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Vellore Institute of Technology

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Object Oriented Analysis and Design

ITE1007 B1+TB1

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School of Information Technology and Engineering

Review-III

S-Connect

Submitted by

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Abstract:

This platform S-Connect will be an app that that will be secured for Privacy Invasion stuff, this platform will be solving the major issues are Identification theft & Privacy ,Unsecured Public Data ,Breached, Identification and Verification Complexities, Local Business Verification and ownership, Insecure Open Internet. We will be designing the different diagrams like use case also the logical view diagrams like class, sequence, state chart and activity and more diagrams. With the solution to the major problems in the logical manner feature full. This platform will be working in different backend of the protocols.

Name of Tool:

Software Ideas Modeler

Problem Definition:

In this world tech we are always concerned of our data and contacts, we are unknowingly victim of different data thefts. Privacy refers to the protection of personal information, including one's personal identity, data, and relationships, from unauthorized access or use. Privacy is a fundamental human right and is protected by various means such as data protection laws and regulations, privacy policies and terms of service, encryption and security measures, transparency and control and privacy by design and default. Governments around the world have implemented laws and regulations like the European Union's General Data Protection Regulation (GDPR) and the California Consumer Privacy Act (CCPA) in the United States to protect personal data and to ensure that personal information is collected, used, and stored appropriately. It's important for individuals to be aware of these policies and to take steps to protect their personal information in order to maintain their autonomy and dignity. Identity theft is a crime where someone obtains and uses another person's personal information, such as their name, Social Security number, credit card number, or other identifying information, without their knowledge or permission. This information is then used to commit fraud or other crimes, such as opening bank accounts, credit card accounts, or loans in the victim's name, or making unauthorized purchases or withdrawals. Identity theft can happen to anyone and can have serious consequences. The victim may not be aware that their identity has been stolen until they receive bills for accounts or charges they didn't open, or they may notice unauthorized withdrawals from their bank account. If you suspect you may be a victim of identity theft, you should take action as soon as possible to prevent further damage. Identty verification and identification is a complex process that involves multiple factors. One of the main challenges is finding the right balance between security and convenience for users. There are a variety of identification methods available, each with its own strengths and

weaknesses, making it a challenge to choose the right one. Inclusivity is also an important aspect of identity verification, and the process should be accessible to all users regardless of their age, disability or access to technology. Additionally, protecting personal data and complying with privacy and data protection laws is a major complexity. Technical and security challenges associated with online and remote interactions must also be considered. Compliance with legal and regulatory requirements is also crucial. It's also important to keep in mind the constantly evolving threat landscape of fraud and identity theft and make sure security measures are up-to-date. For digital point this platform will be solving some major issues they are Identification theft & Privacy ,Unsecured Public Data ,Breached, Identification and Verification Complexities, Local Business Verification and ownership, Insecure Open Internet, Hacking and Personal ,Documentation , Irregulation.

History of tool:

Software Ideas Modeler

Software Ideas Modeler is the work of Slovak software developer Dušan Rodina.

Merits:

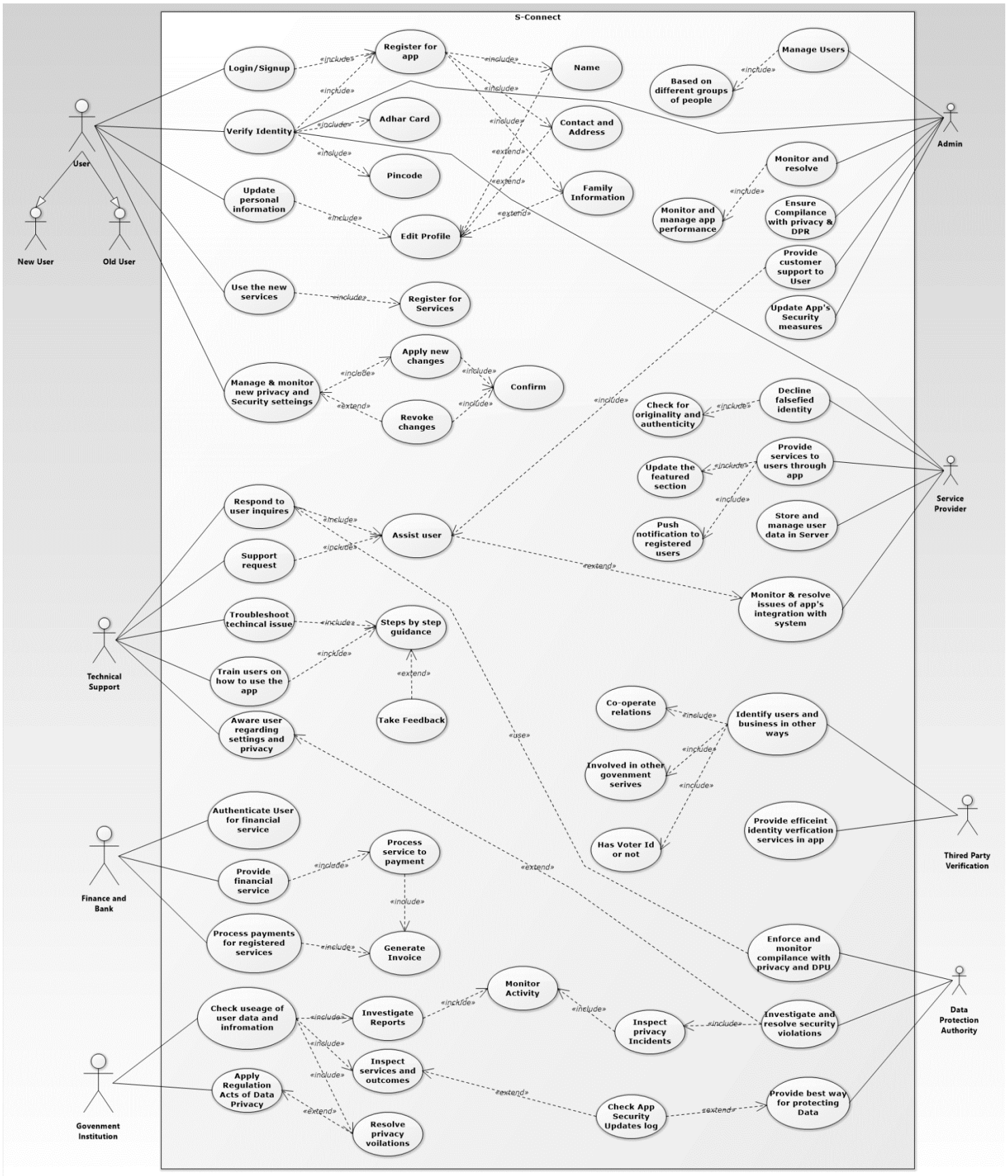
- Intuitive and quick diagram editor
- 80+ diagram types
- Custom diagram definition
- Diagram generation from the database, source code, description
- Source code generation from diagrams
- Documentation generation
- Export to bitmap and vector image formats
- Change tracking
- Easy model navigation
- Style sets, conditional styling
- Dark mode, menu or ribbon interface by preference
- Process modeling
- Wireframes for desktop, mobile apps, and websites

Demerits:

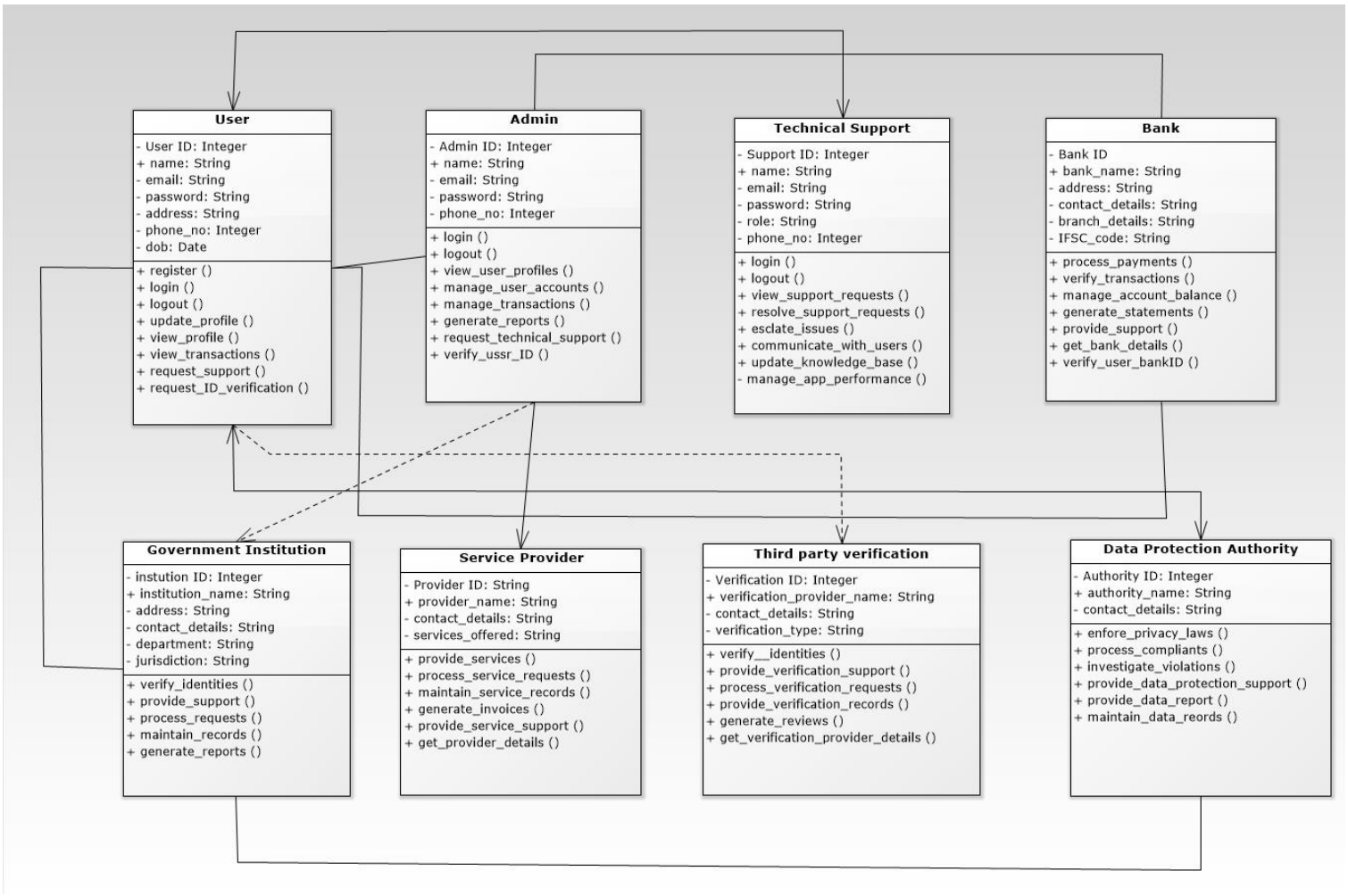
-Bugs are present that crashes the software
-Space for drawing is small.
-No so friendly UI.
-Absence of some component of diagrams

The UML Diagrams for S-Connect are below:

Use Case Diagram:



Class Diagram:



Sequence Diagrams:

Diagram 1:

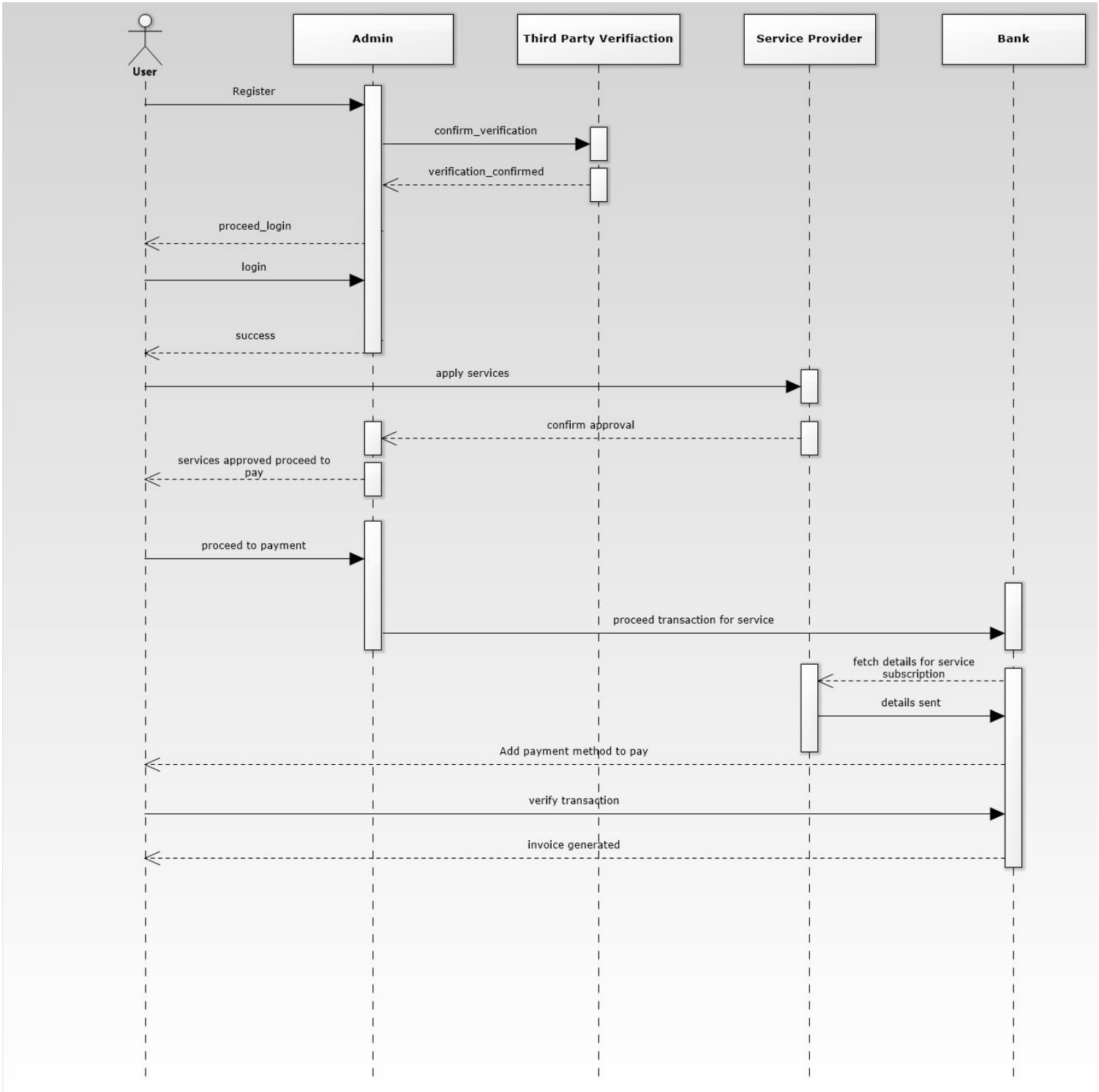


Diagram 2:

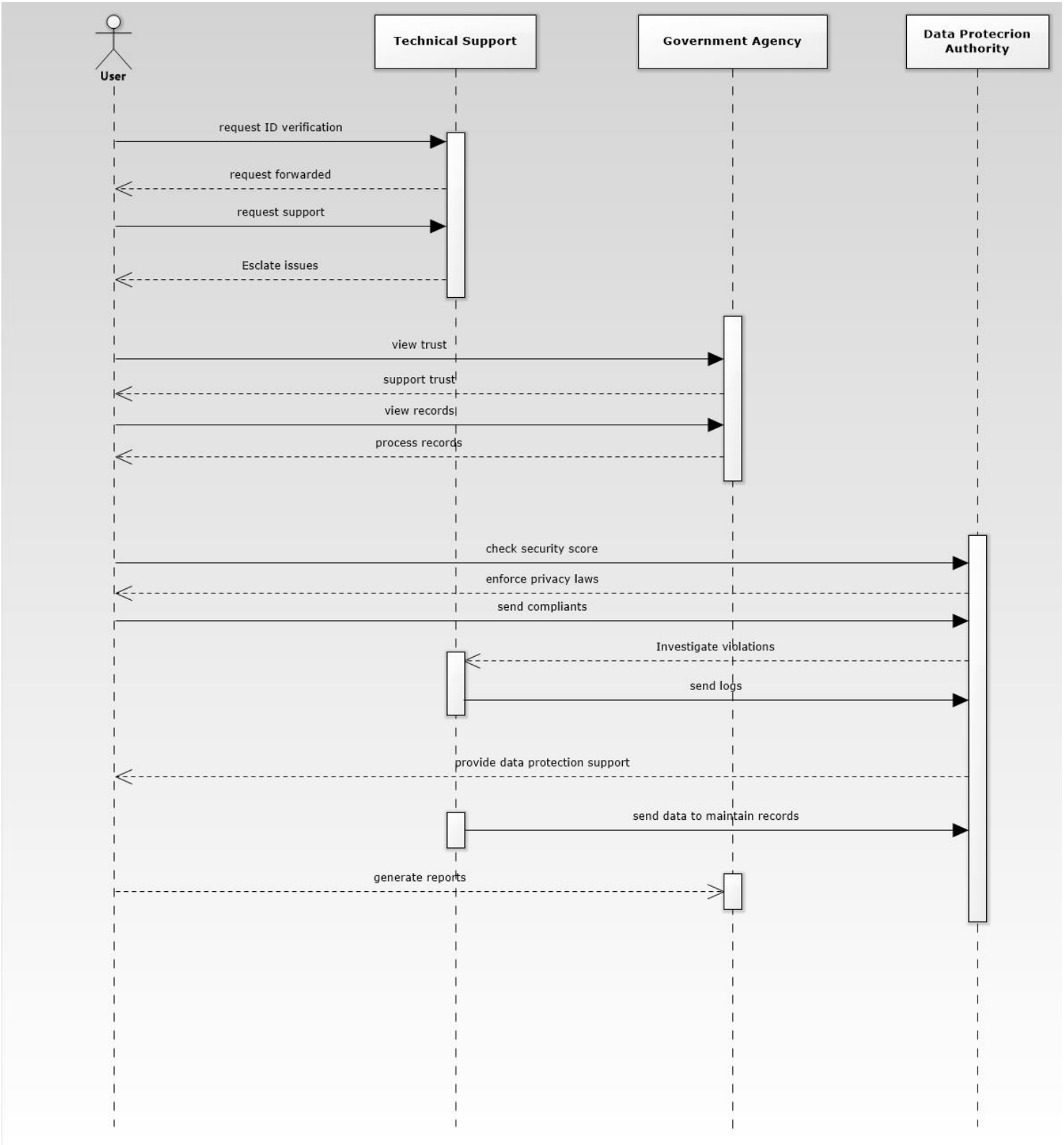
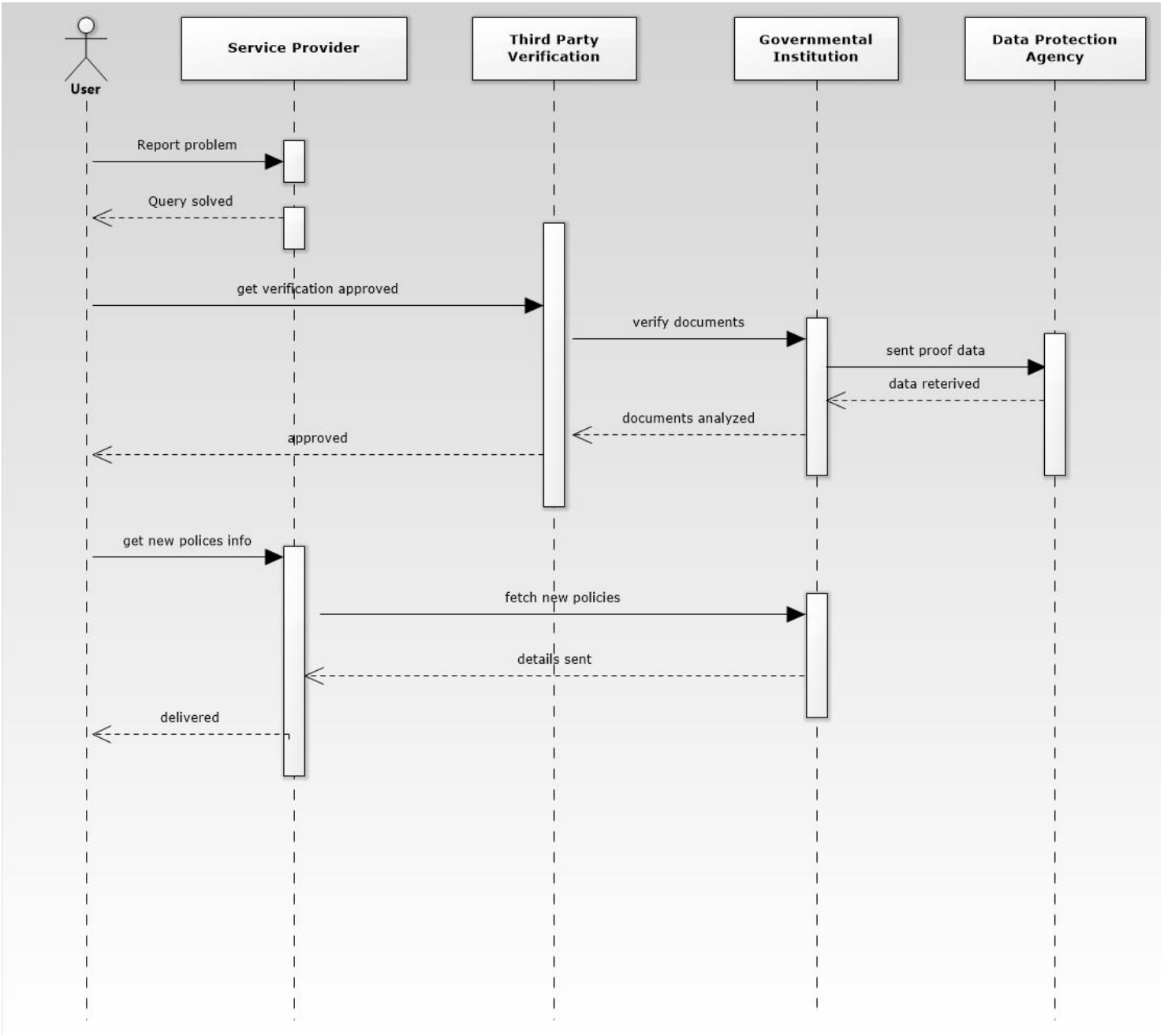
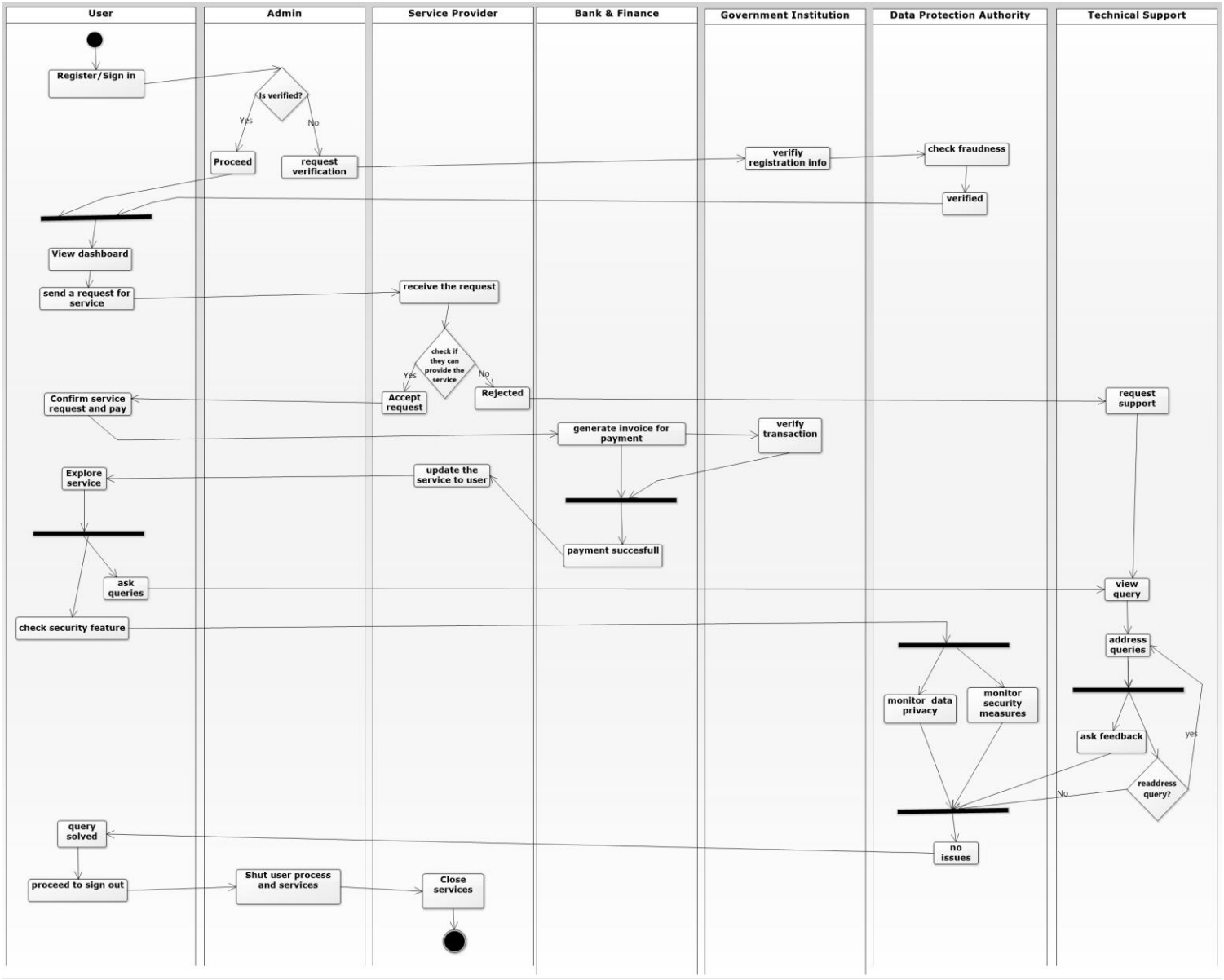

User
Technical Support
Government Agency
Data Protecrion Authority
request ID verification
request forwarded
request support
Esclate issues
view trust
support trust
view records
process records
check security score
enforce privacy laws
send compliants
Investigate viblations
send logs
provide data protection support
send data to maintain records
generate reports

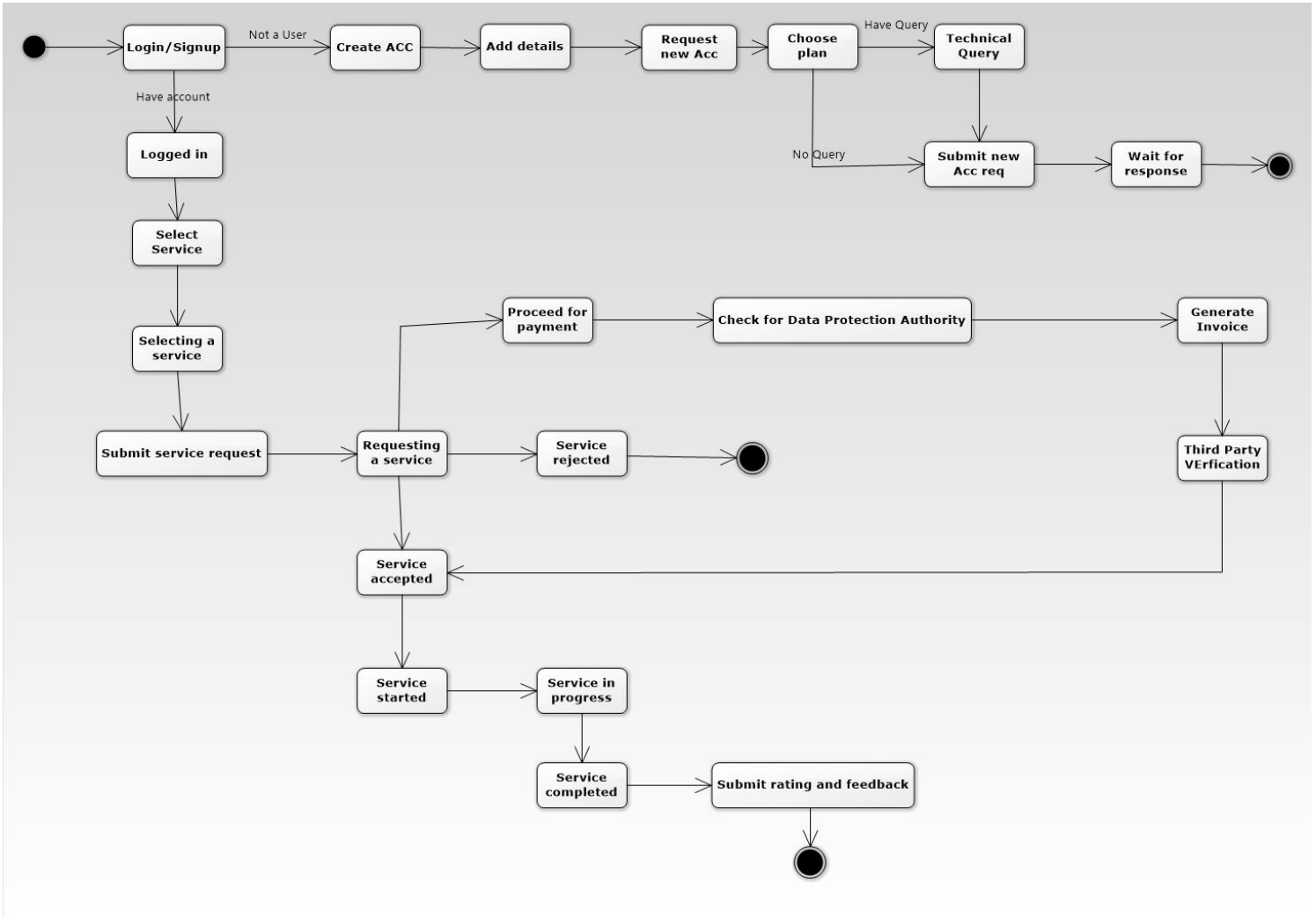
Diagram 3:


User
Service Provider
Third Party Verification
Governmental Institution
Data Protection Agency
Report problem
Query solved
get verification approved
verify documents
sent proof data
data reterived
documents analyzed
approved
get new polices info
fetch new policies
details sent
delivered

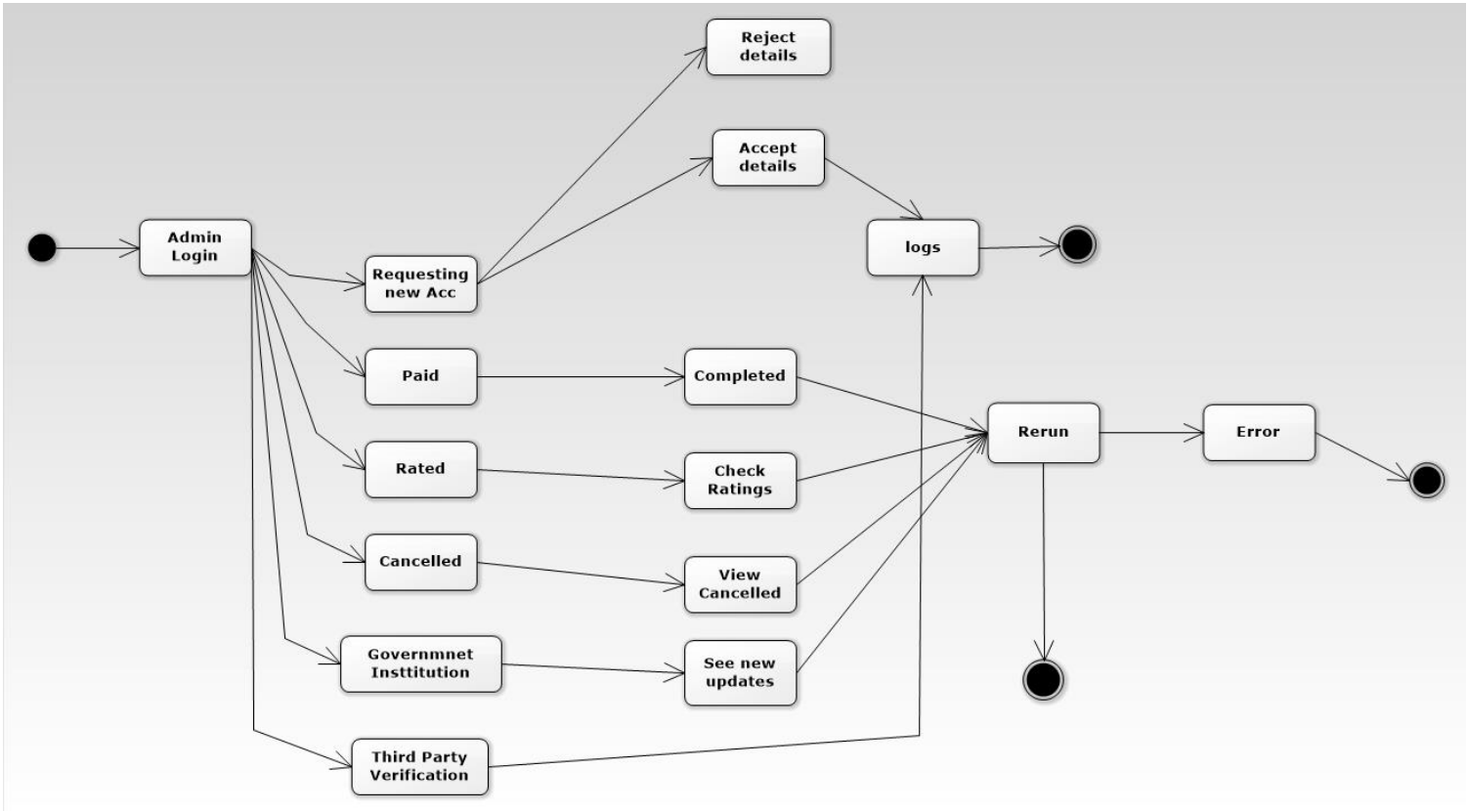
Activity Diagram:



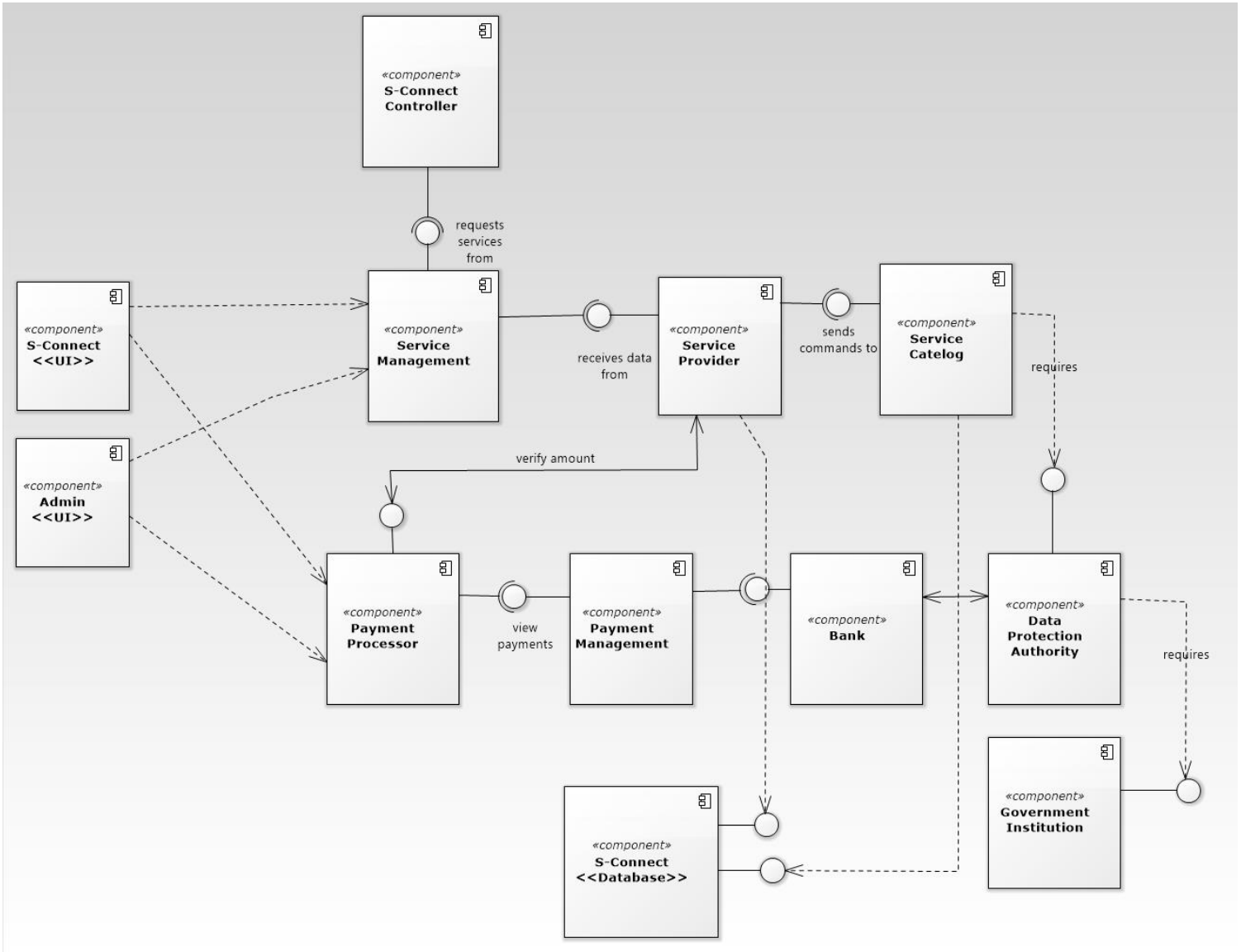
State Transition Diagram from User Side:



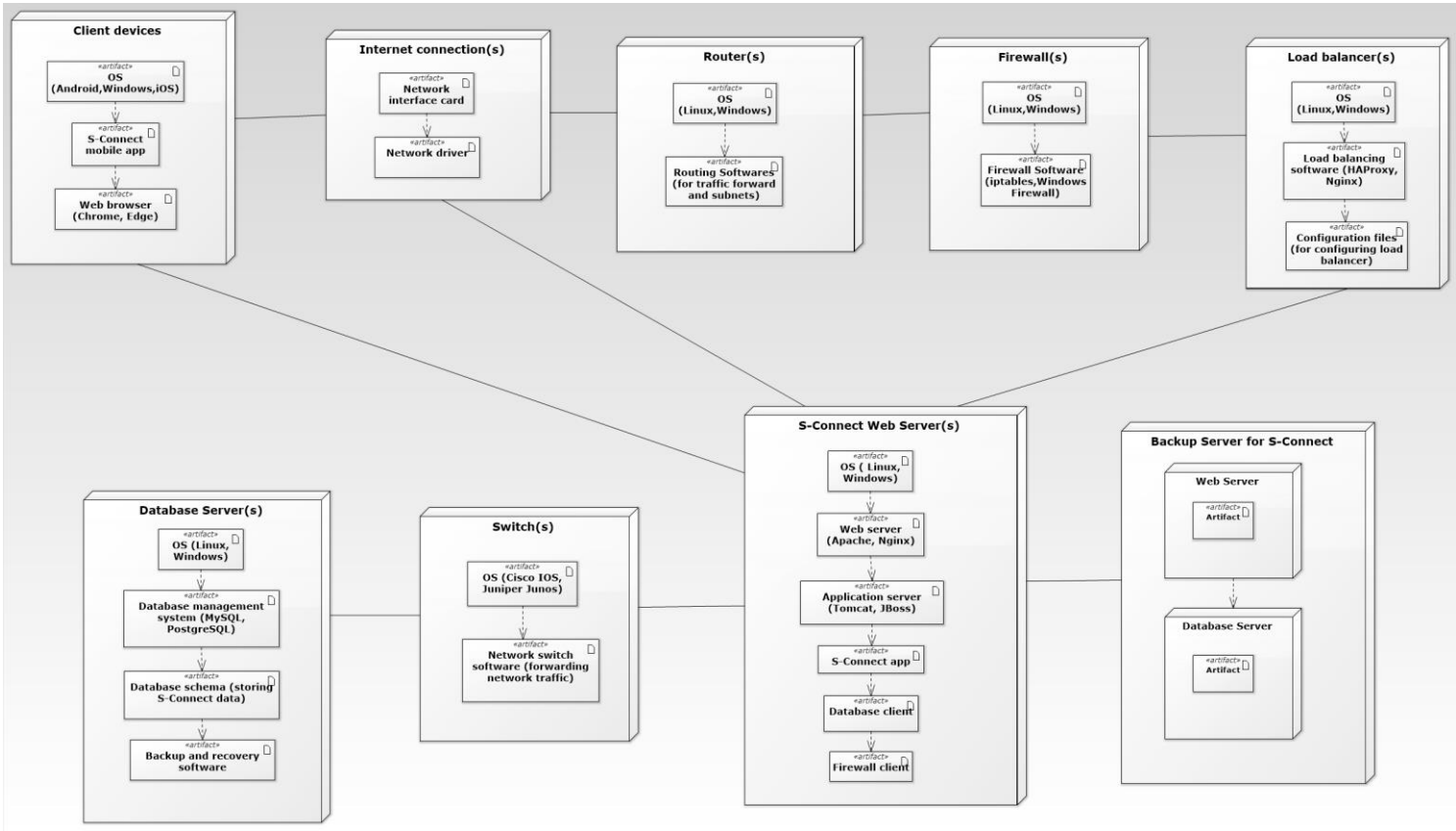
State transition form admin side:



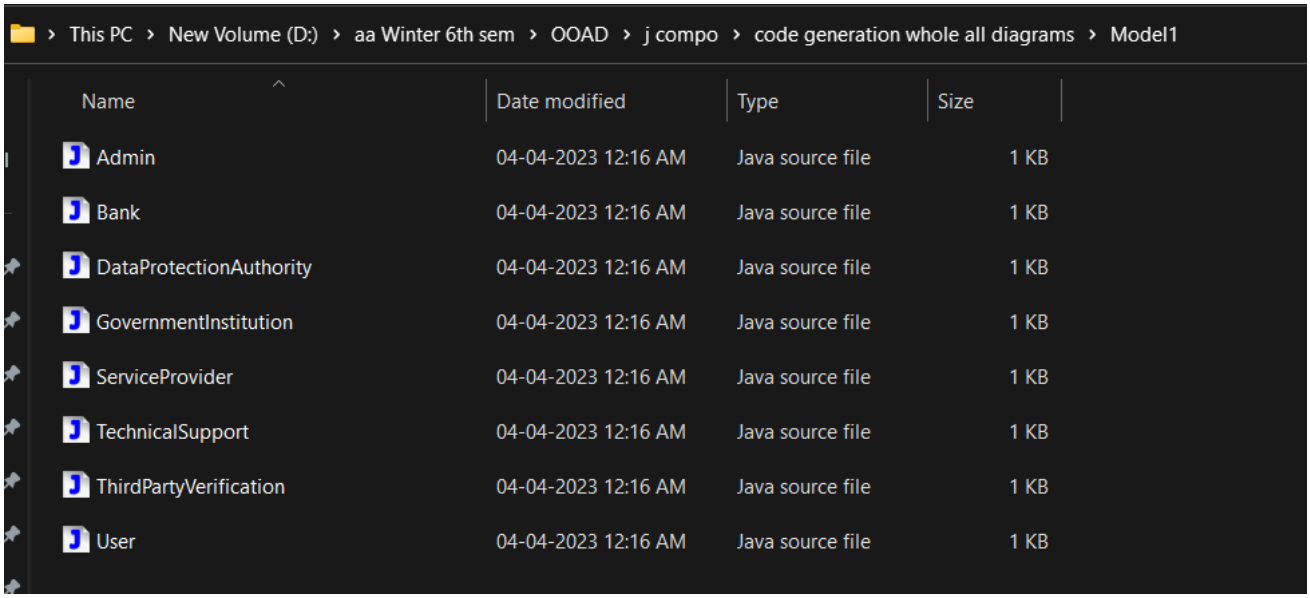
Component Diagram:



Deployment Diagram:



After Code Generation files generated are:



Some Sample codes:

For admin.java:

```
package Model1;

 class Admin
{
    private int AdminID;
    public String name;
    private String email;
    private String password;
    private int phone_no;


    public void login()
    {

    }

    public void logout()
    {

    }

    public void view_user_profiles()
    {

    }

    public void manage_user_accounts()
    {

    }

    public void manage_transactions()
    {

    }

    public void generate_reports()
    {

    }

    public void request_technical_support()
    {

    }

    public void verify_ussr_ID()
    {

    }
}
```

For Bank.java:

```
package Model1;

 class Bank
{
    private object BankID;
    public String bank_name;
    private String address;
    private String contact_details;
    private String branch_details;
    private String IFSC_code;


    public void process_payments()
    {

    }

    public void verify_transactions()
    {

    }

    public void manage_account_balance()
    {

    }

    public void generate_statements()
    {

    }

    public void provide_support()
    {

    }

    public void get_bank_details()
    {

    }

    public void verify_user_bankID()
    {

    }

    public void NewOperation8()
    {

    }
}
```

Conclusion:
Therefore, all the diagrams i.e. Use Case View, Logical View(Class, Sequence, State transition, activity), Component view and Deployment view along with code generation was done for S-Connect app.