Real-Time Loan Portfolio Analysis with Everyday Tools

AAPL Education Series Webinar

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Founder, Starter Stack AI

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You're sitting on a goldmine you never dig into

Private lenders generate thousands of data points per deal.

- APPLICATION DATA
- BORROWER BEHAVIOR
- PAYMENT HISTORY
- EXCEPTION LOGS
- COMMUNICATION TRAILS

Most of this data ends up in static reports or post-mortem reviews that arrive weeks after decisions could have mattered.

The tools to change this are already open in another browser tab.

About Your Expert

Data Science Fundamentals meets Private Lending Operations

Mark Dusseau

Founder, Starter Stack AI

Senior Data Scientist
Built predictive financial models for public and private sector.

Senior Data Scientist
Developed advanced predictive analytics and financial modeling.

Instructor
Taught graduate course in computational mathematics.

Founder
Building the operating infrastructure for Private Lending.

Education: Oregon University & University of Maryland, College Park (Mathematics & Economics)

Which tool should you use?

The trade-offs for lending portfolio analysis (Updated for 2026).

AI TOOL	CODE EXECUTION (CSV)	MCP / API ACCESS	KEY WEAKNESS
ChatGPT	YES **Adv. Data Analysis**	YES Supported	*Can hallucinate on complex financial calculations*
Claude	YES **Analysis Tool / Claude Code**	YES Native (Anthropic built it)	*Web UI less optimized for pure spreadsheet work*
Gemini	YES **Google AI Studio**	YES Supported via Apigee	*Less consistent on complex multi-step analysis tasks*
Perplexity	YES **Agent API / Pro CSV**	NO Ditched MCP entirely	*Not built for deep portfolio modeling (built for search)*

How to get your data into the AI

"Okay, cool, but how do I actually give these tools access to my LOS data?"

Direct Upload

The fastest way to start. Export your loan tape as a CSV or Excel file and drop it directly into the chat window.

Best for: One-off portfolio reviews

Web Scraping

Use AI tools with browsing capabilities to extract data directly from web-based dashboards or public records.

Best for: Competitor research & liens

API Integration

Connect your systems directly. Automatically push data from your LOS to the AI for recurring analysis without manual exports.

Best for: Automated weekly reporting

MCP (Agents)

Think of an MCP like a secure pipeline directly from your LOS to the AI. Instead of carrying buckets of data (CSVs), the AI just turns on the faucet.

Best for: The future of lending ops

MANUAL / IMMEDIATE

AUTOMATED / ADVANCED

Capabilities & Limitations

What It Does

- ✓ Structures raw loan tape into recognizable patterns.
- ✓ Identifies outliers and statistical anomalies instantly.
- ✓ Acts as an **intelligence layer** that sits on top of your existing data.

What It Won't Do

- ✗ Does not replace your underwriting judgment.
- ✗ Cannot be your system of record (LOS/LMS).
- ✗ Will hallucinate if not forced to verify its assumptions.

The goal is simple: Use AI as an intelligence layer to **catch problems at 30 days instead of 90.**

The difference between a useless answer and operational intelligence is how you ask

1

CONTEXT

Tell the AI who it is and what it's looking at.

+

2

DATA

Attach the CSV, paste the table, or connect the API.

+

3

TASK

Give it one clear, specific job to do.

+

4

FORMAT

Tell it exactly how to return the answer.

CONTEXT

"You are a Chief Risk Officer analyzing a portfolio of 150 private loans."

DATA

"I have attached my loan tape as a CSV file."

TASK

"Identify the top 3 states by default rate."

FORMAT

"Return as a table with State, Default Rate, and Loan Count."

This formula works across **every AI tool** *— ChatGPT, Claude, Gemini, Perplexity. It's tool-agnostic.*

LIVE DEMO 1

Identifying Performance Trends

Stop staring at static spreadsheets. Let the AI find the patterns.

The Goal

- → Upload your raw loan tape CSV directly.
- → Identify geographic & industry concentrations of risk.
- → Compare default rates across deal types (ACH vs. Term Loan vs. LOC).
- → Find the hidden trends you'd normally need a data scientist to uncover.

THE EXACT PROMPT

"I have attached my loan tape CSV.

Act as a Chief Risk Officer. Analyze this data and tell me:

1. Which 3 states have the highest default rates?

2. Are 'ACH' deals performing better or worse than 'Term Loan' deals in our portfolio?

3. Which NAICS industry categories have the most defaults?

Show your math and explain your reasoning."

LIVE DEMO 2

Isolating Early Warning Signals

Catch the red flags before they become defaults.

THE EXACT PROMPT

"Review the loan tape data.

Create a 'High-Risk Watchlist' of loans that meet at least **TWO** of these criteria:

1. Collection rate has dropped below 85%

2. Borrower has more than 2 active positions (stacking)

3. More than 14 days since last payment

Output this as a clean markdown table including Loan ID, Borrower Name, and the specific triggers hit."

The Goal

Move beyond single-variable analysis. ←

Combine collection rate, stacking, and payment recency. ←

Instantly generate a high-risk watchlist. ←

Proactively manage the portfolio instead of reacting to defaults. ←

LIVE DEMO 3

Interrogating Borrower Behavior

Identify your best clients and your biggest liabilities.

The Goal

Cluster borrowers by payment behavior.

Analyze repeat borrower performance.

Segment your client base instantly.

THE EXACT PROMPT

"Analyze the borrower data in the attached CSV.

Group the borrowers into 3 distinct categories:

1. **A-Tier:** 0 missed payments, experienced.
2. **B-Tier:** 1-2 missed payments, moderate experience.
3. **C-Tier:** 3+ missed payments or default status.

Then, calculate and tell me: Are our repeat borrowers actually performing better than our first-time borrowers?"

LIVE DEMO 4

Generating Portfolio Insights

Turn raw data into a board-ready executive summary.

The Goal

- → Stop spending hours building reports.
- → Generate a high-level portfolio health summary.
- → Understand risk distribution and concentration.
- → Format it instantly for leadership or investors.

THE EXACT PROMPT

"Act as a Senior Data Analyst.

Review the attached loan tape and generate an Executive Summary of our portfolio health. Include:

1. Total active portfolio value and average deal size.

2. A breakdown of our exposure by deal type (ACH, Term Loan, LOC, Factoring).

3. A 3-bullet summary of our biggest concentration risks (geographic, industry, or deal-type).

Format this as a professional, board-ready memo."

The JSON Cheat Code

JSON isn't just code — it's a **translator**. It forces the AI to output data your other software can instantly read.

Kills the "Fluff"

Stops the AI from saying "Sure, here is your analysis!" and gets straight to the raw data.

Forces a Strict Schema

You dictate exactly what columns and data points you want returned. No surprises.

API & MCP Ready

JSON is the language of the internet. This format is required if you want to automatically push the AI's findings back into Floify or Go High Level.

PROMPT

```
Output the results strictly as JSON. Do not include any conversational text. Use the following schema:

{
"borrower_name": "string",
"risk_score": "integer (1-10)",
"primary_red_flag": "string",
"exception_history": [
{
"date": "YYYY-MM-DD",
"reason": "string"
}
]
```

Trust, but Verify: Beating Hallucinations

How to guarantee the AI's analysis is rooted in your real data, not making things up.

01

FORCE CITATIONS

Make the AI prove exactly where it found the data in your upload.

PROMPT

```
"For every claim or metric you provide, cite the exact row number and column name from the uploaded CSV."
```

02

SHOW YOUR MATH

Prevent the AI from jumping to conclusions on complex financial metrics.

PROMPT

```
"Write out the step-by-step formula you used to calculate this metric before giving the final number."
```

03

THE REVERSE AUDIT

Force the AI to critique its own work and expose its hidden assumptions.

PROMPT

```
"Act as a skeptical auditor. Review your analysis above and list any assumptions you made that are not explicitly stated in the data."
```

The "Monday Morning" framework — start here tomorrow

01

EXPORT

Pull your loan tape or portfolio report into CSV format from your LOS.

02

PROMPT

Use the Context + Data + Task + Format structure.

03

VERIFY

Cross-check AI output against 2-3 loans you know well.

04

ITERATE

Refine your prompts based on what the AI gets right and wrong.

Start with one analysis per week. Within a month, you'll have a **library of prompts tailored to your specific portfolio.**

Mark Dusseau

Founder, Starter Stack AI

Your turn — what do you want to analyze?

I showed you how to do this manually today. But **the real magic happens when this runs automatically every morning at 6 AM.**

Get the Lender's AI Prompt Swipe File

All prompts from today + the automation blueprint.

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