

MOBİL PROJECT REPORT

ZODIACFIN

20230808622 - ŞEVVAL YÖNTEM

20230808604 - ECENUR SOYBELLİ

20200808060 - MERVE TUĞÇE GEZER

VIDEO OF OUR UI:

<https://drive.google.com/file/d/1mWkUw2J8w4JcBICD-O7UFVqdgrS9qCWL/view>

FUNCTIONALITY REQUIREMENTS GATHERING

The project provides information about sign including General Zodiac Sign Information, Sun Sign Horoscopes, Zodiac Sign Quizzes, Astrology Blog and Articles, User Profiles.

General Zodiac Sign Information: Provide detailed information about each of the 12 zodiac signs, including personality traits, strengths, weaknesses, and associated symbols. Users can explore these descriptions to identify which sign best matches their characteristics.

Sun Sign Horoscopes: Generate and offer daily, weekly, monthly, and yearly horoscope predictions based on the user's sun sign. Most people are aware of their sun sign, which is determined by their birthdate. The website can offer general horoscope readings based on this information.

Zodiac Sign Quizzes: Create interactive quizzes to help users determine their sun sign based on their personality traits, likes, and dislikes.

Astrology Blog and Articles: Publish educational content that helps users learn more about astrology, zodiac signs, and how to interpret astrological information. These resources can be valuable for those new to astrology.

USER ANALYSIS

The user base of a horoscope website is notably diverse, encompassing individuals from all age groups, various cultural backgrounds, and a wide range of belief systems. The demographic profile of the audience spans the spectrum, from teenagers exploring horoscopes for the first time to senior citizens who have been consulting astrological readings for decades. The users may hail from different parts of the world, bringing with them unique perspectives influenced by their local cultures and customs. In terms of education, we find individuals with varying levels of formal education, from those who hold advanced degrees to those with only basic schooling.

TASK ANALYSIS

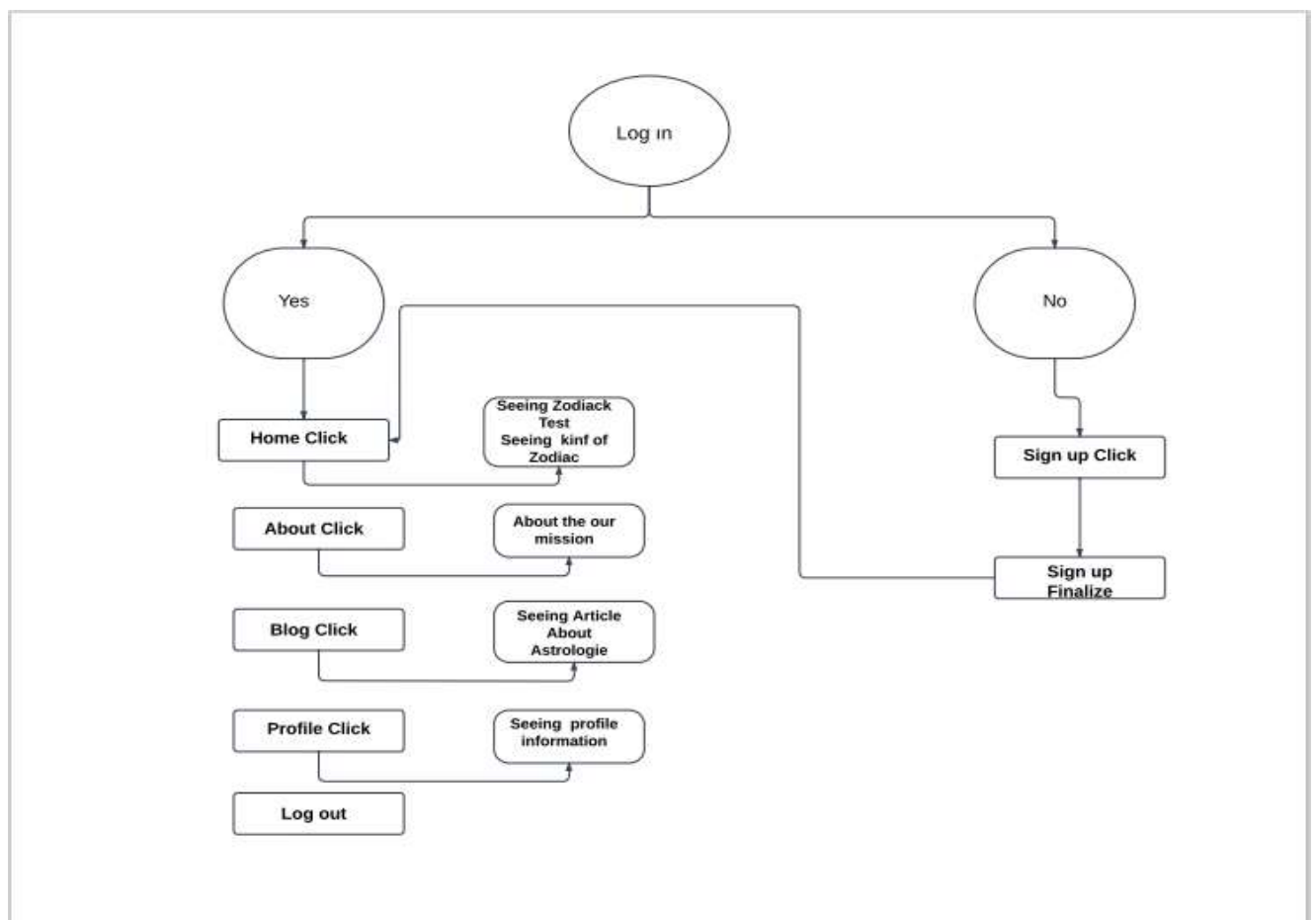
Goal: A website designed for people who do not know their date of birth but are curious about their horoscope. When these people complete the horoscope test and send it, it will be

evaluated by two expert astrologers and the horoscope interpretation will be sent to the e-mail address of the person who has completed the horoscope test. Our website also contains information about general astrology.

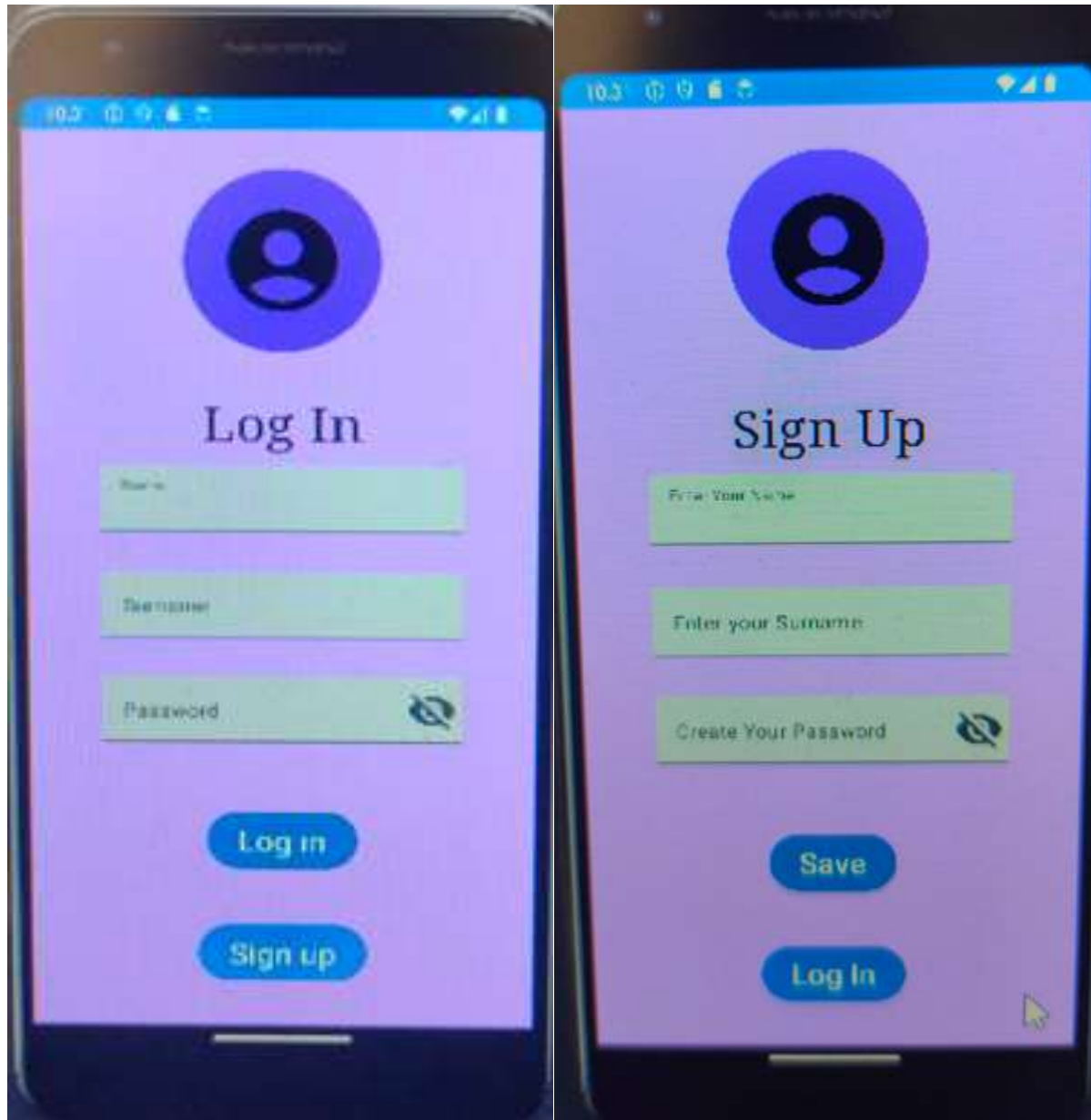
Subtasks:

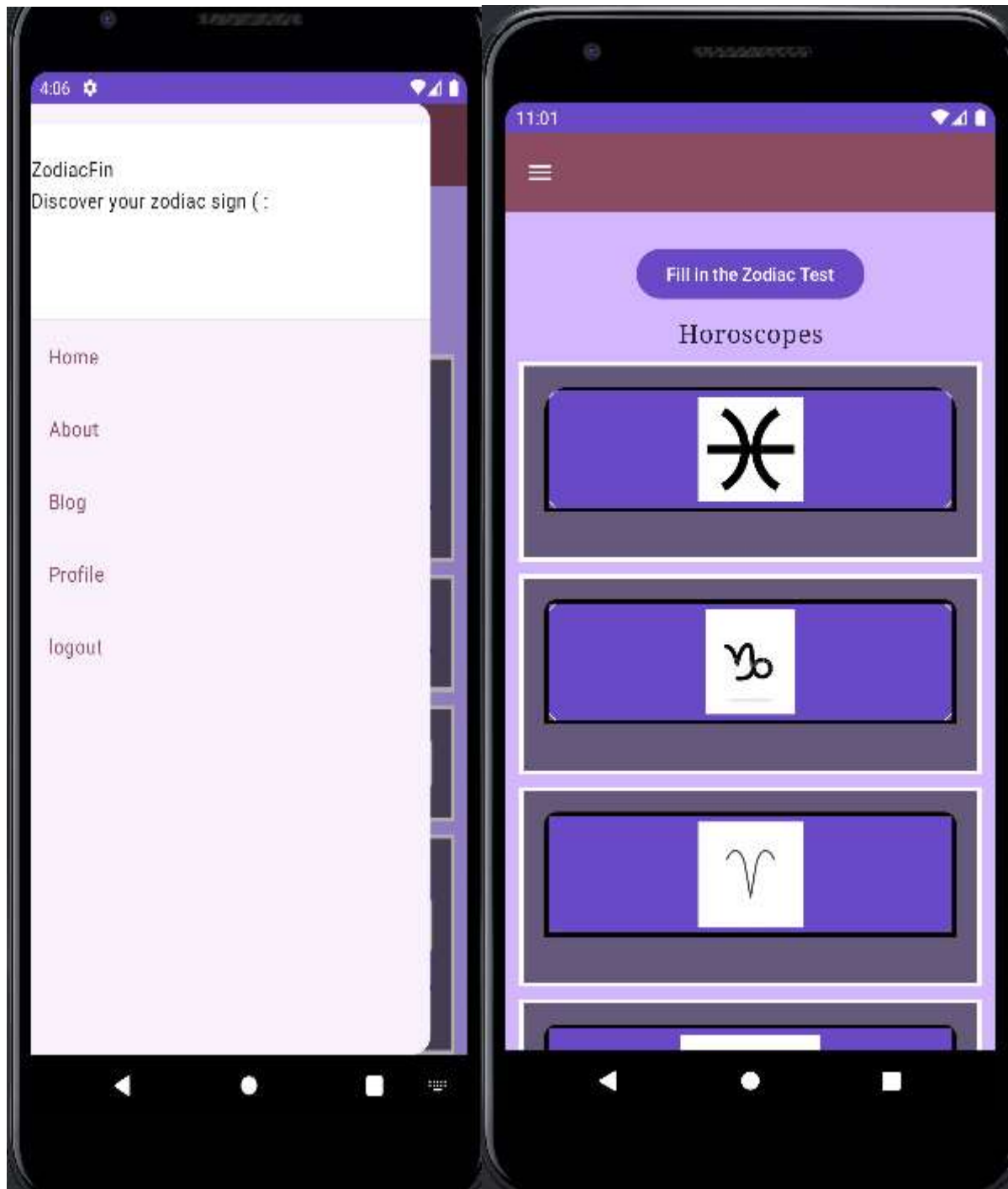
- Home
- About
- Blog
- Profile
- Zodiac Test
- Zodiac Sign
- Log out
- Log in, Sign in

FLOWCHART



UI SIDE







About

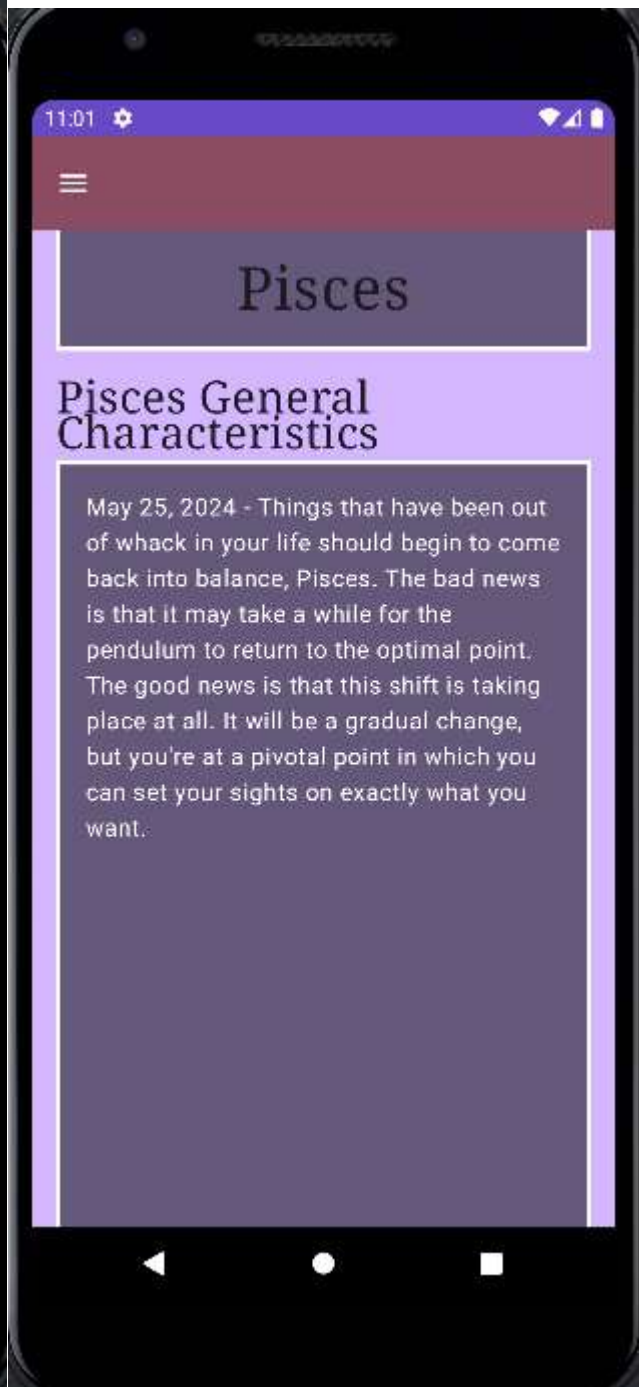
Welcome to ZodiacFin, your go-to resource for all things astrology. Our mission is to provide information and advice to help you discover your zodiac sign and gain a deeper understanding of its unique characteristics and traits. Whether you're a seasoned astrology enthusiast or a newcomer to the field, our blog has something for everyone. Our experienced team of astrologers is dedicated to sharing their knowledge and insights with you, providing detailed horoscopes, compatibility guides, and much more.

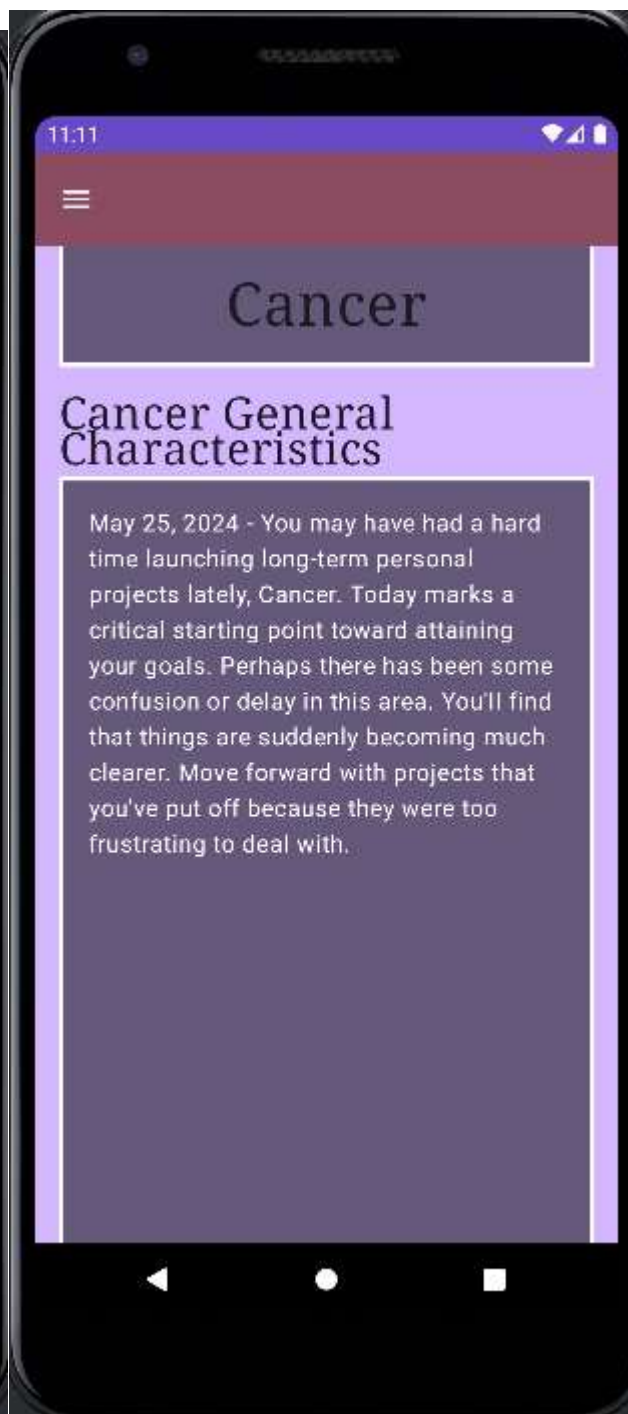
Join our community today and start exploring the fascinating world of astrology!

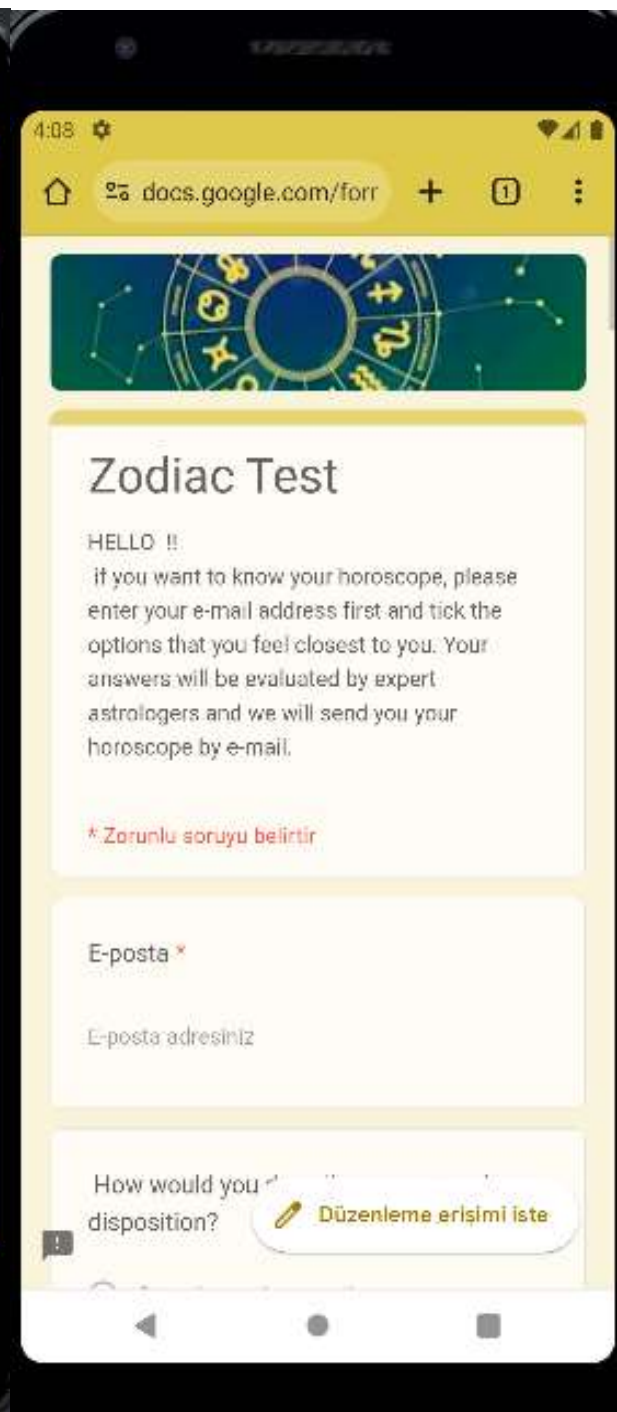
Blog

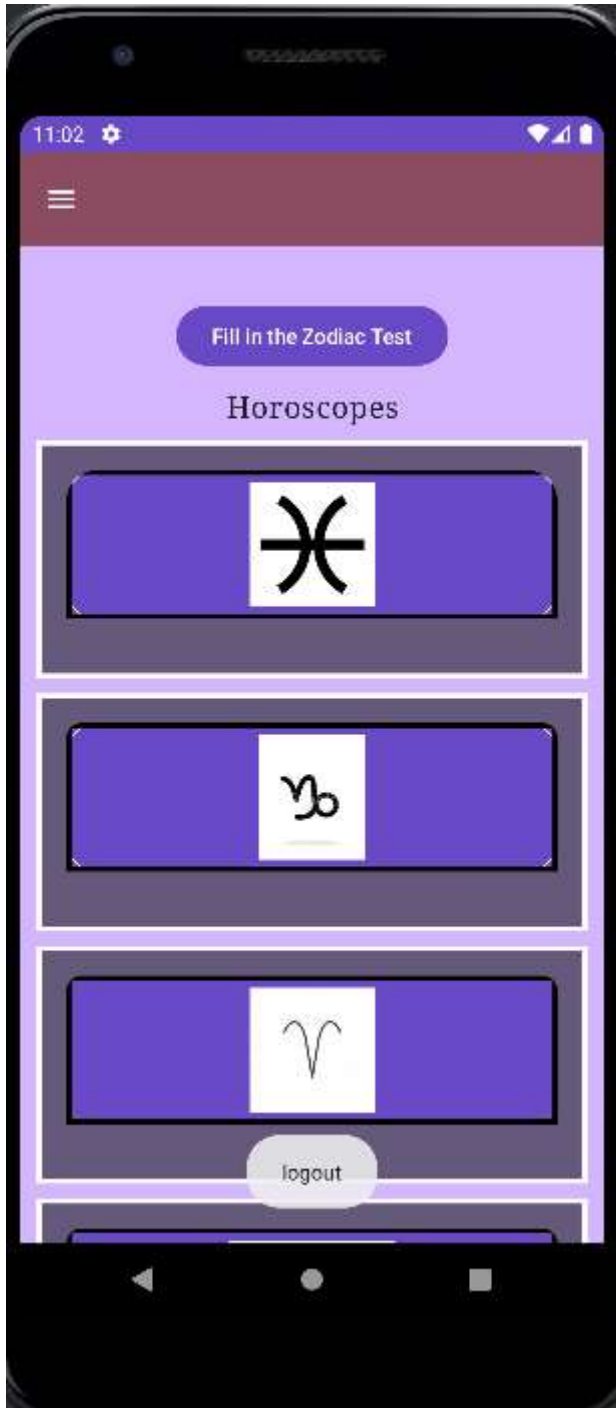
What is Astrology?

Astrology literally means 'the discourse of the stars'. In ancient Greek, it is formed by the combination of the words aster (star) and logos (discourse). Reading and listening to the discourse of the stars develops our familiarity with ourselves. In this way, this familiarity with ourselves contributes to the development of our personality and the shaping of our behaviour. When we take control of ourselves, we neither tangent nor submit to the events in our lives. On the contrary, we live more meaningful lives as individuals who act and direct. Astrology reminds us that we should not forget that events do not go towards people, but people go towards events. As people who have an impact on our own lives, when we take control of what we experience, we can become the masters of our own destiny and get away from the troubles caused by future anxiety.









While designing our application, we shared work together and supported each other.

(ŞEVVAL YÖNTEM)

Log in

In the Log In section, there are fields where the user can enter the information that the user has registered: e-mail address, username, and password. There is also a "Log In" button that redirects the user to the home page (Homescreen.kt) and a button to go to the Sign-Up section.

Sign in

The login section contains the user's e-mail address, username, and password information. This information is saved in the sign in section. There is also a button to direct the user to the log in section.

Log out

The Log Out section is in the menu. When you press the log out section, a button that says "Log Out" appears. When this button is pressed, you log out of the mobile application.

Profile

The profile section contains the e-mail address and username, which the user enters only during login (Log In).

API SIDE:

1) Define the API service interface, here we use the POST method for requests that we do not want to be displayed in the URL.

```
interface Api {  
  
    @POST("/")  
    fun sendRequest(@Body request: ApiRequest): Call<ApiResponse>  
  
}
```

2) We have defined the requests we receive from API.

```
data class ApiRequest(  
    val date:String,  
    val lang:String,  
    val sign:String  
) {  
}
```

3) Here we have defined the data we want to return as a response from the api.

```
data class ApiResponse(  
    val id :Int,  
    val date: String,  
    val horoscope: String,  
    val icon: String,  
    val sign:String  
) {  
}
```

4) We created our Modelview class.

```
> import ...  
  
class Modelview: ViewModel() {  
  
    private val _response = MutableLiveData<ApiResponse>()  
    val response: LiveData<ApiResponse> get() = _response  
  
    fun getHoroscopeFromAPI(sign:String) {  
        val request=ApiRequest( date: "2020-01-01", lang: "en",sign)  
        RetrofitInstance.api.sendRequest(request).enqueue(object : Callback<ApiResponse> {  
            override fun onResponse(call: Call<ApiResponse>, response: Response<ApiResponse>) {  
                if (response.isSuccessful) {  
                    Log.d( tag: "hatamVM", msg: response.body().toString()+"dasda")  
                    _response.value = response.body()  
                }else{  
                    Log.e( tag: "hatamVM", response.code().toString())  
                }  
            }  
        })  
  
        override fun onFailure(call: Call<ApiResponse>, t: Throwable) {  
            // Hata durumunda yapılacak işlemler  
            Log.e( tag: "hatamVM", t.message.toString())  
        }  
    }  
}
```

5) We create a retrofit class.

```
class RetrofitInstance {  
    companion object {  
  
        val api: Api by lazy {  
            Retrofit.Builder() Retrofit.Builder  
                .baseUrl(Constants.BASE_URL) Retrofit.Builder  
                .addConverterFactory(GsonConverterFactory.create())  
                .build() Retrofit  
                .create(Api::class.java)  
        }  
    }  
}
```

6) In this way we create the object of the Modelview class

```
fun SgnBa(sign:String,characteristics: HoroscopeCharacteristics,modelView: Modelview = viewModel())
```

7) By writing this code, we perform the API query via modelview

```
modelView.getHoroscopeFromAPI(sign)
```

8) We create a static object with this code and enter the default value as an empty value. In the next code, we will fill it with information from Api

9) In the modelView class, we get the API response that we keep in our Live Data data type from here and synchronize it to the static object horoscope.

```
modelView.response.observe(LocalContext.current as LifecycleOwner) { it: ApiResponse<Horoscope>?
    horoscope=it
}
```

10) Since the data from the API will come late, we want it to send to the design file only when there is data.

```
composable(route="SgnBa"){ it: NavBackStackEntry
    var character=HoroscopeCharacteristics( RulingPlanet: "Nept", E
    SgnBa( sign: "pisces",character)
}
```

```
Text(
    text = "${horoscope.sign}",
    fontSize = 40.sp,
    modifier = Modifier.fillMaxWidth(),
    textAlign = TextAlign.Center,
    fontFamily = FontFamily.Serif
)
public companion object of Font
androidx.compose.ui.text.font.f
```

Whole page

```
@Composable
fun SgnBa(sign:String,characteristics: HoroscopeCharacteristics,modelView: Modelview = viewModel()) {
    modelView.getHoroscopeFromAPI(sign)

    var horoscope :ApiResponse by remember {
        mutableStateOf(ApiResponse( id: 0, date: "", horoscope: "", icon: "", sign: ""))
    }
    modelView.response.observe(LocalContext.current as LifecycleOwner) { it: ApiResponse!
        horoscope=it
    }

    LazyColumn( horizontalAlignment = Alignment.CenterHorizontally,
        verticalArrangement = Arrangement.Top,
        modifier = Modifier
            .fillMaxWidth()
            .background(Purple80), contentPadding = PaddingValues(16.dp) ) { this: LazyListScope
        item{ this: LazyItemScope
            Spacer(modifier = Modifier.height(39.dp))
            Box(
                modifier = Modifier
                    .background(PurpleGrey40)
                    .border(3.dp, Color.White)
                    .padding(20.dp)
                    .height(50.dp)
                    .width(330.dp)
                    .clip(RoundedCornerShape(10.dp))
            ) { this: BoxScope
                Text(
                    text = "${horoscope.sign}",
                    fontSize = 40.sp,
                    modifier = Modifier.fillMaxWidth(),
                    textAlign = TextAlign.Center,
                    fontFamily = FontFamily.Serif
                )
            }
            Spacer(modifier = Modifier.height(10.dp))
        }
    }
}
```



```

Text(
  text = "${horoscope.sign} General Characteristics", fontSize = 30.sp,
  modifier = Modifier.fillMaxWidth(),
  textAlign = TextAlign.Left,
  fontFamily = FontFamily.Serif
)

Box(
  modifier = Modifier
    .border(3.dp, Color.White)
    .background(PurpleGrey40)
    .padding(20.dp)
    .height(500.dp)
    .width(400.dp)
    .clip(RoundedCornerShape(10.dp))
) { this: BoxScope
  Text(
    text = horoscope.horoscope,
    color = Color.White
  )
}

Spacer(modifier = Modifier.height(10.dp))
Text(
  text = "Horoscope Characteristics", fontSize = 30.sp,
  modifier = Modifier.fillMaxWidth(),
  textAlign = TextAlign.Left,
  fontFamily = FontFamily.Serif
)

```

```

Box(
  modifier = Modifier
    .border(3.dp, Color.White)
    .background(PurpleGrey40)
    .padding(20.dp)
    .height(500.dp)
    .width(400.dp)
    .clip(RoundedCornerShape(10.dp))
) { this: BoxScope
  Text(
    text = "* Ruling Planet: ${characteristics.RulingPlanet}\n" +
      "* Element: ${characteristics.Element}\n" +
      "* Attribute: ${characteristics.Attribute}\n" +
      "* Lucky Numbers: ${characteristics.LuckyNumber}\n" +
      "* Day: ${characteristics.Day}\n" +
      "* Lucky Stone: ${characteristics.LuckyStone}\n" +
      "* Colour: ${characteristics.Color}\n" +
      "* Tarot card: ${characteristics.TarotCard}\n" +
      "* Animal: ${characteristics.Animal} \n" +
      "* Plant: ${characteristics.Plant}\n" +
      "* Precious Stone: ${characteristics.PreciousStone} \n" +
      "* Precious Mineral: ${characteristics.PreciousMineral}",
    color = Color.White
  )
}
Spacer(modifier = Modifier.height(10.dp))

```

(ECENUR SOYBELLİ)

Authentication and Data Retention Using Firebase:

Firebase is a mobile and web application development platform developed by Google. The services offered by Firebase include core components such as authentication and data storage (Realtime Database or Firestore). These components enable our application to manage user data in a secure and efficient way.

1. Firebase Authentication

Why Use Firebase Authentication?

- User Security: Firebase Authentication allows users to log into the application securely. It supports standard authentication methods such as email and password and stores this information securely.

- Easy Integration: Firebase offers an authentication mechanism that can be easily integrated into mobile applications. This allows developers to quickly add authentication without having to implement complex security protocols.
- Multiple Login Options: Firebase offers login options with various providers such as Google, Facebook, Twitter, etc., so users can log in with different methods.

What Does It Do?

User Registration and Login: Users can register and log in to our application. This helps build a user base for our application.

User Management: Firebase Authentication simplifies the management of user accounts. Users can reset their passwords, verify their emails, and manage their accounts.

Security: Firebase securely stores user information and prevents unauthorized access. Additionally, with Firebase's security rules, we can define data access policies.

2.Firebase Realtime Database or Firestore

Why Use Firebase Database?

- Real-Time Data Synchronization: Firebase Realtime Database and Firestore ensure that data is synchronized in real-time. This allows users to see instant data updates.
- Easy Data Management: Firebase simplifies reading and writing data. We can optimize data storage and access by defining the database structure flexibly.
- Security and Access Control: Firebase offers advanced security rules to control access to the data stored in the database. This ensures that users can only access the data they are authorized to see.

What Does It Do?

- User Data Storage: User information, preferences, and other important data are securely stored. This data is available when the application is restarted or when the user logs in again.
- Real-Time Updates: Changes made in our application are instantly synchronized with all users. This is ideal for instant notifications and updates.

Conclusion

Using Firebase for authentication and data storage enhances the security of our application, improves the user experience, and allows you to manage your data effectively. This makes our application more reliable and functional for both our users and us.

General Information and Comments About Zodiac Signs

Our app provides comprehensive information about the 12 zodiac signs (Aries, Taurus, Gemini, Cancer, Leo, Virgo, Libra, Scorpio, Sagittarius, Capricorn, Aquarius, Pisces). In this section, you will find details about each sign's characteristic traits, strengths and weaknesses, and general tendencies.

- Daily Horoscopes: Users can read fresh daily horoscopes related to their zodiac sign, gaining insights into the energies and possible developments of the day. These horoscopes can cover various areas such as love, career, health, and finance.

API Integration

Our app features API integration that automatically pulls horoscope readings from websites and presents them to users. This ensures that the horoscopes are always up-to-date, providing users with the latest information.

Zodiac Test

Our app includes an interactive Zodiac Test that allows users to gain deeper insights into their zodiac sign. Upon completing this test, users receive a detailed analysis of their personality traits, interests, and lifestyle. Based on the test results, users receive specific feedback in the following areas:

- Personal Advice: Personalized advice based on the user's zodiac sign and test results, helping them make more informed and successful decisions in various areas of life.
- Customized Horoscopes: Personalized horoscopes created by astrologers specifically for the user based on their test results, offering a more personalized experience.
- Goal Setting and Motivation: Strategies to help users set their goals and stay motivated on the path to achieving them.
- Compatibility Analysis: Information about the user's compatibility with other zodiac signs based on their test results, aiding in more informed decisions in both personal and professional relationships.

User Experience

Our app is designed with a user-friendly interface, allowing users to easily access daily, weekly, and monthly horoscopes and quickly complete the Zodiac Test. Thanks to API integration, all data is continuously updated, ensuring that users always have access to the latest information.

These features provide users with a rich experience, helping them gain in-depth knowledge about zodiac signs and guiding them to make more informed decisions in their lives.

(MERVE TUĞÇE GEZER)

Home

The Home section serves as the main interface for users after logging in. It features a welcoming message and provides access to various functionalities of the app. Users can

navigate to different sections such as Profile, About, and Blog from the Home screen. This section aims to offer a seamless and intuitive user experience, presenting key information and updates immediately.

About

The About section provides detailed information about the application, including its purpose, features, and the team behind it. This section helps users understand the app's mission and background. It includes details on how the app can be used effectively, as well as any relevant contact information or links to support resources.

Blog

The Blog section contains a collection of articles, updates, and news related to the app and its community. This section is regularly updated to keep users informed with content. We have a text explaining the history of astrology titled "What is Astrology" on our blog page.