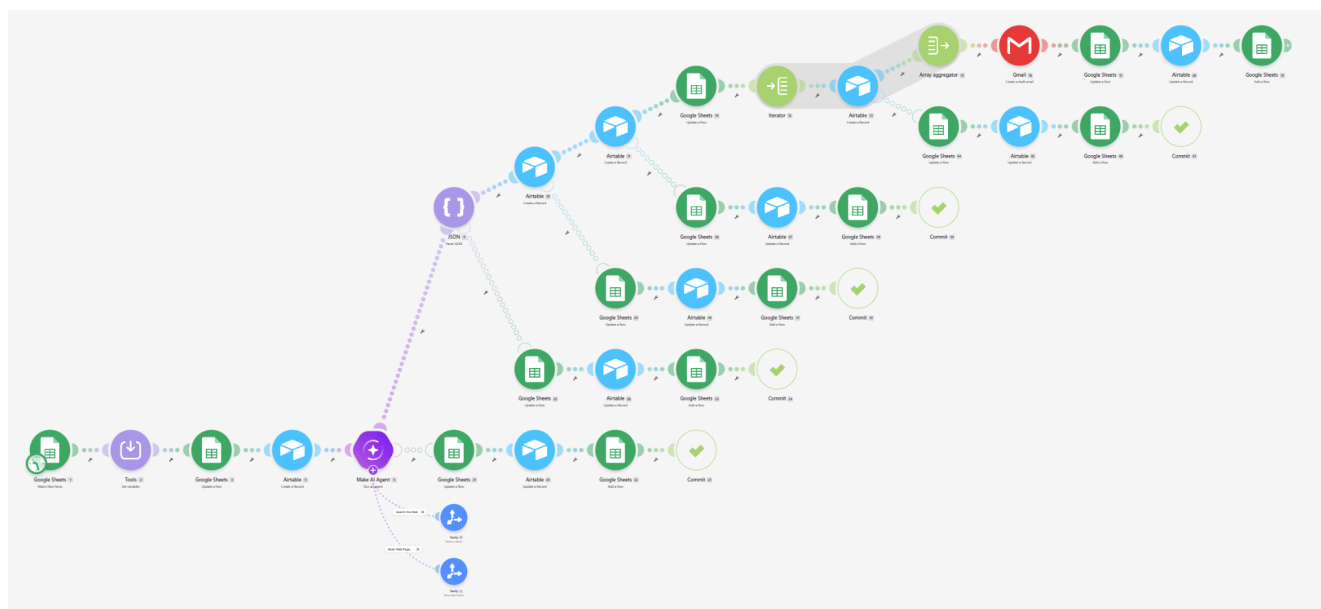


Autonomous web research, primary-competitor selection, structured Airtable intelligence, evidence logging, controlled Gmail drafting, and operational error handling.

Google Sheets

END-TO-END WORKFLOW



human-in-the-loop

Jerry J. Hudson

Structured intake before autonomous research

The workflow starts with a client-facing Google Form that captures the business context needed for relevant competitor discovery and comparison.

THE CHALLENGE

Generic research prompts lack the customer, market, service, and positioning context needed to choose a useful direct competitor.

THE SOLUTION

A structured intake captures company identity, geography, services, target customers, value proposition, and optional market context.

CLIENT INTAKE - FOUR-PART FORM

RivalScope Strategy – Competitive Analysis Intake

We'll use the information you provide, along with publicly available research, to identify a relevant competitor and prepare your competitive analysis.

* Indicates required question

Contact Name *

Your answer

Business Email *

Your answer

Job Title

Your answer

Next

Clear form

Company Information

Company Name *

Your answer

Company Website *

Your answer

Industry *

Your answer

Primary Geographic Market *

Your answer

Back

Next

Clear form

Business Profile

What are your company's main products or services? *

Your answer

Who are your primary customers? *

Your answer

What is your company's main value proposition? *

Your answer

Back

Next

Clear form

Additional Context

Is there anything else we should know about your company or market?

Your answer

Back

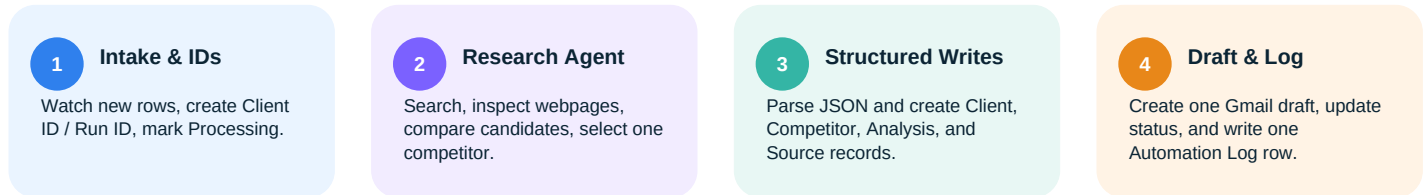
Submit

Clear form

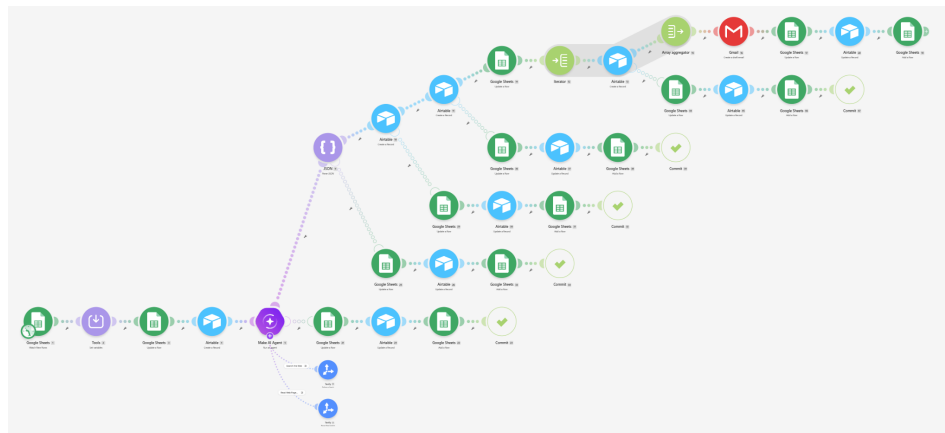
Intake fields are written to Google Sheets, assigned run identifiers, and used as the dynamic input to the research agent.

Agentic research inside deterministic orchestration

Make coordinates intake, agent execution, structured writes, source iteration, Gmail drafting, status updates, logging, and critical error routes.



WORKFLOW ARCHITECTURE



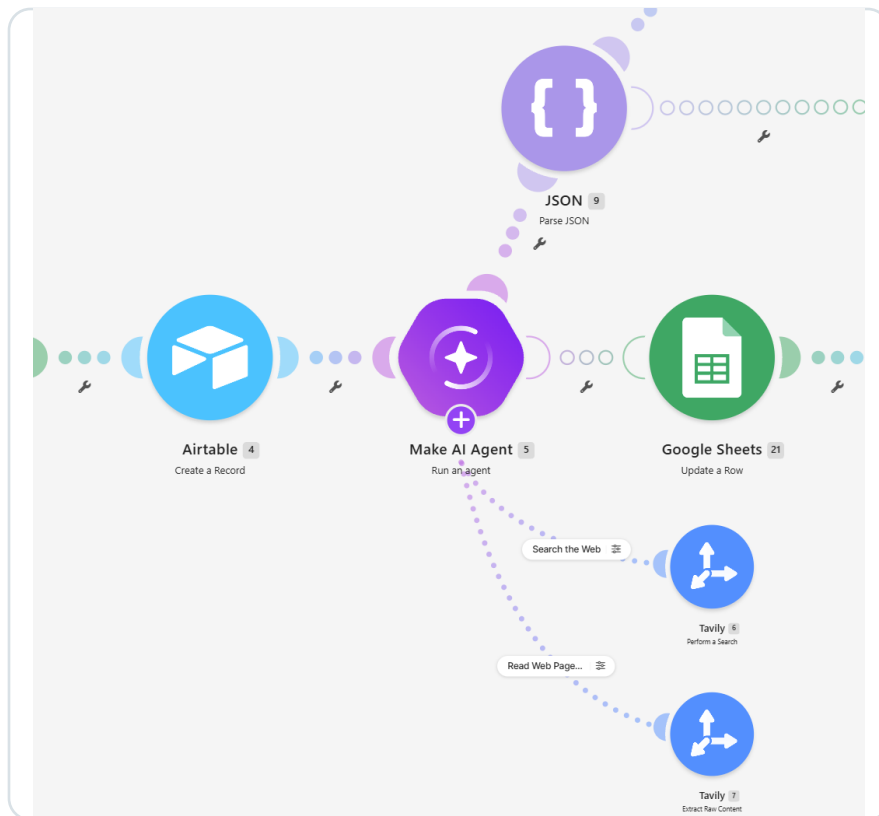
DESIGN PRINCIPLES

- The agent decides how to use research tools; downstream database writes remain deterministic.
- AI output is constrained to a strict JSON structure before any Airtable records are created.
- The workflow selects one primary competitor for the analysis rather than claiming an objective market leader.
- Client communication is created as a Gmail draft for human review - never auto-sent.

Autonomous tool use, controlled output

The Make AI Agent can search the web, inspect page content, compare plausible competitors, and deepen research before returning one structured result.

AGENT + RESEARCH TOOLS



INTERNAL SELECTION FRAMEWORK

30

Products / services overlap

30

Target customer overlap

20

Geographic overlap

10

Business model similarity

10

Positioning similarity

WHY THIS MATTERS

The agent has freedom to gather evidence, but not freedom to invent fields, silently write to operational systems, or present unsupported facts as confirmed. Missing evidence uses explicit fallbacks such as "Not publicly confirmed."

STRUCTURED OUTPUT CONTRACT

The response must contain exactly one competitor object, one analysis object, and a research_sources array. Strict JSON parsing prevents malformed or incomplete agent output from reaching Airtable.

From web evidence to normalized competitive records

Airtable stores the selected competitor, the client-versus-competitor analysis, and source evidence as linked records rather than leaving the result as unstructured model text.

PRIMARY COMPARISON RECORD

Client Company Name	Competitor Company Name	Client Website	Competitor Website	Client Industry	Competitor Industry
Zigma Internet Marketing	BrandLume Inc	https://zigma.ca/	https://brandlume.com	Digital Marketing	Digital Marketing
Client Industry	Competitor Industry	Client Geographic Market	Competitor Geographic Market		
Digital Marketing	Digital Marketing	Toronto and Greater Toronto Area, Ontario, Canada	Toronto, Ontario, Canada; North America		

RESEARCH EVIDENCE TRAIL

Company	Source Name	Source URL	Source Type	Finding Supported
Client	Zigma Internet Marketing –...	https://zigma.ca/	Company Website	Client profile, service offerings, geographic focus (Toronto area), and value proposition as described by the client.
Competitor	BrandLume – Digital Marke...	https://brandlume.com/digital-marketing-agency	Company Website	Competitor's service offerings (SEO, PPC, web design), pricing details, and upfront pricing model.
Finding Supported			Retrieved At	
Client profile, service offerings, geographic focus (Toronto area), and value proposition as described by the client.			2/10/2026	9:23pm
Competitor's service offerings (SEO, PPC, web design), pricing details, and upfront pricing model.			2/10/2026	9:23pm

4

linked Airtable tables

1

primary competitor per analysis

1

evidence trail linked to each analysis

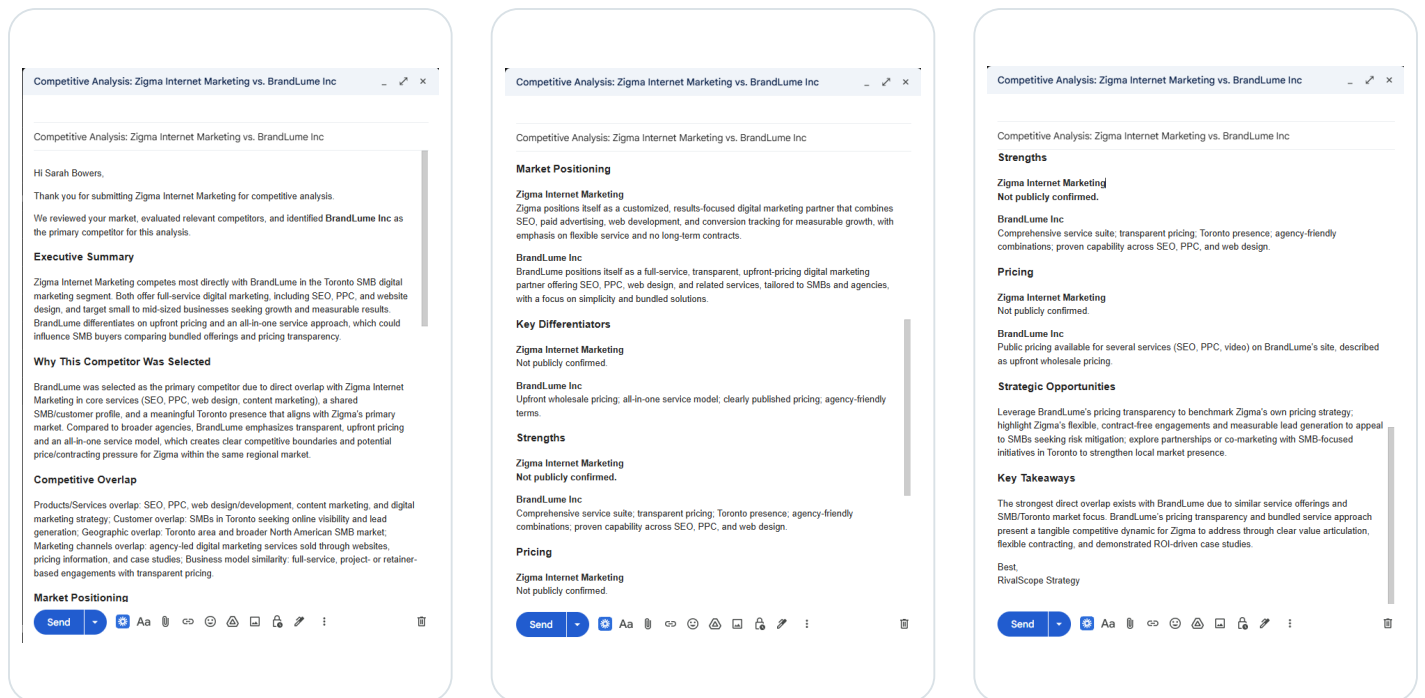
DATA MODEL

Clients -> Competitive Analyses <- Competitors, with Research Sources linked to each analysis. Basic company facts are normalized in Client and Competitor records; generated comparison findings live in Competitive Analyses.

Client-ready analysis without auto-send risk

The automation converts the structured analysis into a readable Gmail draft, but the final communication remains under human control.

EMAIL DRAFT - CLIENT DELIVERABLE



CONTROL POINT

The workflow creates a draft - not a sent message. A person can review the competitor choice, evidence, wording, and recommendations before any client communication leaves Gmail.

SAFE COMMUNICATION STATES

Draft Created

Automated research becomes a prepared email.

Human Review

A person checks accuracy and tone.

Manual Send

Only a reviewer decides whether to send.

Successful runs, intentional failure, traceable outcomes

The workflow was validated with successful end-to-end runs and a deliberate malformed-JSON test to confirm that critical failures are surfaced and stopped.

2

completed validation runs visible in the log

1

controlled Parse JSON failure test

5

critical failure points instrumented

1

terminal log row per execution

CENTRALIZED AUTOMATION LOG

1	Run ID	Timestamp	Client ID	Client Company	Workflow Status	Competitor Selected	Research Status	Airtable Status	Email Draft Stat
2	RUN-20261002-193824-5	Oct 2, 2026 7:38 PM	CL-5	Kayser Marketing	Completed	Thrive Internet Marketing Agency	Complete	Complete	Draft Created
3	RUN-20261002-210422-6	Oct 2, 2026 9:04 PM	CL-6	Kavana Digital	Error		Error	Client Created	Not Created
4	RUN-20261002-212326-5	Oct 2, 2026 9:23 PM	CL-5	Zigma Internet Ma	Completed	BrandLume Inc	Complete	Complete	Draft Created
s	Airtable Status	Email Draft Status	Started At	Completed At	Error Step	Error Message	Processing Notes		
	Complete	Draft Created	Oct 2, 2026 7:38 PM	Oct 2, 2026 7:38 PM			Competitive research completed and client email draft created for human review.		
	Client Created	Not Created	Oct 2, 2026 9:04 PM	Oct 2, 2026 9:04 PM	Parse Research JSON	Source is not valid JSON.	AI research completed, but the returned output could not be parsed into the required structured JSON.		
	Complete	Draft Created	Oct 2, 2026 9:23 PM	Oct 2, 2026 9:23 PM			Competitive research completed and client email draft created for human review.		

WHAT THE TEST SHOWED

- Successful runs created the competitor, competitive analysis, linked research sources, Gmail draft, and a completed Automation Log row.
- The malformed JSON test changed the client state to Error, logged the exact failure step and message, and stopped downstream competitor, analysis, source, and email actions.
- Error handling is concentrated on the critical AI and database-write stages instead of adding maintenance-heavy handlers to every administrative update.

EVALUATION NOTE

This is portfolio-scale functional validation, not a production benchmark. The Parse JSON handler was deliberately exercised; the remaining critical handlers were configured but not artificially forced. Real public company websites were used only to validate the workflow.

What this project demonstrates

The value is not simply that an LLM can summarize a competitor. It is the system around the model: autonomous research, explicit selection logic, structured records, evidence, review boundaries, and operational traceability.

AGENTIC AI

Autonomous search, page inspection, candidate comparison, and research deepening.

ORCHESTRATION

Make coordinates Forms, Sheets, AI Agent, Tavily, Airtable, Gmail, and logging.

STRUCTURED DATA

Strict JSON becomes normalized Client, Competitor, Analysis, and Source records.

HUMAN-IN-THE-LOOP

Client communication is draft-only; a person retains the final send decision.

OBSERVABILITY

Run IDs, statuses, timestamps, source records, and one terminal log row provide traceability.

ERROR HANDLING

Critical failures write explicit error states and stop unsafe or incomplete downstream actions.

FINAL RESULT

A complete agentic competitive-intelligence workflow that can capture client context, research the live web, evaluate multiple competitors, select one primary competitor, structure and store findings, preserve supporting sources, draft a client-ready analysis, and log both successful and failed executions - while keeping the final client communication under human control.

Jerry J. Hudson

RivalScope Strategy Agentic Competitive Intelligence - Portfolio Case Study

Google Forms

Make

Make AI Agent

Tavily

Airtable

Gmail

Google Sheets