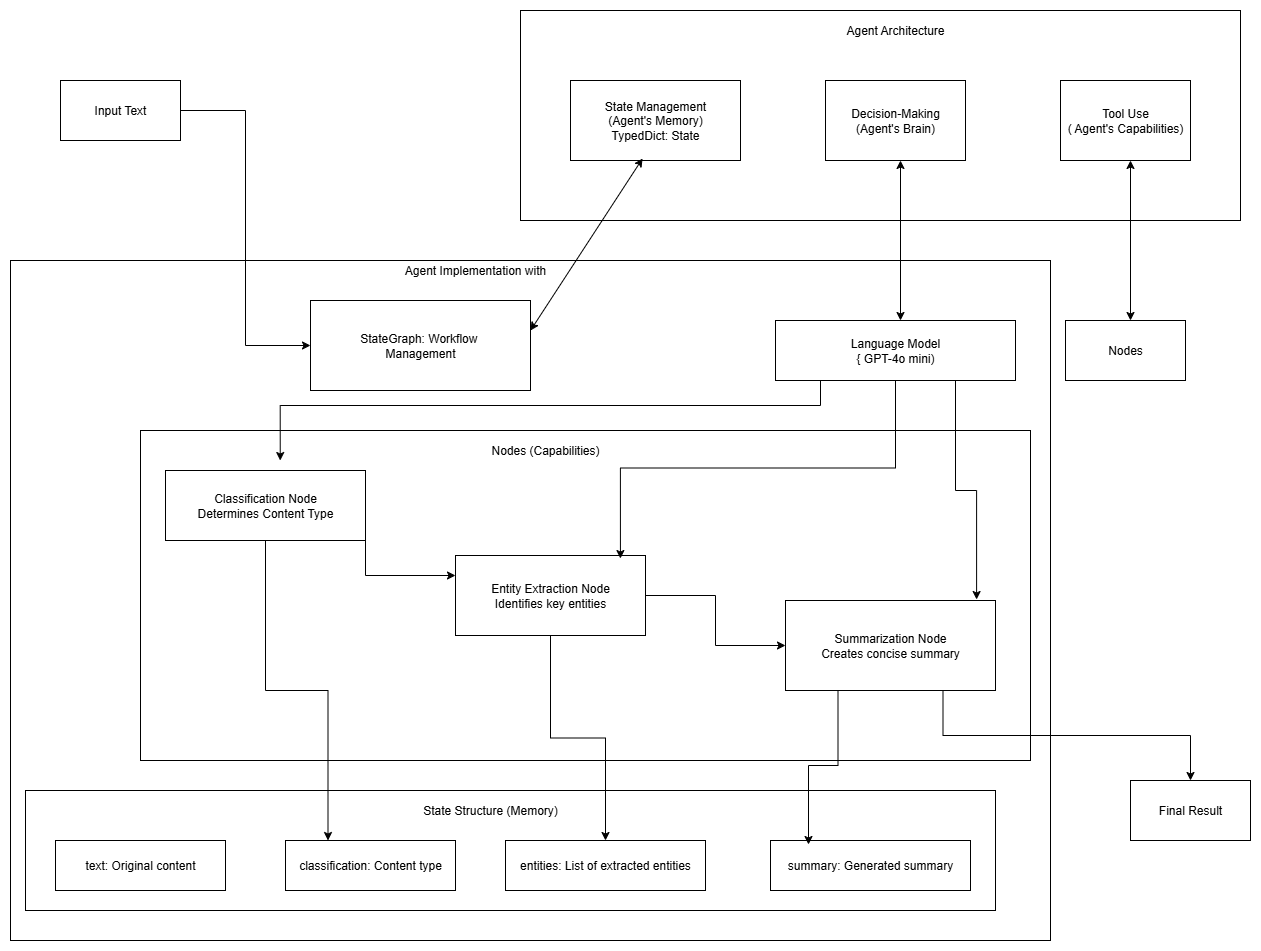
Medium Article Analyzer

# Phase 1: MVP

## Agent Architecture



The MVP is basically a multi-node AI agent built with

1. LangGraph - Agent workflow orchestration
2. LangChain - LLM framework and prompt management
3. LLM - gpt-4o-mini - Language model for text processing
4. Python - Core implementation language

Key features:

1. Text Classification: Automatically categorizes text into News, Blogs, Research, and Other
2. Named Entity Recognition: Extracts people, organizations, and locations from text
3. Text Summarization: Generates concise one-sentence summaries
4. Workflow Orchestration: Uses LangGraph state management for coordinated multi-step processing
5. OpenAI Integration: Powered by GPT-4o-mini for reliable text analysis

The nodes in this MVP are:

1. Classification Node
2. Entity Node
3. Summarization Node

## Phase 2: Medium focused text analysis

The MVP is extended to a medium focused text analyzer which takes in the medium articles and generate intelligent insights.

## Agent Architecture

A diagram of a computer

AI-generated content may be incorrect.

Extra Tools used

* requests – to fetch article content from Medium URLs
* BautifuSoup4 – for parsing and extracting article HTML content

#### Medium Specific Enhancements

1. Article fetching from URL – Automatically pulls full article text, title, author from a Medium link. Handles HTML parsing and formatting cleanup
2. Topic Classification (Medium styles) – Categorizes into technical/Programming, Data Science/AI, Business, Personal Development, Marketing, Opinion etc.
3. Sentiment and Tone Analysis - Determines if the tone is informative, critical, emotional etc. Gauges Sentiment (Positive, Neutral, Negative)
4. SEO and Structure Analysis – Checks heading count, introduction/conclusion presence, formatting quality, estimates SEO score for the title
5. Engagement Prediction – Evaluates clarity, readability level, and engagement potential. Predicts whether article is high/medium/low in audience interest