

A Vision for the Future: The Bingham Labs Smart-Grid and Agentic AI Initiative

Bingham Labs is spearheading a groundbreaking initiative at the nexus of advanced Smart-Grid technology and sophisticated Agentic Artificial Intelligence (AI). Our project centers on deploying a customized tablet program loaded with proprietary software that integrates next-generation AI, specifically leveraging AI agent technology, to fundamentally transform user productivity and local economic activity.

binghamlabs.com/video/Bingham_Labs_Future.mp4

The Beta Test and Infrastructure Deployment

To realize this transformative vision, Bingham Labs is actively seeking and securing grant funding to enable a crucial beta test phase. We propose engaging a telecommunications and leading infrastructure provider, such as Comcast (or a similar prime contractor), to establish and manage a focused beta cohort.

- * Target Group: The test will involve 100 to 200 volunteer participants along a strategic corridor. After testing it can go anywhere as research indicates 37% of Colorado's 6 million population has fiber optic connectivity
- * Existing Infrastructure Leverage: The selected contractor, like Comcast, currently offers bundled Internet and cellular phone services at a highly competitive introductory rate of approximately \$40 per month for the first year, providing a solid foundation for services.
- * Contractor Role: The prime contractor will be responsible for ensuring seamless, high-speed connectivity, installation and robust technical support necessary for the AI-driven tablet program to function optimally.

Grant Goals: Transformative Productivity via Conversational AI See Video

Animation Intro for 1 minute summary

https://binghamlabs.com/video/Bingham_Labs_Future.mp4

The overarching goal of our grant-funding project is to develop and showcase a truly transformative Smart-Grid model. This model aims to demonstrate usable increases in the productivity and efficiency of its users simply through natural language interaction with our integrated AI system.

Furthermore, a key differentiator of our approach is the proactive introduction of agentic automation, facilitated by a personal AI agent assigned to each user. This agent acts as an intelligent digital assistant capable of autonomously executing complex, multi-step tasks based on high-level user instructions.

Illustrative Examples of Agentic Automation: The user simply converses with their agent, issuing commands for tasks that traditionally require manual effort and time:

- * Professional Correspondence: Instructing the Agent to draft a professional letter on a specified topic.
- * Information Retrieval: Tasking the Agent to look up a specific address or contact.
- * Financial Management: Commanding the Agent to create or update a monthly budget “based on transaction data.”
- * Scheduling and Time Management: Directing the Agent to schedule a meeting* across multiple calendars, managing conflicts and invitations.
- * Communication Triage: Asking the Agent to sort emails by importance and automatically unsubscribe from recognized junk mail.
- * Entertainment and Media: Using the Agent to navigate or control their television or streaming services.
- * Logistics and Procurement: Tasking the Agent to order food from a preferred vendor.
- * Healthcare Integration: Directing the Agent to securely collect medical test results from an online portal.
- * Personal Development: Requesting the Agent to interact with weekly training, find and enroll in a relevant online class or course.

Economic Development and Model Innovation

While the concept of personal digital assistants is widely discussed, current implementations often lack a focused, strategic intent. Bingham Labs believes that concentrating this high-level, AI-powered assistance within a specific, concentrated corridor will generate a superior economic multiplier effect and foster significant synergy among users and local businesses.

Novelty of Integration: The integration of Agentic AI with personalized agents into a Smart-Grid environment is a nascent field. This project is vital for creating robust, real-world operational models.

Unique Software Stack: Most existing AI models do not account for the specialized, proprietary software stack that powers our comprehensive,

cross-platform AI agents, which is designed for deep integration and sustained assistance across numerous daily tasks.

Stimulating Growth: Fundamentally, this is conceived as an economic development project designed to actively stimulate localized growth, enhance workforce productivity, and improve the quality of life for participants.

Funding Milestones and Future Scope

https://binghamlabs.com/video/AI_Productivity_Revolution.mp4

Bingham Labs is moving forward aggressively on the funding front:

1 Initial Evaluation Grants: We have already submitted two substantial applications for: \$3 million evaluation grants with the first to the Congressional Transit and Infrastructure Subcommittee where we are seeking the State as a partner in the Uses of Funding and

2. Prototype Demonstration: This current application for a \$3 million grant from the DDA is strategically intended to fund the development and deployment of the prototype models (the 100-200 person beta test). These prototypes will be needed to start funding. As a part of the prototype Demonstrations, we want to look for multiple small grants for consulting on the feasibility as we go forward.

3. Future Proof-of-Concept Corridor: The ultimate, larger goal is to use the data and models generated from these initial grants as the foundation for a massive, \$100 million Smart-Grid “Proof-of-Concept” corridor extending from downtown all the way to Golden. This larger project would be the ultimate validation of our transformative, agent-centric Smart-Grid design. It would also incubate a State backbone for 6 million people the State wants to have 95% broadband connectivity.

See Slideshow [Notes about Smart-Grid](#)