
AI in Procurement Solving real life problems in 2025

AI solutions we are genuinely excited about:
Meet the Predictive Dispute Management Agent

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About This Series

This article series, *AI in Procurement: Solving real life problems in 2025*, explores how AI and Multi-Agent Systems (MAS) can solve long-standing operational problems. Each article tackles a key challenge and presents a concrete AI-powered agent to enhance procurement performance in 2025.

In this second article, we focus on the Predictive Dispute Management Agent.

The Dispute Dilemma

Invoice disputes are one of the most persistent pain points in Procure-to-Pay (P2P). Despite years of digitization, the process remains reactive, manual, and deeply inefficient. For many procurement and finance teams, resolving a dispute can feel like entering a maze: multiple systems, unclear ownership, and hours of email follow-ups.

The root causes are often systemic:

Unclear accountability:

Procurement, AP, and business units may all touch the process, but no one owns the end-to-end dispute cycle.

Low-quality data:

Discrepancies arise due to late POs, misaligned contract rates, or outdated pricing tables.

Manual triage:

Finance teams are forced to prioritize disputes without knowing which are worth pursuing - often letting high-value opportunities slip.

Recurring disputes:

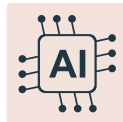
Organizations often focus on closing out the individual dispute case, but fail to address the underlying root cause - leading to recurring issues and unnecessary cycle repetition.

The result? Valuable time is lost, and cash recovery potential is left on the table. Meanwhile, suppliers are often drawn into unnecessary, repetitive clarification requests due to poor internal coordination - eroding trust and wasting effort on both sides.

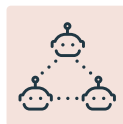


Why Gen AI and Multi-Agent Systems Matter

Traditional automation rules can't keep up with the nuance and volume of modern disputes. This is where AI comes in:



Gen AI can analyze contract language, historic dispute patterns, and supplier communications to understand the nature and context of mismatches. It can also investigate available data across multiple systems including structured sources like ERP platforms and unstructured content such as emails, service notes, or scanned attachments to build a complete picture of each dispute scenario.



MAS allows autonomous agents to track dispute flows, analyze signals across systems, and act independently to flag, escalate, or deprioritize disputes based on business logic.

Together, they enable a shift from reactive firefighting to data-driven foresight where disputes are triaged intelligently, and resources are focused where they matter most.

Introducing the Predictive Dispute Management Agent

The Predictive Dispute Management Agent is designed to help organizations manage disputes proactively not just clear backlogs, but avoid future ones.

Key Capabilities of the Predictive Dispute Management Agent:



Mismatch Classification: It distinguishes whether a dispute stems from rate, volume, or both and categorizes the mismatch accordingly.



Dual Validation Pathway: The agent simultaneously verifies rate accuracy by referencing contract repositories and volume accuracy by querying internal operational systems or reports.



Dispute Win Probability Scoring: Based on historical patterns, it assigns a High, Medium, or Low probability of success for each case.



Automated Recommendation: Engine for disputes with high likelihood of recovery, the agent proposes one of two actions:

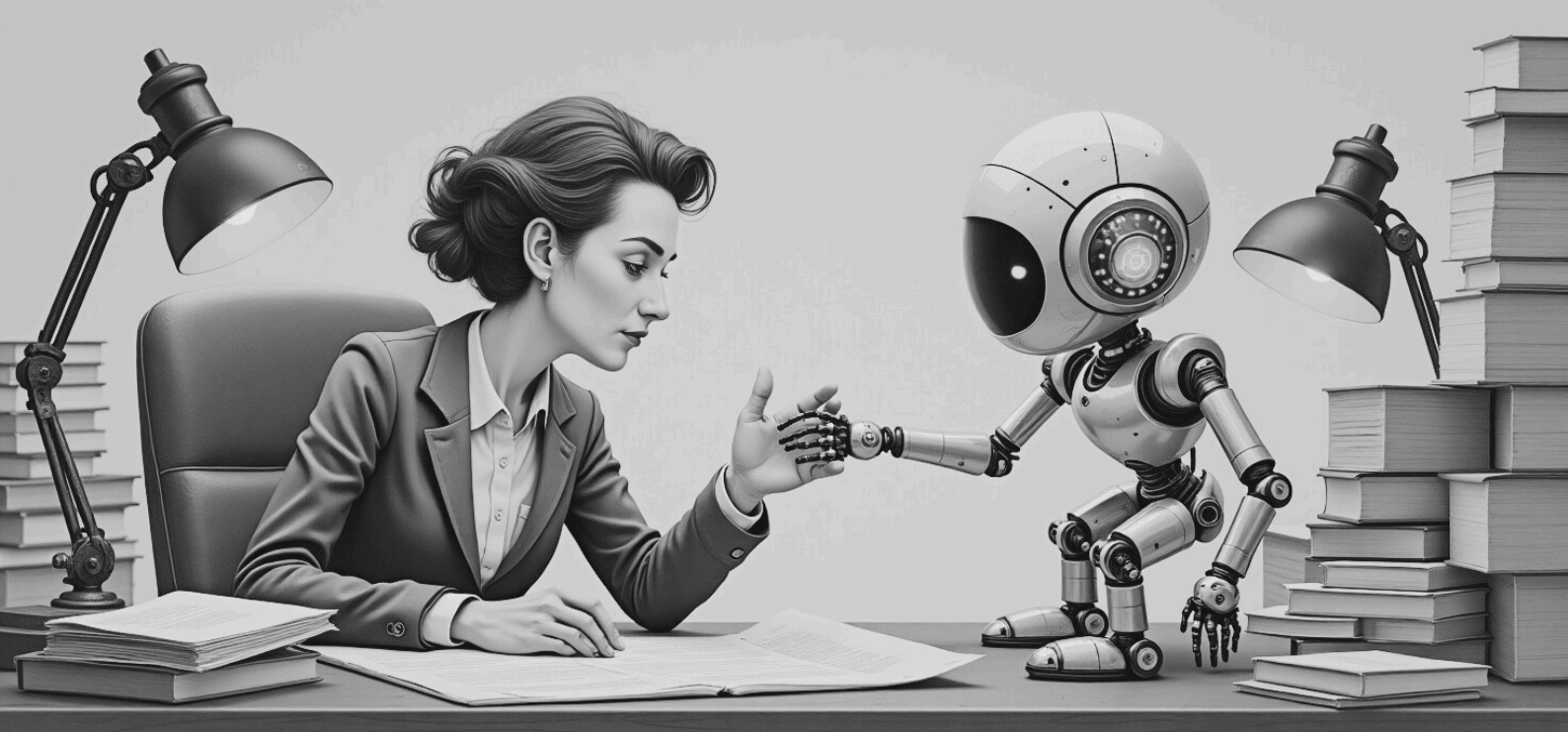
- Initiate dispute automatically via Bot/API
- Route to human for validation, especially in complex or sensitive cases



Proactive Root Cause Analysis: The agent flags recurring contract issues (e.g., expired rate cards, untracked volumes) and suggests actions like updating internal POs or contract references.



Closed-loop Feedback: All dispute decisions (dispute or no-dispute) are logged and analyzed to improve future recommendations and prevent recurrence.



Business Impact

Organizations that implement AI-driven dispute management solutions can expect a number of operational improvements:



Reduced Manual Workload

Faster dispute triage and automated processing of routine cases free up valuable team resources.



Improved Prioritization

High-value dispute cases receive appropriate attention based on data-driven analysis.



Consistent Decision-Making

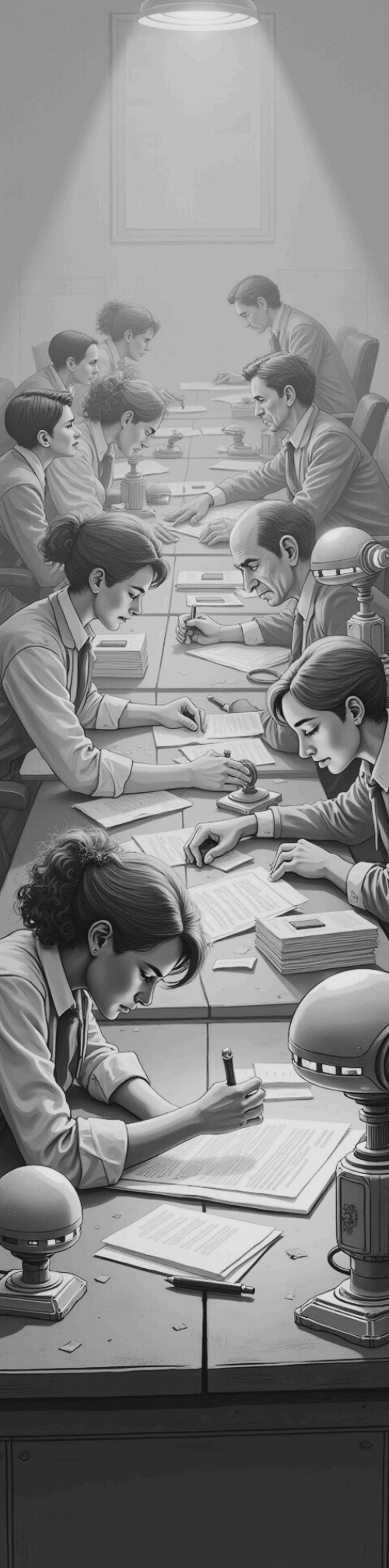
More consistent and data-backed decision-making across the organization.



Stronger Supplier Relationships

Clearer and more respectful communication leads to better supplier collaboration.

While results will vary based on process maturity and data quality, the Predictive Dispute Management Agent creates the foundation for moving from reactive issue handling to strategic performance improvement.



Conclusion and call to action

Disputes don't have to be a black hole for time and money. With the Predictive Dispute Management Agent, procurement teams can:



Gain visibility into patterns before issues occur.



Focus efforts on high-impact solutions.



Strengthen supplier relationships through clarity and consistency.

Are you ready to bring foresight into your P2P operations?

Contact Carve to learn how AI-powered procurement solutions can transform your business.



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