

Collection Name	Key Fields	Purpose
users	id, name*, mobile_number*, email, gender*, age_group, region, exam_ids[], last_login, referral_code	Complete user identity and profile tracking with segmentation, referral, exam goals, and account status
sessions	session_id, user_id, start_time, end_time, question_ids[], session_type, device_type, ip_address	Session-based grouping for analysis, feedback, recall, and IP/device-based security logging
user_progress	user_id, topic_id, completion_percentage, confidence_level (1-5), last_accessed, repeated_doubt_ids[], assessment_scores[], time_spent_minutes	Granular progress with doubt tracking, confidence insights, performance scoring, and time analytics
projects	project_id, user_id, title, subject, unit, topic, sub_topic, saved_content_ids[], notes[], created_on	User-curated academic spaces with save/share/test capabilities, privacy modes, and peer collaboration
chats	chat_id, user_id, subject, unit, topic, sub_topic, question_text, response_text, timestamp, source_ref_type, source_ref_id, media_type, media_url, topic_tags[], feedback_rating	Core chat engine logs including media, sentiment, AI feedback, and academic context
glossary_terms	term, definition, subject, unit, topic, sub_topic, user_mention_ids[], linked_chat_ids[]	Smart glossary linked to user history and academic tags with lifecycle tracking
doubt_trends	feed_id, title, subject, unit, topic, sub_topic, question_ids[], frequency_count[], trending_score, date_range, geo_location	Community-driven doubt trend module for social learning and analytics
learning_content	id, content_type ENUM('diagram','numerical','text','video'), metadata JSONB, version_control_id, linked_asset_ids[], content_status ENUM('draft','published','archived'), review_date	Rich multimedia content stored flexibly and audit-ready with tagging and version control
motivational_triggers	id, condition_type ENUM('streak','completion','time-based'), trigger_value, message_template, visual_emoji, audience_type, trigger_priority, ab_test_status ENUM('active','variant_a','variant_b')	AI-generated motivational triggers personalized by condition, stage, and test cohorts
subjects	id, name, stream_type ENUM('science','humanities','commerce'), syllabus_version, applicable_exam_ids[], is_active	Root subject table with stream categories and linkages to national curriculum structures
topics	id, subject_id, name, unit_index, related_topic_ids[], prerequisites[], learning_objectives[], is_active	Unit-level academic mapping with clear learning paths, pre-reqs, and goal tracking
assessments	assessment_id, subject, unit, type ENUM('MCQ','Numerical','Subjective'), difficulty_level ENUM('easy','medium','hard'), content_ids[], duration_minutes, passing_score	Assessment engine mapping quizzes/tests to content and scoring metrics
media_assets	media_id, type ENUM('image','diagram','numerical','audio'), description, tags[], topic_id, subject, uploaded_by, file_size_kb, resolution, created_on	Media reference repository for numerical, visual, and spoken content segments
motivational_prompts	prompt_id, text, stage_trigger ENUM('onboarding','exam_preparation','post_exam'), user_type_tags[], visual_type ENUM('emoji','owl_doodle'), delivery_time, target_emotion, delivery_channel ENUM('chatbot','email','push')	Emotional and motivational support logic that tailors user experience via emotion-state hooks
user_activity	session_id, user_id, question_log (TSVECTOR), confusion_flag, auto_generated_tags[], language_pattern, session_duration	Logs platform language behavior, auto-tagging, confusion metrics, and linguistic UX

feedback_ratings	feedback_id, chat_id, user_id, usefulness_score, content_quality_score, flagged_reason ENUM('inaccurate','offensive','outdated'), remarks, timestamp	Aggregates explicit user ratings for AI quality control, issue flagging, and moderation
ai_training_logs	log_id, prompt_text, ai_response, feedback_score, corrected_by_admin, training_tag ENUM('accuracy','tone','relevance'), model_version, timestamp	Records AI fine-tuning moments, performance issues, retraining data by model version
language_variants	variant_id, subject, unit, topic, original_text, translated_text, language, tone_type ENUM('formal','informal','encouraging')	Handles multilingual, culturally adapted content with semantic tone control