Submitted By:
Malaika Zulqarnain

What Was Wrong
The original blogging database had multiple design and structural issues.
Data was not properly normalized, which caused redundancy and inconsistency.
Multi-valued attributes such as tags, likes, and bookmarks were stored incorrectly.
Primary keys and foreign key constraints were missing or incomplete, so referential integrity was not enforced.
Some data types and defaults were incorrect and not compatible with Microsoft SQL Server.
Relationships between users, blogs, categories, comments, likes, and bookmarks were unclear or improperly implemented.

What I Fixed
The database was redesigned and normalized up to Third Normal Form (3NF).
All redundant and non-atomic fields were removed and separated into proper tables.
Correct primary keys, foreign keys, and constraints were added to maintain data integrity.
Data types were corrected according to Microsoft SQL Server standards.
Proper one-to-many and many-to-many relationships were implemented using associative tables.
Consistent and meaningful naming conventions were applied across all tables and columns.

What Improvements I Added
A complete blog tagging system using a many-to-many relationship was added.
Blog status functionality (draft / published) was introduced.
Blog view tracking was implemented for analytics.
A roles and permissions system was added for better user management.
Soft delete support was included to prevent permanent data loss.
Timestamps (created_at, updated_at) were added for audit and tracking purposes.
Indexes were applied to improve query performance and scalability.