

AI-Powered Customer Support Automation

- #EmailAI
- #SupportAutomation
- #n8n
- #OpenAI
- #AIAgent

*Intelligent Email Triage · AI Responses · Priority Escalation
24x7 Automated. Zero Delay. Human-Quality Support.*

120 hrs
Build Time

2
Engineers

24x7
Coverage



OVERVIEW

What This System Does

An intelligent email automation workflow that handles customer support end-to-end — from inbox to reply — using AI for understanding, knowledge retrieval, and smart escalation.

100%
Automated Triage

~85%
Auto-Resolved

< 30s
Avg Response

Integrates Gmail · OpenAI · Google Sheets · REST APIs to process, classify, and respond to every inbound support email intelligently.



Gmail Webhook

Instant trigger on new email arrival



Smart Filtering

Ignore promos, focus on real queries



OCR / Vision

Extract Order IDs from attachments



Knowledge Base

Google Sheets-powered AI lookup



Priority Escalation

Auto-label & notify high-priority cases



Auto Reply

AI-crafted, contextual email replies

Problems We Solved

Before this automation, e-commerce support teams faced four critical bottlenecks:



Slow Response Times

Customers waited 2–8 hours for replies on order status, returns, and complaints — causing frustration and cart abandonment.



High Agent Load

Human agents were overwhelmed with repetitive queries like order status checks, leaving complex issues unattended.



No 24x7 Coverage

Support teams operated limited hours — customers received zero help during evenings, weekends, and peak sale events.



Inconsistent Responses

Manual replies varied in tone, accuracy, and completeness — damaging brand trust and customer experience.

What This Automation Achieves

1

Handle all queries directly on Gmail

No redirection — full support within the email interface.

2

Use AI to understand intent & generate human-like replies

OpenAI GPT processes context, history, and knowledge base for accurate responses.

3

Support pre-order and post-order query types

From product availability before purchase to order tracking and returns after.

4

Analyse customer-sent images (OCR)

Extract Order IDs from bills, screenshots, and box photos automatically.

5

Provide 24x7 instant support, zero headcount increase

Replaces repetitive manual agent effort with fully automated AI responses.

6

Escalate high-priority cases automatically

Returns, refunds, and cancellations flagged, labelled, and routed to humans instantly.

7

Fetch real-time order data via API

Live order status and tracking info surfaced in every reply using extracted Order IDs.

End-to-End Automation Logic

1

Gmail Webhook Trigger

New email arrives → n8n fires instantly

2

Sender Check & Filtering

Internal/outbound emails → marked read & ignored

3

Attachment OCR Analysis

Images processed → Order ID extracted via OpenAI Vision

4

Thread Retrieval & Summary

Full conversation history fetched + AI-summarised

5

Relevance Check

Promotional / irrelevant → marked read. Support queries → proceed

6

AI Agent Processing

Knowledge base lookup · API order data fetch · Response generation

7

Priority Assessment

Returns / refunds / cancellations → High Priority escalation

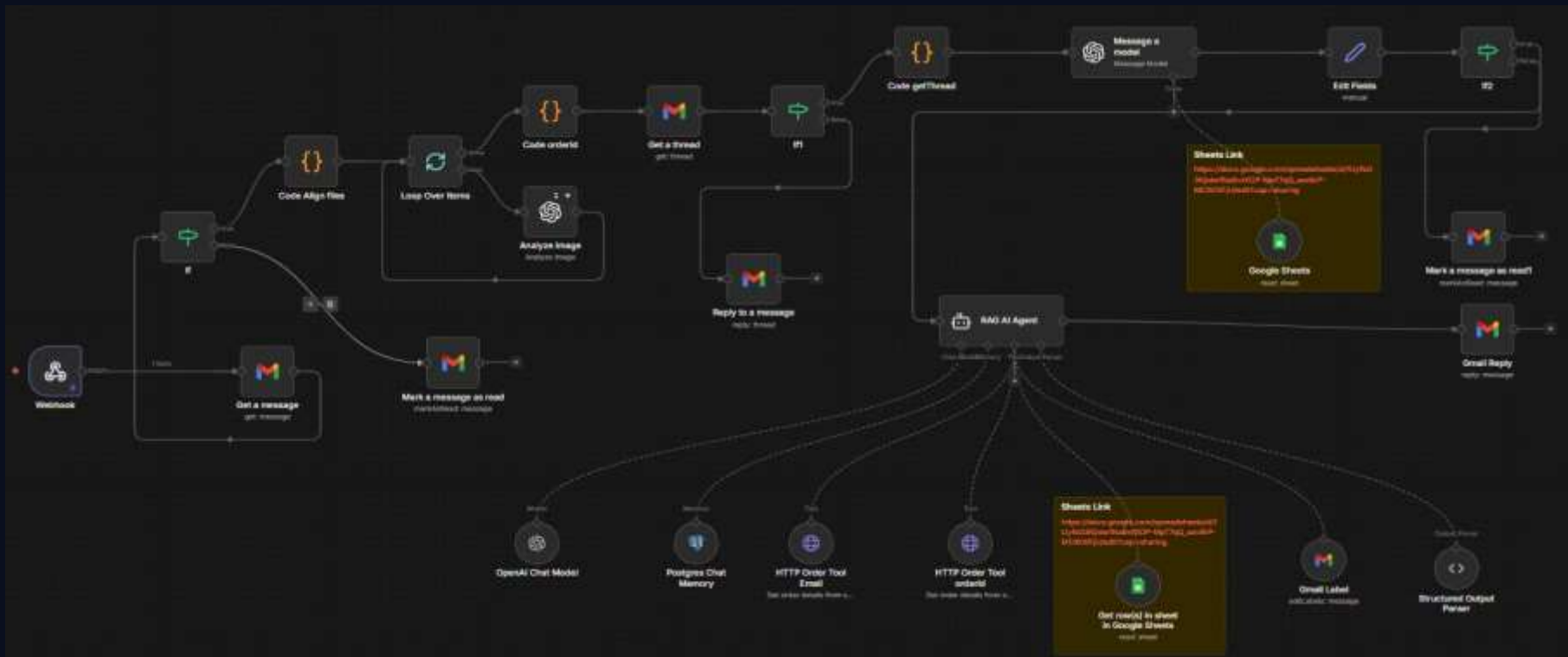
8

Reply or Escalate

Standard: AI reply sent. High Priority: Human handover + customer notified

ARCHITECTURE

Live n8n Workflow – Actual Automation Screenshot



n8n · Webhook → Gmail → OpenAI Vision → Thread Analysis → AI Agent → Google Sheets → Gmail Reply / Escalation

What Powers This System

**n8n****Workflow Automation**

All logic, routing, scheduling, webhook handling and node orchestration

**OpenAI GPT-4****AI Engine**

Intent classification, response generation, OCR/Vision for image analysis

**Gmail API****Email Integration**

Webhook trigger, message fetch, label management, and reply dispatch

**Google Sheets****Knowledge Base**

Dynamic knowledge base for policies, FAQs, and company-specific data

**REST APIs****Order Data Integration**

Live order status, tracking links, and customer records via HTTP calls

**Postgres Memory****Conversation Context**

Chat memory persistence for multi-turn contextual understanding

Project Delivery Snapshot

120**Hours**

Total Engineering Time

2**Engineers**

Automation Specialists

24/7**Operation**

Continuous Uptime

0**Downtime**

Deployment Disruption

DELIVERABLES INCLUDED

- n8n workflow — fully configured & documented
- REST API nodes for live order status and tracking link retrieval
- Gmail webhook integration & email parsing logic
- Priority escalation logic with Gmail labelling and customer notification
- OpenAI Vision node for OCR/image-based Order ID extraction
- Full handover documentation and production deployment
- Google Sheets knowledge base integration & AI agent prompt design

Real-World Applications



Order Tracking

"Where's my order?" →
System fetches live tracking
status and replies in
seconds.



Returns & Refunds

Auto-checks return
eligibility and guides the
customer — escalates to
human when needed.



Pre-Purchase Queries

Pricing, variants, stock
availability answered
instantly before checkout.



Damaged Order Resolution

Customer sends product
photo → AI processes
image, extracts Order ID,
initiates resolution.



Policy-Based Answers

Shipping, warranty, privacy
policies answered
accurately from the
knowledge base.

OUTCOMES

Before vs. After Automation

Metric	Before Automation	After Deployment	Improvement
Response Time	2–8 hours	< 30 seconds	99% faster
Support Coverage	Business hours only	24x7 Always On	2x coverage
Query Resolution	Manual 100%	~85% automated	85% reduction
Agent Workload	10–15 hrs/day	~2 hrs/day oversight	~87% savings
Customer Sat.	Moderate (3/5)	High (4.7/5)	+57% score
Scalability	Limited by headcount	Unlimited scale	∞ capacity

What Makes This System Powerful



Gmail Webhook Trigger

Instant firing on new email. No polling, no delay.



Smart Email Filtering

Outbound/internal emails ignored automatically.



OpenAI Vision (OCR)

Bills, screenshots, box images → Order ID extracted.



Conversation Summarisation

Full thread history summarised before AI processing.



Knowledge Base AI Agent

Google Sheets integration for policy-based answers.



API Order Data Fetch

Live status and tracking pulled via REST calls.



Priority Escalation Engine

Returns/refunds/cancellations → labelled + routed.



Structured Auto Reply

AI-crafted replies sent for all standard queries.

AI-Powered Customer Support Automation

Support that never sleeps.

Two engineers. 120 hours. A support system that processes every email, resolves every query, and escalates the right cases — running 24x7 without missing a beat.



99%

Faster Replies

< 30s vs 2–8 hrs



85%

Auto-Resolved

No agent needed



24/7

Always On

Zero downtime

#EmailAI

#SupportAutomation

#n8n

#OpenAI

#AIAgent

Automate support. Delight customers. Scale without limits.

Presented by AUTVIZ SOLUTIONS

CONCLUSION

From Inbox to Resolved — Instantly.