Research Journal Entry

Pate: August 6th, 2025

Project: AI & The Evolution of Student Learning: A Data-Driven Analysis

Researcher: [User's Identity Redacted for Privacy]

Overview of Today's Work

Today marked a milestone in the AI in Education research project. The full session was focused on completing the Reddit phase of our data collection and sentiment analysis pipeline. By the end of the session, we successfully scraped, filtered, analyzed, and labeled a high-integrity dataset of 681 Reddit posts related to AI's impact on learning and academic ethics. We also compared AI ethics frameworks across major technology companies and aligned those findings with public sentiment captured from the Reddit sample.

We concluded that we are now in a strong position to transition to the next social media platforms (Twitter/X, Discord, etc.) while maintaining a clean structure for theme extraction, quote mining, and multi-platform comparison.

Dataset Summary: Reddit (Complete)

⊗ Total Records: 681 Reddit posts

CSubreddits Scraped:

- r/Professors higher-education faculty concerns
- r/edtech use of AI tools in education
- r/AIethics discussions on fairness, responsibility, and transparency
- r/education general perspectives across teachers and learners

Metadata Captured:

- title + selftext (full body of post)
- subreddit, score, created_utc, url
- Computed columns: user_type (student/professor/developer/unknown), sentiment_label, sentiment_score, themes

Themes Detected:

- cheating (e.g., AI enabling dishonest behavior)
- accessibility (e.g., AI supporting underserved learners)
- feedback (e.g., students using AI to refine writing)
- overreliance (e.g., AI reducing student effort)

Most Useful Posts (Sample Analysis)

Negative Sentiment (e.g., harm, fear, loss)

- Post: "Students just don't care anymore" A viral thread (>1000 upvotes) lamenting student apathy, implicitly linked to AI-based shortcuts.
- Post: "It's happening already..." A professor shares concerns about receiving robotic, AI-crafted emails and assignments.
- Impact: Highlights emotional burnout and distrust toward student work authenticity.

Positive Sentiment (e.g., adaptation, usefulness)

- Post: "I've made my peace with AI" An educator opens up about accepting AI's role and shifting grading strategies.
- Post: "With AI online instruction is over" Candid admission of AI transforming what remote learning looks like.
- Impact: Shows potential for adaptation and rethinking pedagogy around AI.

Neutral Sentiment (e.g., analytical, factual)

- Mixed posts with constructive comparisons (e.g., using AI to create feedback variations or analyze rubric fairness).
- Impact: Valuable middle ground for shaping design principles that include pros/cons awareness.

⋖ Corporate Ethics Comparison

<u>M</u> OpenAI

- Emphasizes "alignment with human values" and AGI for the benefit of all.
- Implements System Cards, Model Spec, Red-Teaming, and external safety advisors.
- Actively updates usage policies to include emotional well-being limits (e.g., discouraging ChatGPT for therapy).

Google

- Original AI principles focused on fairness, safety, and privacy.
- Recently shifted language away from bans (e.g., military use) toward "risk mitigation" and "oversight".
- Signed EU's voluntary AI Code of Practice to show accountability while maintaining design flexibility.

⊞Microsoft

- Focused on **operationalizing Responsible AI** with 6 pillars: fairness, reliability, privacy, inclusion, transparency, accountability.
- Tools like Responsible AI Dashboards make ethics actionable across departments.
- Viewed as the most structurally mature in terms of governance tooling.

Key Reflections from Today

- Ethical Frameworks vs. Public Perception: Public discourse (via Reddit) tends to focus on microconcerns like cheating and laziness. Corporate frameworks lean toward macro-level concepts like alignment and bias mitigation.
- **Quote Power**: Several high-impact quotes were identified that reflect authentic fear, hope, or practicality around AI in education.
- **Gap Analysis**: There's often a gap between what companies say about AI ethics and what educators or students feel. This contrast will be central to the report's value.

Planned Next Steps

Social Platforms to Scrape:

- Twitter/X public discourse and policy chatter
- Discord AI education server discussions
- Facebook public educator and AI developer pages
- TikTok transcript analysis of AI discussions in short videos

Analytical Layers to Add:

- Time trends (e.g., sentiment shifts pre/post ChatGPT)
- Role-specific emotion heatmaps (student vs. professor)
- Quote banks to visualize case-based opinions
- Ethical implementation cost analysis (for scalability)

Foundational Work Completed Today:

- Built the central Reddit dataset (final form, ready for dashboarding)
- Tested sentiment classification and theme detection
- Explored comparative ethics at scale

Conclusion

Today cemented Reddit as a credible, high-yield source of discourse on AI in education. We ended with a solid, labeled dataset ready for synthesis and presentation. The intersection between Reddit discourse and corporate AI values will be the crux of our ethical impact framing.

This journal ensures no context is lost for the next stage — continuing this momentum with Twitter scraping and cross-platform alignment.

End of Entry — August 6th, 2025