

Entity: User

- Attributes:
- ID
- firstName
- lastName
- Email
- Username
- Password
- CreateddateTime
- updatedDateTime

Entity: Property

Attributes:

- ID
- propertyAdress
- location
- PropertyValue
- propertyType
- SharePrice
- availableShares
- createdDateTime
- propertyDescriptions

Entity: Wallet

Attributes

- WalletId
- userId
- Balance
- createdDateTime
- updateDateTime

Entity: Portfolio

Attributes:

- Id
- Userid
- totalInvestmentAmount
- TotalReturns
- CreatedDateTim
- updatedDateTime

Entity: Transaction or Receipt

Attributes:

- Id
- userId
- propertyId
- TransactionType
- Amount
- dateTime
- PaymentMethod
- transactionStatus

Entity: Investment

Attributes:

- investmentId: Unique identifier for the investment.
- userId: Reference to the User entity.
- propertyId: Reference to the Property entity.
- numberOfSharesPurchased
- investmentAmount
- investmentDateTime
- investmentStatus: (e.g., active, sold.)
- dividendEarned: Total dividends earned from this investment.

Example workflow

Step 1: User Registration

- A new User registers, and a Wallet and Portfolio are automatically created for them.

Step 2: Adding Funds

- The user deposits money into their Wallet.
- A Transaction of type 'Deposit' is recorded.
- The wallet's Balance is updated.

Step 3: Making an Investment

- The user selects a Property to invest in.
- An Investment is created, recording the number of shares purchased and investment amount.
- A Transaction of type 'Investment Purchase' is recorded.
- The Property's availableShares decreases.
- The user's Wallet balance decreases by the investment amount.
- The Investment is added to the user's Portfolio.

Step 4: Receiving Dividends

- When the property generates income, dividends are calculated.
- dividendEarned on Investment is updated.
- A Transaction of type 'Dividend Payout' is recorded.
- The user's Wallet balance increases by the dividend amount.
- The user's TotalReturns in Portfolio is updated.

Step 5: Withdrawing Funds

- The user decides to withdraw money from their Wallet.
- A Transaction of type 'Withdrawal' is recorded.
- The wallet's Balance decreases accordingly.

Step 6: Selling shares

- The user decides to sell shares from their investment in a property.
- The specified amount of shares is subtracted from the total shares owned in the Investment.
- The worth of the sold shares is calculated and added to the user's Wallet balance.
- A Transaction of type 'Investment Sale' is recorded.
- The available shares for the Property are increased by the number of shares sold.
- The user's Portfolio is automatically updated to reflect the sale.