Perfect! Here's your **finalized and updated project documentation**, with the new **clarified LLM model selection** and **temperature impact** added in the right place, without changing any of your original structure or priorities.

✅ Project Specification: AI-Powered Social Interaction Monitor

Version: Free (MVP) – Browser-Based Only
Goal:
Build a lightweight, free tool that helps users monitor competitor brand mentions on Reddit and Quora, discover relevant threads, and generate AI-powered replies — without any backend database or login system.

🎯 Primary Objective

Create a browser-based (no-database) tool that:

- Identifies threads where a **competitor is mentioned but your brand is not** → mark as "Opportunity"
- Finds **high-traffic, engaging threads** by keyword or niche
- Generates **AI replies** (Informational / Promotional)
- Allows **regeneration** and **copying** of replies
- Supports **manual thread management** and **PDF reporting**

🧩 Modules Overview

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1. 🆚 Brand Opportunity Finder

Input:

- Your Brand Name & URL
- Competitor Brand Name & URL

Process:

- Use `site:reddit.com` and `site:quora.com` + competitor name via Serper API
- Identify threads where competitor is mentioned but user's brand is not
- Mark these as "Opportunity"

Output:

- Thread link
- Keyword context
- AI reply (Informational or Promotional)
- Regenerate + Copy

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2. 🔍 Thread Discovery by Keyword

Input:

- Keyword(s) / Niche / Service

Process:

- Use Google query with `site:` filters via Serper API
- Extract threads
- Show most engaging (views, freshness, title relevance)

Output:

- List of threads
- AI reply generation (info/promo)
- Copy & regenerate functionality

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3. 🧠 AI-Powered Reply Generation

- Use **ChatGPT API** (user provides key)
- Choose reply type: **Informational** or **Promotional**
- Optional **Brand Description** for personalization
- Option to **Regenerate**
- **Copy** button
- **Tone slider** (Friendly, Confident, Bold)
- Analyze existing thread replies to improve AI response

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4. 🔄 Rescan Alert System

- After scan, user sets an alert: 1 or 7 days
- Rescan checks for:
    - New competitor mentions
    - Missed opportunities
- Alerts run via browser storage (no backend)
- Real-time alert panel with preview + copy

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5. 📥 PDF Export (Performance Report)

- Export:
    - Threads discovered
    - Opportunities
    - Replies generated
    - Rescan notes
    - Timestamps
- Well-formatted: tables, charts, icons, KPIs

🔧 User Customization & API Settings

1. Add your own **Serper.dev** API key
2. Add your own **AI model API** via dropdown:
    - ChatGPT (OpenAI), Claude, Perplexity, Gemini
3. **Dropdown to select GPT model**
    - Examples: `gpt-4`, `gpt-4o`, `gpt-3.5`, `claude-3-opus`, etc.
4. **Set Temperature value** (0 to 1) for creativity control

🔄 Temperature Sensitivity (Quality Control)

When the user adjusts the **temperature setting**, the system must reflect the change in **reply creativity and tone**:

- A **low temperature** (0–0.3) = **factual, concise, formal** replies
- A **high temperature** (0.7–1) = **creative, persuasive, more casual** replies

✅ Temperature value must directly impact the **style and quality of AI-generated replies**.

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5. **Optional Brand Description Field**
   - Used to fine-tune and improve relevance in AI replies

📈 Thread Discovery & Display Enhancements

1. Show **number of views/upvotes** for Reddit/Quora
2. Show **full content preview** (not just title)
3. Include **Facebook & Twitter** threads (where possible)
4. Extract **fresh competitor mentions**
5. Find **new threads via keyword**, sorted by engagement/freshness

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🏷️ Thread Intelligence & Prioritization

1. **Sentiment-based Opportunity Scoring**
   - Negative competitor mentions = higher priority
2. **Mention Context Preview** (snippet around mention)
3. **Categorize Mentions**
   - Issues, Alternatives, Comparisons
4. **Auto-tag Threads by Topic**
   - e.g., [AI], [Pricing], [Support], [Feature Request]

📊 Reporting & Monitoring

1. **PDF Performance Reports**
   - Includes charts, KPIs, tables
2. **Live/Removal Post Tracking**
   - Track if replies are still live
3. **Real-Time Alert Panel**
   - Current alerts with preview/copy
4. **Scheduled Re-scan Feature**
   - Set interval: 1 day, 7 days, etc.

🔐 User Experience – Free Version Focus

- **No login/account system**
- **No database** required
- All data handled via browser memory or temporary cache
- Fully front-end & lightweight
- Ideal for testing and internal use

🛠️ Tools & APIs to Be Used

Component	Technology/Method
Google Results Scraping	Serper.dev (user provides key)
AI Reply Generation	ChatGPT API / other AI API (user key)
UI	No-code (Softr, Glide, Bubble, Replit UI)
PDF Export	Browser-based PDF generator
Caching	Browser localStorage

🌱 Future-Ready Plan (Won't Interfere with Free Version)

These features will be added modularly in later versions to avoid disrupting the current free structure.

✅ Future Expansion Modules (Optional)

- Add User Accounts & Login
- Multi-project / multi-brand support
- Database Layer (Airtable / Supabase free tier)
- Reply history + engagement tracking
- AI Performance Stats
- Team roles per project
- Analytics Dashboard

🚀 Summary for No-Code Developer

Feature	Build Now?	Notes

Brand Opportunity via Serper.dev	✅	Google query using `site:`
Keyword Thread Discovery	✅	Filtered by engagement
AI Reply Generation (Info/Promo)	✅	ChatGPT or other models
Regenerate + Copy Buttons	✅	Simple button logic
Tone & Temperature Settings	✅	Customize GPT response behavior
Optional Brand Description	✅	Added relevance for AI
Thread Content & Views	✅	Display in UI
Rescan Alert & Reminder	✅	Use localStorage
PDF Export	✅	Threads + replies + charts
Social Thread Sources (FB/Twitter)	✅	When available
Sentiment Scoring & Tags	✅	Thread-level meta logic
User Accounts & DB	❌	Future phase only

Let me know how you'd like it exported:

- 📄 PDF
- 📋 Google Doc
- 🔲 Notion-compatible format
  Or all three — just say the word!