

COLLEGE CODE : 9111

COLLEGE NAME : SRM Madurai College for Engineering and Technology

DEPARTMENT : Computer Science and Engineering

STUDENT NM-ID : 4BF0134536EB1DB9BD0436F56619B6E2

ROLL NO : 911123104010

DATE : 06/10/2025

Completed the project named as Phase 5

TECHNOLOGY PROJECT NAME : IBM-FE-Blog Site with Comment Section

SUBMITTED BY,

NAME : Gokularam M

MOBILE : 8870213343

IBM-FE-Blog Site with Comment Section

Phase 5 Report

1. Final Demo Walkthrough

Overview:

DevBlog is a modern blogging platform built for developers to share knowledge, insights, and tutorials. It provides user authentication, post creation, comment sections, trending posts, search and filter options, and a save/bookmark feature.

Key User Roles:

- **Guest Users:** Can view posts, search, and read comments.
- **Registered Users:** Can create posts, comment, save blogs, and manage their profile.

Walkthrough Steps:

1. **Home Page:**
Displays all blog posts with featured/trending highlights. Users can browse posts or use filters.
2. **Login / Signup Page:**
Allows users to register or log in securely using Supabase Authentication.
3. **Create Post:**
Authenticated users can create and publish new blog posts with title, description, tags, and cover image.
4. **Search & Filter:**
Search bar helps users find posts by keywords, tags, or authors.
5. **Trending Section:**
Displays top posts based on engagement metrics like likes and comments.
6. **Comment Section:**
Users can comment on posts, reply to others, and discuss ideas.
7. **Save / Bookmark Feature:**
Users can save favorite posts for quick access later.
8. **Logout:**
Ends the user session and redirects back to the homepage.

2. Project Report

Project Objective:

To design and develop an interactive blogging platform that enables developers to share and engage with content easily.

Motivation:

Developers often need a clean, ad-free, and open-source environment to write blogs, share tutorials, and interact with a technical audience. DevBlog bridges this gap.

Scope:

- Secure authentication (login/register)
- CRUD operations for blog posts
- Comment and save features
- Trending post algorithm
- Fully responsive UI

Modules:

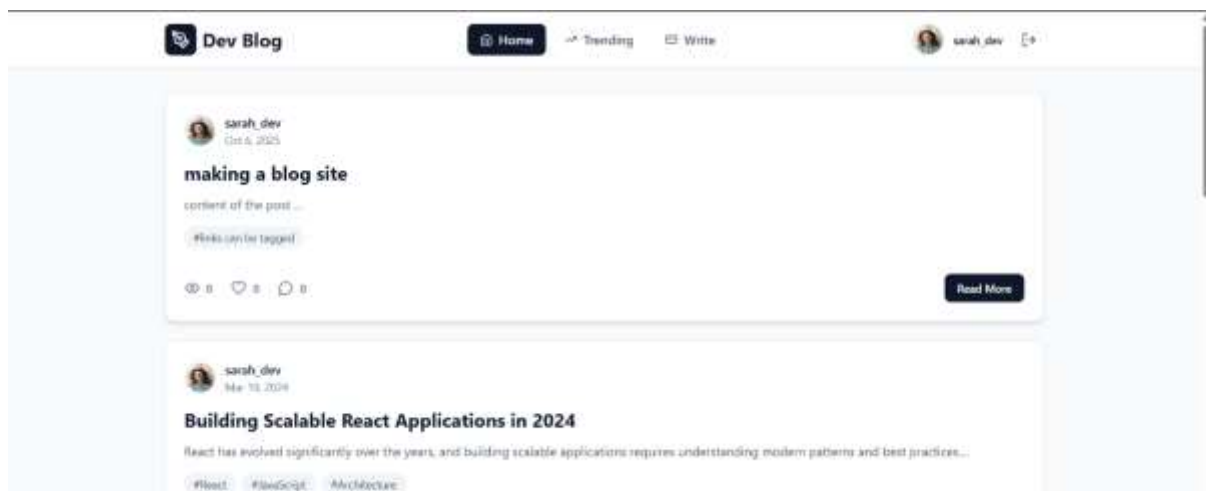
1. **Authentication Module** – Login, Register, Logout via Supabase.
2. **Blog Management Module** – Create, Read, Update, Delete blog posts.
3. **Comment Module** – Real-time comment system using Supabase database.
4. **Search & Filter Module** – Keyword and tag-based search functionality.
5. **Save/Bookmark Module** – User-specific saved posts collection.
6. **Trending Module** – Ranks popular posts based on likes/comments.

3. Screenshots / API Documentation

Login Page



Home Page



Create Post

Dev Blog

Home

Trending

Write

sarah_dev

Write a Post

Share your knowledge with the community

Writing as

sarah_dev

Title

Enter an engaging title...

Content

write your post content here... You can use markdown-style formatting:

headings
for section headings

bold text
wrap text in `for code`

Comment Section

Dev Blog

Home

Trending

Write

sarah_dev

Comments (3)

Share your thoughts...

Post Comment

john_coder

Mar 10, 12:31 PM

Great article! The component composition section really helped me understand how to structure my React app better.

emina_tech

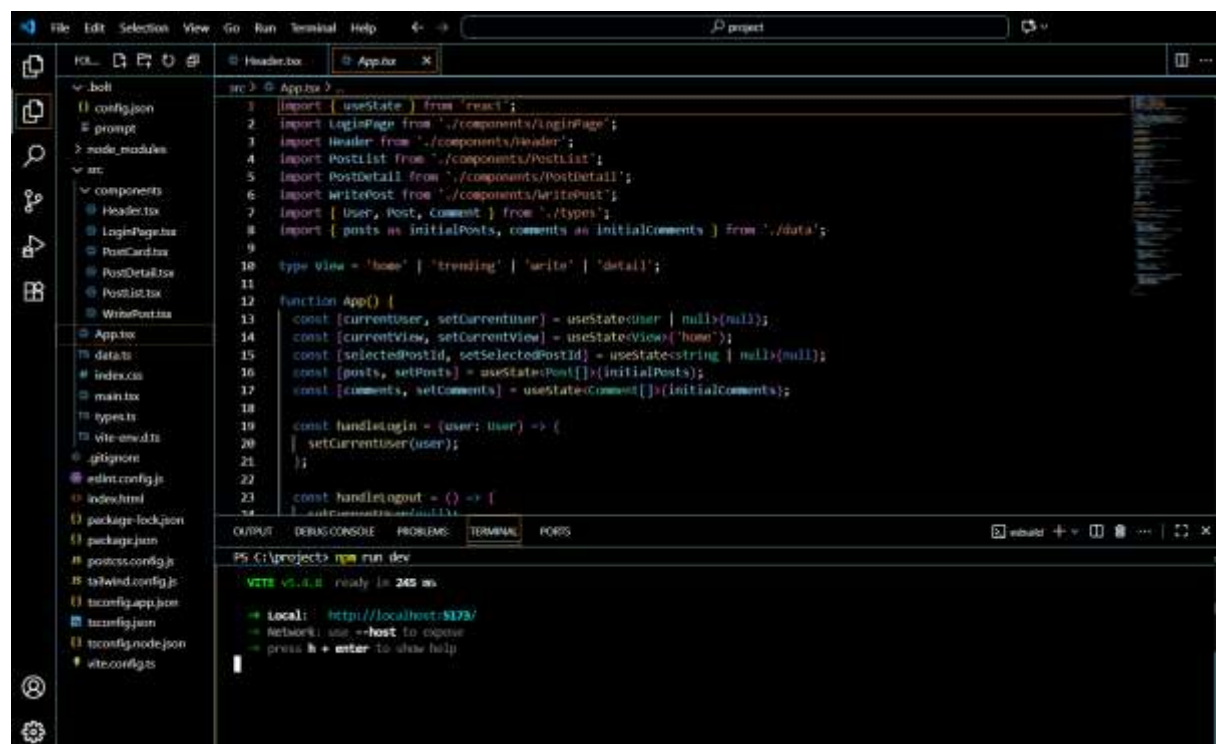
Mar 10, 04:43 PM

Thanks for sharing these insights. Would love to see more about state management patterns!

API Documentation



```
1 import { useState } from 'react';
2 import LoginPage from './components/LoginPage';
3 import Header from './components/Header';
4 import PostList from './components/PostList';
5 import PostDetail from './components/PostDetail';
6 import WritePost from './components/WritePost';
7 import { User, Post, Comment } from './types';
8 import { posts as initialPosts, comments as initialComments } from './data';
9
10 type View = 'home' | 'trending' | 'write' | 'detail';
11
12 function App() {
13   const [currentUser, setCurrentUser] = useState<User | null>(null);
14   const [currentView, setCurrentView] = useState<View>('home');
15   const [selectedPostId, setSelectedPostId] = useState<string | null>(null);
16   const [posts, setPosts] = useState<Post[]>(initialPosts);
17   const [comments, setComments] = useState<Comment[]>(initialComments);
18
19   const handleLogin = (user: User) => {
20     setCurrentUser(user);
21   };
22
23   const handleLogout = () => {
24     setCurrentUser(null);
25     setCurrentView('home');
26   };
27
28   const handleViewChange = (view: View) => {
29     setCurrentView(view);
30     setSelectedPostId(null);
31   };
32
33   const handleSelectPost = (postId: string) => {
34     setSelectedPostId(postId);
35     setCurrentView('detail');
36   };
37 }
```



```
1 import { useState } from 'react';
2 import LoginPage from './components/LoginPage';
3 import Header from './components/Header';
4 import PostList from './components/PostList';
5 import PostDetail from './components/PostDetail';
6 import WritePost from './components/WritePost';
7 import { User, Post, Comment } from './types';
8 import { posts as initialPosts, comments as initialComments } from './data';
9
10 type View = 'home' | 'trending' | 'write' | 'detail';
11
12 function App() {
13   const [currentUser, setCurrentUser] = useState<User | null>(null);
14   const [currentView, setCurrentView] = useState<View>('home');
15   const [selectedPostId, setSelectedPostId] = useState<string | null>(null);
16   const [posts, setPosts] = useState<Post[]>(initialPosts);
17   const [comments, setComments] = useState<Comment[]>(initialComments);
18
19   const handleLogin = (user: User) => {
20     setCurrentUser(user);
21   };
22
23   const handleLogout = () => {
24     setCurrentUser(null);
25     setCurrentView('home');
26   };
27
28   const handleViewChange = (view: View) => {
29     setCurrentView(view);
30     setSelectedPostId(null);
31   };
32
33   const handleSelectPost = (postId: string) => {
34     setSelectedPostId(postId);
35     setCurrentView('detail');
36   };
37 }
```

PS C:\projects> npm run dev

VITE v5.0.8 ready in 245 ms

➔ Local: http://localhost:5173/

➔ Network: use --host to expose

press h + enter to show help

****Base URL:**** `http://localhost:5173/api`

Endpoint	Method	Description	Request Body	Response
`/auth/register`	POST	Register a new user	`{ "username": "string", "email": "string", "password": "string" }`	`200 OK` - Returns user object
`/auth/login`	POST	Login user	`{ "email": "string", "password": "string" }`	`200 OK` - Returns JWT token
`/posts`	GET	Get all posts	-	Array of post objects
`/posts`	POST	Create new post	`{ "title": "string", "content": "string", "tags": ["string"] }`	`201 Created` - Returns created post
`/posts/:id`	PUT	Update a post	`{ "title": "string", "content": "string", "tags": ["string"] }`	`200 OK` - Returns updated post
`/posts/:id`	DELETE	Delete a post	-	`200 OK` - Post deleted
`/posts/:id/comments`	POST	Add comment to post	`{ "text": "string" }`	`201 Created` - Returns created comment
`/posts/:postId/comments/:commentId`	PUT	Update comment	`{ "text": "string" }`	`200 OK` - Returns updated comment
`/posts/:postId/comments/:commentId`	DELETE	Delete comment	-	`200 OK` - Comment deleted
`/posts/trending`	GET	Get trending posts	-	Array of post objects

4. GitHub README & Setup Guide

4.1 README Structure

1. Project Title
2. Description
3. Features
4. Technologies Used
5. Installation / Setup
 - o `git clone <repo_url>`
 - o `npm install`
 - o `npm start`
6. Usage Instructions
7. Screenshots
8. Demo Link / Deployed URL
9. License

5. Final Submission

DEMO LINK:

https://drive.google.com/drive/folders/17MnaZJhBP7niGV9FilcbNHQ8qyyitnxR?usp=drive_link

Github id's

NAME	GITHUB ID
Aanandha ruban MRK	https://github.com/aanandharuban
Gokularam M	https://github.com/gokularam12/gokularamrm
Mahesh MSK	https://github.com/Mahee0117
Sanjay Karthi RP	https://github.com/sanjaykarthirp
Aathish Rao AB	https://github.com/Aathish14