

CITY OF BERKELEY RENT STABILIZATION BOARD

Rent Board System Overview

A project update, and a look at what is possible

Board Presentation

EcoMetricx



What we will cover

A project update, and a look at what is possible

TODAY'S AGENDA

1 About EcoMetricx

Who we are and what we do.

2 Our work in government technology

Products and services for municipalities and agencies like the Rent Board.

3 Our engagement with the Rent Board

What we are building, and how we will deliver it.

4 Where the project stands

The staff sessions completed so far, and what they showed.

5 AI in practice

Examples from our energy work: assistants that answer questions from the records.

6 Reading the Board's documents

What AI can do with typed, scanned, and handwritten records.

 **Questions and answers.** Time is reserved at the end for Board members and participants.

About EcoMetricx

A data science and applied economics firm that builds secure data platforms and AI for public agencies, utilities, and businesses

9+ years

Of experience in data science, analytics, and platform delivery.

3 practice areas

Consulting, energy, and government technology.

SOC 2

Controls for security, confidentiality, and privacy, with Type II certification underway.

California

Based in Irvine, working with public agencies and utilities.

WHAT WE DO



Consulting

Data science and applied economics for organizations with complex data and hard questions to answer.



Energy

Program evaluation, demand response, and analytics for utilities and community energy agencies.



Government Technology

Ariadne, our platform for registries, casework, documents, and public portals.



One team of data scientists, engineers, and economists. We build secure platforms for public agencies and regulated utilities.

Our work in government technology

Ariadne is one secure platform for cities, counties, and public agencies, configured for the programs they run

WHAT THE PLATFORM DOES

**Registries and Records**

Properties, units, owners, and assets in one registry, with their full history.

**Casework and Hearings**

Cases from intake through hearing, decision, and appeal, with a record of every step.

**Documents and Notices**

Searchable files, scanned records, and notices, kept under retention rules.

**Public Portals and Payments**

Online accounts for residents and owners to file, pay, and book appointments.

**Reports, Dashboards, and Maps**

Live views of the agency's work, with reports and map layers by role.

**AI Assistant**

Answers drawn only from the agency's own records, with a source for every answer.

WHO IT SERVES

**Housing and Rent Programs**

Rent registries, petitions, counseling casework, and owner and tenant portals.

**Public Works and Code Enforcement**

Asset registries, complaints, inspections, and case tracking.

**Finance, Clerk, and Grants**

Fees and billing, public records requests, and grant and loan programs.

Built to protect the public's data

Security and privacy are the foundation of every system we build for a public agency

Private

An agency's data never trains our AI models, or anyone else's.

Cited

AI answers come only from the agency's records, and show their source.

Logged

Every action, by a person or by AI, is recorded and can be traced.

People decide

Staff review every decision that carries real consequences.

HOW WE WORK WITH AGENCIES



Data Migration and Integration

Decades of legacy records moved into one governed system, and connected to the tools staff already use.



AI Built for the Agency

Secure AI applications designed around municipal workflows and built inside the agency's security boundary.



Training and Adoption

Hands-on training by role, and clear guidance on how AI may and may not be used.



Security is the foundation, not a feature. Encryption, access by role with multi-factor sign-in, and WCAG 2.1 AA accessibility are part of every deployment.

What we are building for the Rent Board

One modern system in place of today's Rent Registry, live in time for the 2027-2028 registration period

FOR RENT BOARD STAFF



Registration

Properties, units, exemptions, rent history, and annual adjustments.



Housing Counseling

Client cases, notes, and referrals, linked to each property.



Petitions and Mediation

Every case from filing through hearing, decision, and appeal.



Finance and Billing

Fees, bills, penalties, waivers, and payments for every property.



Document Management

Property files and correspondence in one secure, searchable place.



Reports and Dashboards

Live views of registrations, cases, and collections.

FOR LANDLORDS AND TENANTS



Online Accounts

Easy setup, a clear balance, and a way to flag incorrect tenancy details.



Pay and File Online

Pay fees, set up automatic payments, and file petitions online.



Counseling Appointments

Book a counseling appointment online, a top request from the community.

How we will deliver it

A phased plan built with Rent Board staff, ready for the 2027-2028 registration period



HOW WE WILL GET THERE



 **Staff are part of every step.** Nothing goes live until they have tested it and confirmed it is ready.

Twenty-four sessions with Rent Board staff

Every unit took part, through the busiest months of the agency's year

WHO WE SAT WITH

24

Working sessions, August through October.

8

Every operating unit, plus the Executive Office.

20+

Staff took part, most of them more than once.

3

Sessions brought several units into one room.

HOW STAFF TOOK PART



They made time in peak season

The sessions ran through registration and penalty billing season.



They came back

Registration gave four sessions. Legal, Finance, and Public Information gave three each.



They showed us the real thing

Staff opened their screens and their spreadsheets, including the workarounds.



Twenty-four sessions in three months. The agency set that pace.

What staff told us

Three things came up in almost every session

WHAT WE HEARD

1 Units need the same things

We expected seven separate lists. We found a lot of shared ground.

2 Staff already built the fixes

Where the system falls short, people made their own tools and have used them for years.

3 Records are hard to reach

Information is rarely missing. It is slow to find, or sits with one person.

WHY IT MATTERS

✓ Build it once

Shared needs become shared features. Faster to build, simpler to learn.

🔍 Proven before we build

A tool staff use every day is a requirement they have already tested.

📖 A good starting point

The agency has the information. The work is making it reachable.

🔗 **Very little is missing.** Most of what we found is about reach, not gaps.

Discovery is complete

Five documents, written from the sessions and corrected by staff

WHAT WE PRODUCED



Written from the sessions

Requirements, specifications, process maps, a gap analysis, and a migration plan.



Checked against what was said

Every statement traces back to a session, so anything that reads wrong can be checked.



Corrected by your staff

Units read the drafts and told us where we had it wrong. Several findings changed.

WHERE THAT LEAVES US

Done

Discovery sessions are finished.

All units

Reviewed the documents and marked up their own sections.

This week

Final comments close, and the documents are set.

Next

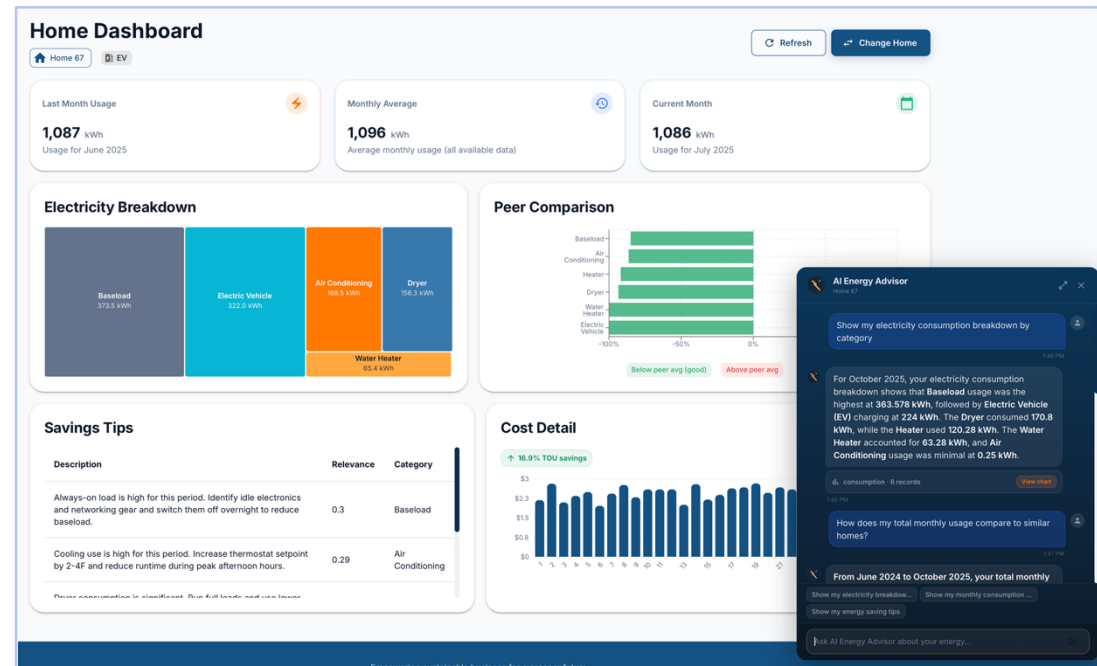
Design, built and reviewed with staff the same way.



We wrote it, staff corrected it, we revised. Design will work the same way: nothing is settled until the people doing the job say it is right.

AI in practice: asking questions of the data

An example from our energy work: an assistant that answers questions from the records, in plain language



1 Ask in plain language

Type the question as you would say it. No report request, no one needed to write a query.

2 See what it searched

The assistant restates what it looked up, so a misreading is caught before anyone acts on it.

3 Get the records

Every figure comes straight from the records, with a chart and the source behind it.

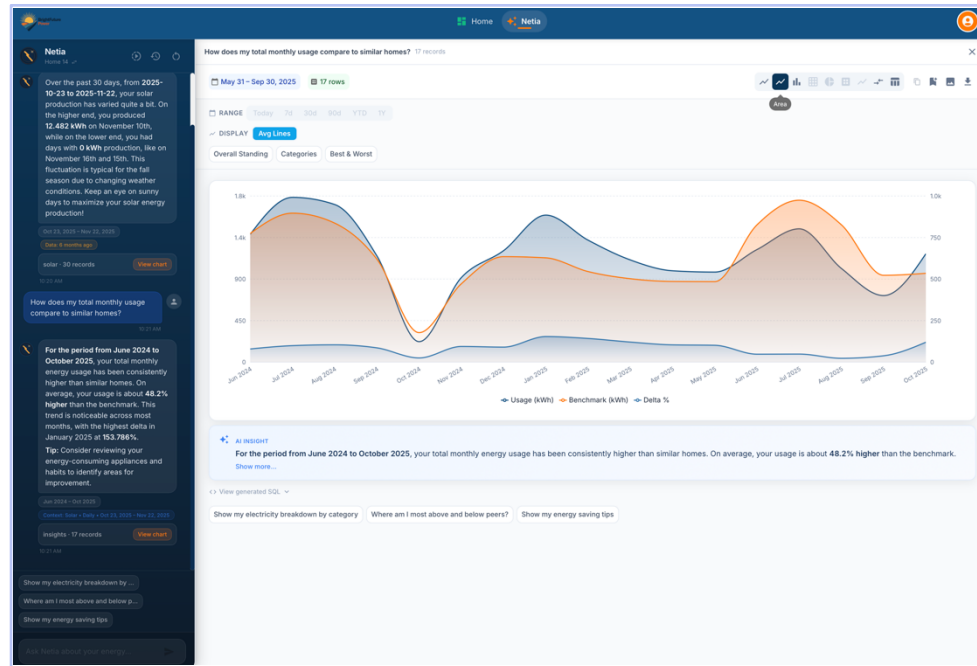
Potentia, EcoMetricx's energy platform: a dashboard with an assistant answering a question about usage.



The same approach fits the Board's records. Staff could ask which properties on a street have a petition outstanding and get the answer with a link to every record: read only, staff only, and fully logged.

AI in practice: answering the public's questions

An example from our energy work: plain-language answers for customers, at any hour, with a person behind it



1 Answers at any hour

Customers ask about their own account and get a clear answer with the data behind it, day or night.

2 Shows its source

Every answer points to the records it used, so it can be checked. It never changes a record.

3 Hands off to a person

When a question needs judgment, it goes to staff with the full conversation, so nobody starts over.

Potentia: a customer asks how their usage compares with similar homes, and gets an answer with the chart.



For the Rent Board, the same tools could answer routine questions in English, Spanish, and Chinese, and send eviction risk, legal deadlines, and disputed rent ceilings to a counselor. The assistant supports counselors; it does not replace them.

From paper to data: what AI makes possible

Decades of letters, notices, forms, and handwritten notes can now be read and put to work

THE SITUATION TODAY



Records live on paper and in scans

Letters, notices, forms, and handwritten notes, filed by property over decades.



Finding something means reading

To answer a question from the files, someone opens them and reads page by page.



The information is there

It is just not in a form a computer can search, count, or chart.

WHAT AI CAN DO NOW



Read every page

Typed, scanned, and handwritten, including notes written in the margins.



Pull out the facts

Names, dates, addresses, amounts, and decisions, recorded as data.



Check with a person

Anything the system is unsure about is flagged for staff to confirm.

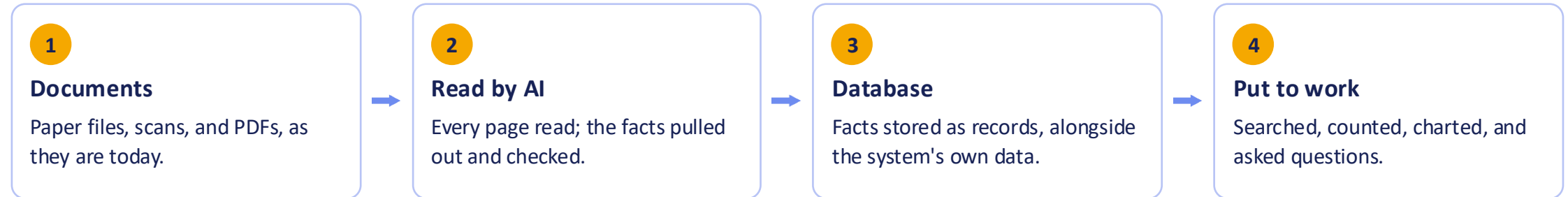


The documents stay where they are. What changes is that staff can find, search, and count what is in them.

From documents to a database

Once the records are data, they can be searched, counted, charted, and asked questions

HOW IT WORKS



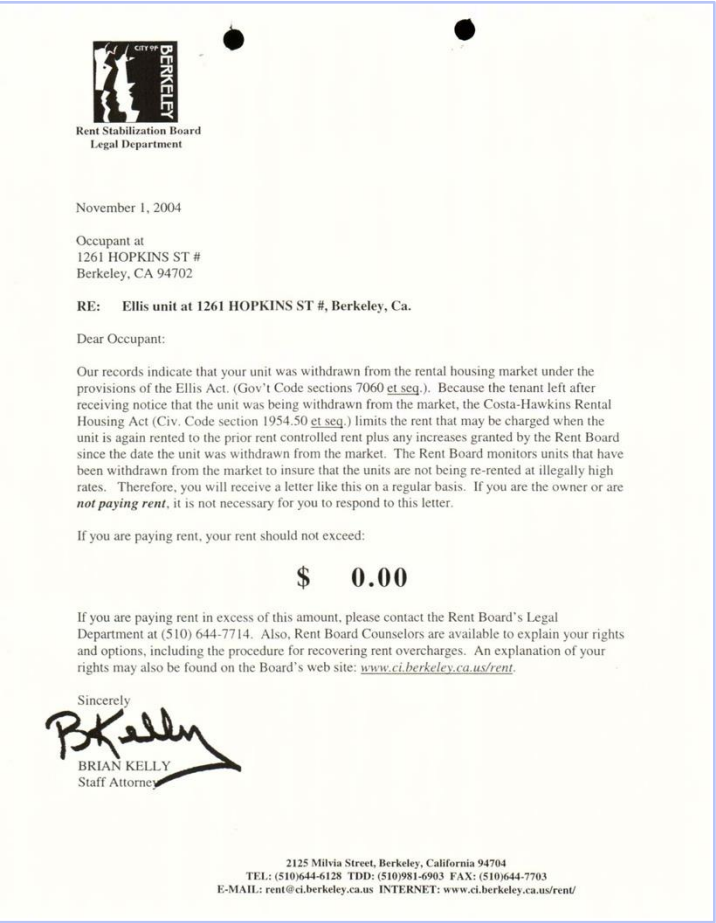
WHAT THE BOARD COULD DO WITH IT



Private and checked. The documents stay in a secure environment, they are never used to train AI models, and a person confirms anything uncertain.

Real example: a scanned, typed letter

A page from the Board's own files, read entirely in our cloud



FACTS PULLED OUT, READY FOR A DATABASE

Subject: **Ellis unit at 1261 HOPKINS ST #, Berkeley, Ca.**

Phone: **(510) 644-6128**

Email: **rent@ci.berkeley.ca.us**

Signature, handwritten: **B Kelly (read by Claude)**

THE FULL TEXT, READY TO SEARCH

November 1, 2004

RE: Ellis unit at 1261 HOPKINS ST #, Berkeley, Ca.

Our records indicate that your unit was withdrawn from the rental housing market under the provisions of the Ellis Act. (Gov't Code sections 7060 et seq.). Because the tenant left after receiving notice...

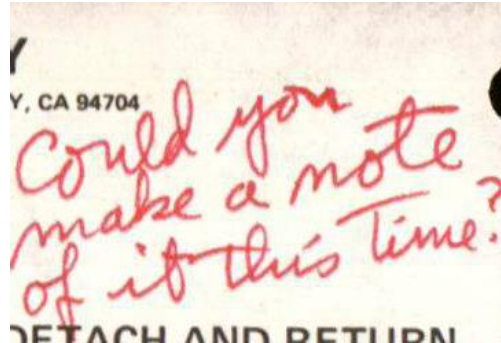
99.9% average word confidence, read in our cloud

1261 Hopkins St, page 2: a 2004 letter from the City of Berkeley Rent Stabilization Board.

Real examples: handwriting, read right

A medium case and a hard case from the Board's own files

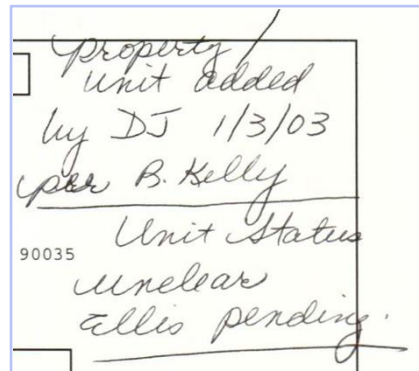
MEDIUM • RED-PEN NOTE ON A PRINTED NOTICE



OUR READING

“Could you make a note of it this time?”

HARD • A SEVEN-LINE HANDWRITTEN NOTE



OUR READING

“property/ unit added by DJ 1/3/03 per B. Kelly Unit Status unclear Ellis pending.”

From the Board's own files: 1237 Hopkins St, page 2 (medium) and 1261 Hopkins St, page 6 (hard).

Questions and answers

We welcome questions from Board members and participants

WHAT WE COVERED



The system and the plan

One modern system in place of the Rent Registry, live in time for the 2027-2028 registration period.



Where the project stands

Twenty-four sessions with every unit, and five discovery documents corrected by staff. Design is next.



AI in practice

Examples from our energy work: assistants that answer questions from the records, with a person behind them.



Reading the Board's documents

Typed, scanned, and handwritten records turned into data that can be searched, counted, and charted.



Thank you. Our thanks to Rent Board staff and the Data Systems Committee for their time and openness throughout.