its commitments, likely in response to the federal administration's evolving tariff policies.<sup>6</sup> Nevertheless, these mass investments are expected to further accelerate the development of AI technologies across the United States. However, they also raise critical questions about the strain new data centers may place on California's power grid and whether the proliferation of facilities could further stress an already burdened system.

As noted above, AI development demands far more FLOPS than traditional computing. This stems from the immense energy requirements of GPUs, which are used to process vast datasets simultaneously. AI models must be trained and retrained through numerous iterations to ensure proper functionality, requiring continuous, around-the-clock electricity for weeks or even months. Additionally, data centers must expend significant energy and water resources to keep

<sup>&</sup>lt;sup>1</sup> Stephanie Susnjara and Ian Smalley, "What is a data center?", *IBM* (Sept. 4, 2024), accessed at <u>http://ibm.com/think/topics/data-centers</u>.

<sup>&</sup>lt;sup>2</sup> Arman Shehabi et al. "2024 United States Data Center Energy Usage Report", *Lawrence Berkeley National Laboratory* (Dec. 2024), accessed at <u>https://www.energy.gov/articles/doe-releases-new-report-evaluating-increase-electricity-demand-data-centers</u>.

<sup>&</sup>lt;sup>3</sup> Amazon "What's the Difference Between GPUs and CPUs?" *Amazon Web Services*, accessed at <u>https://aws.amazon.com/compare/the-difference-between-gpus-cpus/</u>. <sup>4</sup> *Ibid*.

<sup>&</sup>lt;sup>5</sup> Karen Weise, Laura Bult, James Surdam and Ramon Dompor, "How A.I. Companies Are Turning Into Energy Companies", *The New York Times* (Mar. 17, 2025), accessed at <u>https://www.nytimes.com/video/business/energy-environment/100000010036088/how-ai-companies-are-turning-into-energy-companies.html</u>.

<sup>&</sup>lt;sup>6</sup> Joe Wilkins, "Something's Gone Wrong With Microsoft's Huge AI Data Center Investments", *Futurism* (Apr. 3, 2025), accessed at <u>https://futurism.com/microsoft-huge-data-center-investments-tariffs</u>.

these facilities cool enough to prevent equipment from overheating, compounding their already substantial energy needs.<sup>7</sup>

The California Chamber of Commerce, along with a coalition of trade groups, argues that modern data centers have become more energy-efficient, stating:

Data centers are highly efficient facilities that enable energy savings and efficiencies economy-wide. In 2010, nearly 80 percent of data center computing was conducted in smaller traditional computer centers, largely owned and operated by non-technology companies. By 2018, approximately 89% of data center computing took place in larger cloud data centers. By centralizing computing resources, data centers have leveraged innovations in design, equipment, and technology to maximize energy efficiency. While electricity consumption at data centers rose 6% from 2010 to 2018, computing output jumped 550%, marking significant gains in efficiency and productivity.

While it is true that hardware improvements have led to greater energy efficiency, the data cited does not account for the explosive energy demands of the AI sector. Data centers accounted for 4.4% of U.S. electricity consumption in 2023, and Lawrence Berkeley National Laboratory projects that figure will rise to between 6.7% and 12% by 2028.<sup>8</sup> On a granular level, OpenAI's GPT-4, released in 2024, consumed 50 gigawatt-hours of energy during training, 50 times more than GPT-3, which is equivalent to the annual energy consumption of 3,600 California homes.<sup>9</sup> This soaring demand has prompted AI companies to pursue alternative energy strategies. For instance, Microsoft recently struck a deal with Constellation Energy to reopen the Three Mile Island nuclear power plant off the coast of South Carolina to power its AI operations.<sup>10</sup>

Some progress in energy-efficient AI development has been demonstrated by the Chinese AI company DeepSeek with the release of its DeepSeek-R1 chatbot. This model performs comparably to major LLMs like GPT, Gemini, and LLaMA but was significantly less energy-intensive and cheaper to train. DeepSeek achieved these efficiencies by training specific parts of the model individually rather than all at once, a technique that could reduce overall energy usage across the industry.<sup>11</sup> However, paradoxically, as the energy and cost barriers to training AI models lower, more players could enter the market, potentially increasing overall energy consumption despite individual gains in efficiency.<sup>12</sup>

<sup>&</sup>lt;sup>7</sup> David Gelles, "The A.I. Power Grab", *The New York Times* (Oct. 22, 2024), accessed at <u>https://www.nytimes.com/2024/10/22/climate/ai-big-tech-emissions.html</u>.

<sup>&</sup>lt;sup>8</sup> Arman Shehabi et al. "2024 United States Data Center Energy Usage Report", *Lawrence Berkeley National Laboratory* (Dec. 2024), accessed at <u>https://www.energy.gov/articles/doe-releases-new-report-evaluating-increase-electricity-demand-data-centers</u>.

<sup>&</sup>lt;sup>9</sup> Tejas Dessai, "AI Hinges on Rapid Electrification", *Global X* (Feb. 27, 2025), accessed at <u>https://www.globalxetfs.com/articles/ai-hinges-on-rapid-electrification</u>.

<sup>&</sup>lt;sup>10</sup> C. Mandler, "Three Mile Island nuclear plant will reopen to power Microsoft data centers", *NPR* (Sept. 20, 2024), accessed at <u>https://www.npr.org/2024/09/20/nx-s1-5120581/three-mile-island-nuclear-power-plant-microsoft-ai</u>.

<sup>&</sup>lt;sup>11</sup> Lauren Laws, "Why DeepSeek could be good news for energy consumption", *University of Illinois Urbana-Champaign* (Feb. 6, 2025), accessed at <u>https://grainger.illinois.edu/news/stories/73489</u>.

<sup>&</sup>lt;sup>12</sup> Greg Rosalsky, "Why the AI world is suddenly obsessed with a 160-year-old economics paradox", *NPR* (Feb. 4, 2025), accessed at <u>https://www.npr.org/sections/planet-money/2025/02/04/g-s1-46018/ai-deepseek-economics-jevons-paradox</u>.

Energy use does not stop at model training. Once deployed, AI models engage in inference, the process of generating predictions or answering inquiries based on user inputs, which remains highly energy-intensive. For example, a single query on ChatGPT requires ten times more energy than a traditional Google search.<sup>13</sup> Generating one AI-created image can consume energy equivalent to fully charging a smartphone. Because these systems operate continuously, the cumulative energy impact is significant. Notably, inference energy consumption has not seen the same efficiency gains as training. DeepSeek's model, for instance, uses a comparable amount of energy per inquiry as other major AI models.<sup>14</sup>

5) What this bill would do. As energy consumption associated with the development and deployment of AI models continues to grow, this bill would establish several mechanisms to increase transparency regarding the energy required to train AI systems and the overall energy usage of data centers. Additionally, the bill would empower the PUC to prevent the costs of building or renovating data centers from being unfairly shifted onto other ratepayers who may not directly benefit.

Specifically, the bill would require developers of AI models that use a computing capacity exceeding 10<sup>25</sup> integer or FLOPS to calculate the total amount of energy consumed during the training of the model, including the portion specifically used in California, prior to releasing the model to the public. Developers must then publish this information prominently on their websites, ensuring it remains accessible for as long as the model is in use. The disclosures must be freely available to the public and presented in a way that is easy to understand.

The bill would also require the CEC to adopt energy efficiency standards for data centers that are technologically feasible and aligned with the state's greenhouse gas emissions goals. In addition, the CEC would be tasked with adopting standards to encourage load management and load-shifting capabilities, such as participation in demand response programs, for both new and existing data centers.

Furthermore, before beginning operations, new data centers would be required to report key information to the CEC, including the center's name, address, website, and a point of contact. The CEC would also be required to track and report on energy consumption trends for data centers as part of its Integrated Energy Policy Report.

Finally, the bill would direct the PUC to assess whether the costs and expenses incurred by electrical corporations for the construction or substantial modification of data centers are reasonable. Crucially, the PUC would be required to minimize the shifting of these costs onto ratepayers who do not directly benefit from the data center's operations.

6) **Trade Secret**? One major question regarding AI companies' energy usage is whether it is trade secret. The Los Angeles Business Federation writing in opposition argues:

<sup>&</sup>lt;sup>13</sup> Marcel Salathé, "Does ChatGPT use 10x more energy than a standard Google search?", *Substack* (Jan. 15, 2025), accessed at <u>https://engineeringprompts.substack.com/p/does-chatgpt-use-10x-more-</u>energy?utm campaign=post&utm medium=web.

<sup>&</sup>lt;sup>14</sup> Christa Marshall, "Game changer? What 'DeepSeek' AI means for electricity.", *POLITICO* (Jan. 29, 2025), accessed at <u>https://www.eenews.net/articles/game-changer-what-deepseek-ai-means-for-electricity/</u>.

The proposed energy and water disclosure requirements would force companies to share highly sensitive operational data that could reveal proprietary business information. For multi-tenant data centers—serving hundreds of diverse customers, including financial services, cloud providers, and public institutions—this level of disclosure jeopardizes competitive positioning and creates a disincentive to expand or invest in California.

Under California law, a "trade secret" is defined as information, including a formula, pattern, compilation, program, device, method, technique, or process, that (1) derives independent economic value, actual or potential, from not being generally known to the public or to others who could obtain economic value from its disclosure or use, and (2) is subject to reasonable efforts to maintain its secrecy.<sup>15</sup> To evaluate the claim that energy usage constitutes a trade secret, there must be verifiable evidence that such information is essential to protect and that its disclosure would reasonably harm a company's financial interests.

It is undisputable that energy consumption is integral to the training of AI models. However, the amount of energy consumed does not necessarily correlate with the quality or innovation of the models themselves. For example, DeepSeek developed a model comparable to other leading AI systems while using significantly less energy. Additionally, Google disclosed the total energy usage for training its large language models in 2022 and 2023, without suffering any apparent loss of competitive advantage.<sup>16</sup> On the contrary, DeepSeek's disclosure enhanced its competitive position by demonstrating greater efficiency relative to its rivals.

While companies like Meta and Apple have not disclosed the specific energy usage for training their AI models, they have regularly reported the overall electricity usage of their data centers.<sup>17</sup> With sufficient knowledge of industry standards and operations, competitors and observers could likely estimate the energy consumed for AI development based on these broader disclosures. Thus, while some concerns over proprietary information are understandable, the argument that disclosing energy usage alone constitutes a protectable trade secret appears to lack strong support in practice.

7) **Energy disclosures a security risk?** The other aspect of this bill that sits in this committee's jurisdiction is whether disclosures of energy usage are a threat to data centers' cybersecurity. The Data Center Coalition, alongside a coalition of trade groups, argues that energy disclosure could endanger cybersecurity, stating:

Sharing of this information may leave this critical infrastructure more exposed to cyber threats, industrial espionage, and potential exploitation by foreign adversaries. In Virginia, the largest data center market in the U.S., a similar measure to impose such reporting requirements was introduced during this year's legislative session but was not advanced due to national security concerns.

The letter references the Virginia bill HB 2035, which opponents assert did not advanced due to national security concerns. However, the bill was withdrawn by its author during a hearing in the

<sup>&</sup>lt;sup>15</sup> Civ. Code §§ 3426–3426.11.

<sup>&</sup>lt;sup>16</sup> Eric Masanet, Nuoa Lei, and Jonathan Koomey, "To better understand AI's growing energy use, analysts need a data revolution", *Joule* 8, 1–10 (September 18, 2024), accessed at

https://www.sciencedirect.com/science/article/abs/pii/S2542435124003477.

Virginia Labor and Commerce Subcommittee #3, and the archives on Virginia's legislative website do not provide any evidence linking the bill's withdrawal to national security issues.<sup>18</sup> Even if national security concerns were cited as the reason for halting the bill, it's important to note that Virginia's data centers, particularly those located around Washington, D.C., likely have a more significant role in national security than AI models developed and marketed for public use. It remains unclear how disclosing the amount of energy used by an AI model developer could expose cybersecurity to threats from foreign adversaries.

This bill does require that new data centers report certain identifying characteristics to the CEC, but it does not mandate that this information be made publicly accessible. Under current law, any building larger than 50,000 square feet, including data centers, must disclose its energy usage to the CEC for benchmarking purposes, with 59 such buildings reported in 2023.<sup>19</sup> This information is accessible via an interactive map on the CEC website and has not led to any reported major security risks. And, again, the information required under this bill would be shared only with the CEC, not the public.

8) **Amendments.** As noted earlier, the energy consumption of an AI model extends well beyond its deployment. Recently, Sam Altman, CEO of OpenAI, shared on the social media platform X that even something as simple as saying "please" and "thank you" to their models has cost OpenAI "tens of millions of dollars" due to the additional compute power required to process those extra words.<sup>20</sup> Furthermore, an investigative piece by *The Washington Post*, in collaboration with researchers from the University of California, Riverside, found that a single 100-word AI written email requires 0.14 kilowatt-hours (kWh) of electricity, which is enough to power 14 LED light bulbs for one hour. If a person were to send such an email once a week for an entire year, this would amount to 7.5 kWh, the equivalent of powering 9.3 households in Washington, D.C., for one hour.<sup>21</sup>

Given the significant energy demands associated with operating AI models, the author has agreed to an amendment requiring developers of covered models to annually disclose the amount of energy used in their operation. This amendment would apply only to the developers of AI models under their control and would not extend to third parties using open-access models. The Committee amendment is as follows:

**25345.1.** (*a*) Before using a covered model commercially, or before making a covered model available for use by a third party, a developer shall do both of the following:

(a) Calculate(1) *Estimate* both of the following:

(1A) The total energy, in megawatthours, used to develop the covered model.

<sup>21</sup> Pranshu Verma and Shelly Tan, "A bottle of water per email: the hidden environmental costs of using AI chatbots," *The Washington Post* (Sept. 18, 2024), accessed at

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https://css.washingtonpost.com/technology/2024/09/18/energy-ai-use-electricity-water-data-centers/.
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<sup>&</sup>lt;sup>18</sup> Bill information can be found at <u>https://lis.virginia.gov/bill-details/20251/HB2035</u> and stream of hearing can be found at <u>https://virginiageneralassembly.gov/house/chamber/chamberstream.php</u>.

<sup>&</sup>lt;sup>19</sup> AB 802 Williams, Ch. 590, Stats. 2015.

<sup>&</sup>lt;sup>20</sup> Joe Wilkins, "Sam Altman Admits That Saying 'Please' and 'Thank You' to ChatGPT Is Wasting Millions of Dollars in Computing Power", *Futurism* (Apr. 19, 2025), accessed at <u>https://futurism.com/altman-please-thanks-chatgpt</u>.

(2B) The percentage of total energy used to develop the covered model that was generated in California.

(b) (2) Publish the energy usage data estimated pursuant to subdivision (a) paragraph (1) on the developer's internet website.

(b) Beginning January 1, 2027, and annually on January 1 thereafter, a developer shall do both of the following:

(1) Estimate both of the following:

(A) The total energy, in megawatthours, used by the developer to operate the covered model during the previous calendar year.

(B) The percentage of the total energy estimated pursuant to subparagraph (A) that was generated in California.

(2) Publish the energy usage data estimated pursuant to paragraph (1) on the developer's internet website.

(2c) Energy usage data published pursuant to paragraph (1) this section shall be all of the following:

(A1) Publicly available for as long as the developer continues to use the covered model or continues to make the covered model available for use by a third party.

(**B**2) Provided at no cost to a user of the developer's internet website.

(C3) Accessible and comprehensible to a natural person with ordinary cognitive abilities

ARGUMENTS IN SUPPORT: California Environmental Voters, write in support:

The rapid development of the AI industry is fueling a boom in data center construction in California. These facilities, which house the servers and hardware needed to train and operate AI, require vast amounts of electricity. According to a recent article in the Los Angeles Times: "In Santa Clara — the heart of Silicon Valley — electric rates are rising as the municipal utility spends heavily on transmission lines and other infrastructure to accommodate the voracious power demand from more than 50 data centers, which now consume 60% of the city's electricity. And earlier this year, Pacific Gas & Electric told investors that its customers have proposed more than two dozen data centers, requiring 3.5 gigawatts of power — the output of three new nuclear reactors. "

Large AI models require a tremendous amount of energy to develop. At the same time, the rapid expansion of the AI industry is driving the widespread construction of energy-intensive data centers across the state. The increase in energy demand due to AI, paired with grid infrastructure expansion necessitated by the construction and expansion of data centers, threatens to increase energy costs for Californians

AB 222 creates transparency around energy usage by developers of artificial intelligence (AI) models and data centers, creates energy efficiency standards for data centers, and prevents the cost of constructing new data centers from being passed onto ratepayers.

**ARGUMENTS IN OPPOSITION:** In opposition to the bill, Technet alongside a coalition of trade groups argues:

Mandating the disclosure of detailed proprietary and sensitive operational details indicating computer workloads, energy consumption and changes, water consumption and changes, water sourcing, and other elements can be used by business competitors to deduce trade secrets and inform competitive strategies. Sharing of this information may leave this critical infrastructure more exposed to cyber threats, industrial espionage, and potential exploitation by foreign adversaries. In Virginia, the largest data center market in the U.S., a similar measure to impose such reporting requirements was introduced during this year's legislative session but was not advanced due to national security concerns.

Additionally, isolating energy consumption specifically for artificial intelligence (AI) model training and development is difficult to accomplish, given the multifaceted role of data centers. These facilities underpin a diverse array of services, transactions, and applications across numerous industries. Supporting the training and development of AI models is merely one component of the broader functions supported by data centers.

User demand by industry also varies by market. For instance, a 2024 analysis reveals that while the Los Angeles data center market allocates a significant portion (55%) to cloud computing, alongside supporting sectors like technology, telecom, and healthcare, the Northern California market demonstrates an even greater concentration, with approximately 70% of its capacity dedicated to cloud compute.

Data centers fuel economic growth, supporting jobs in technology, construction, engineering, and maintenance. Data centers also attract investment from cloud providers, AI developers, and enterprise IT, strengthening California's digital economy. AB 222 risks stifling job creation and innovation by discouraging data center expansion.

California's position as a global technology leader depends on the vital infrastructure provided by data centers underscores the need for careful consideration of proposed legislation that could impact this critical industry. We strongly urge the Committee to resist advancing AB 222 or other measures that impose disparate reporting requirements, as these create unnecessary burdens and raise serious concerns related to privacy, security, feasibility, and competition, while failing to deliver tangible benefits to the state.

## **REGISTERED SUPPORT / OPPOSITION:**

## Support

350 Bay Area Action California Environmental Voters (formerly Clcv) Compute Exchange INC. Sierra Club Sustainable Rossmoor The Center for Ai and Digital Policy Transparency Coalition.ai

# Opposition

2 Individuals **Bay Area Council** CA Blockchain Advocacy Coalition CalChamber California African American Chamber of Commerce California Hispanic Chambers of Commerce California Hispanic Chambers of Commerce (CHCC) California Pacific Asian Chamber of Commerce (CalAsian Chamber) California State Association of Electrical Workers **Central Valley Business Federation** Chamber San Mateo County Coalition of California Utility Employees Data Center Coalition Los Angeles County Business Federation Los Angeles County Business Federation (BIZFED) San Diego Regional Chamber of Commerce San Mateo County Economic Development Association (SAMCEDA) Santa Barbara South Coast Chamber of Commerce Silicon Valley Leadership Group Techca Technet Vica

Analysis Prepared by: John Bennett / P. & C.P. / (916) 319-2200