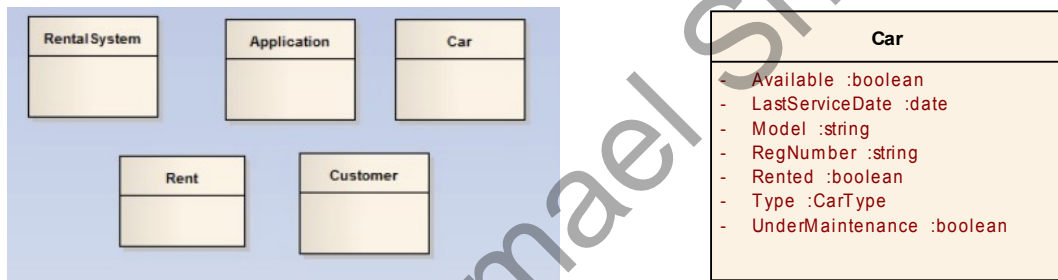




## Step 2 – Create Your Business Domain Model

Our Business Domain Model will define key terms such as rent, car and customer. These key terms will be represented using a Class diagram, with each term becoming a separate Class. For each term, we need to include a number of attributes. For example, a car may have attributes describing its model, type registration and availability.

1. Double-click the Business Domain Model.
2. Each term will become a separate Class with attributes that describe that Class.
3. Add a new Class diagram to the Business Domain Model called “RentalSystem” from the Toolbox.
4. As shown below, add classes for the terms Application, Car, Rent and Customer.



5. The process of defining terminology may require detailed discussion and collaboration between key stakeholders and will often result in the production of better systems. Our Car Rental Business Domain Model has been kept simple for illustrative purposes.
6. For each term/class, define appropriate attributes.
7. The term/class Car in the example shown above defines:
  - Available, Rented, LastServiceDate, Model, RegNumber, Type and UnderMaintenance.
8. Create associations between the classes as shown in the Completed Business Domain Model on the following page.
9. You have now created a Business Domain Model which will form the basis of your Business Rule Model.

More details on [creating a Business Domain Model](#) are available from the Enterprise Architect User Guide.

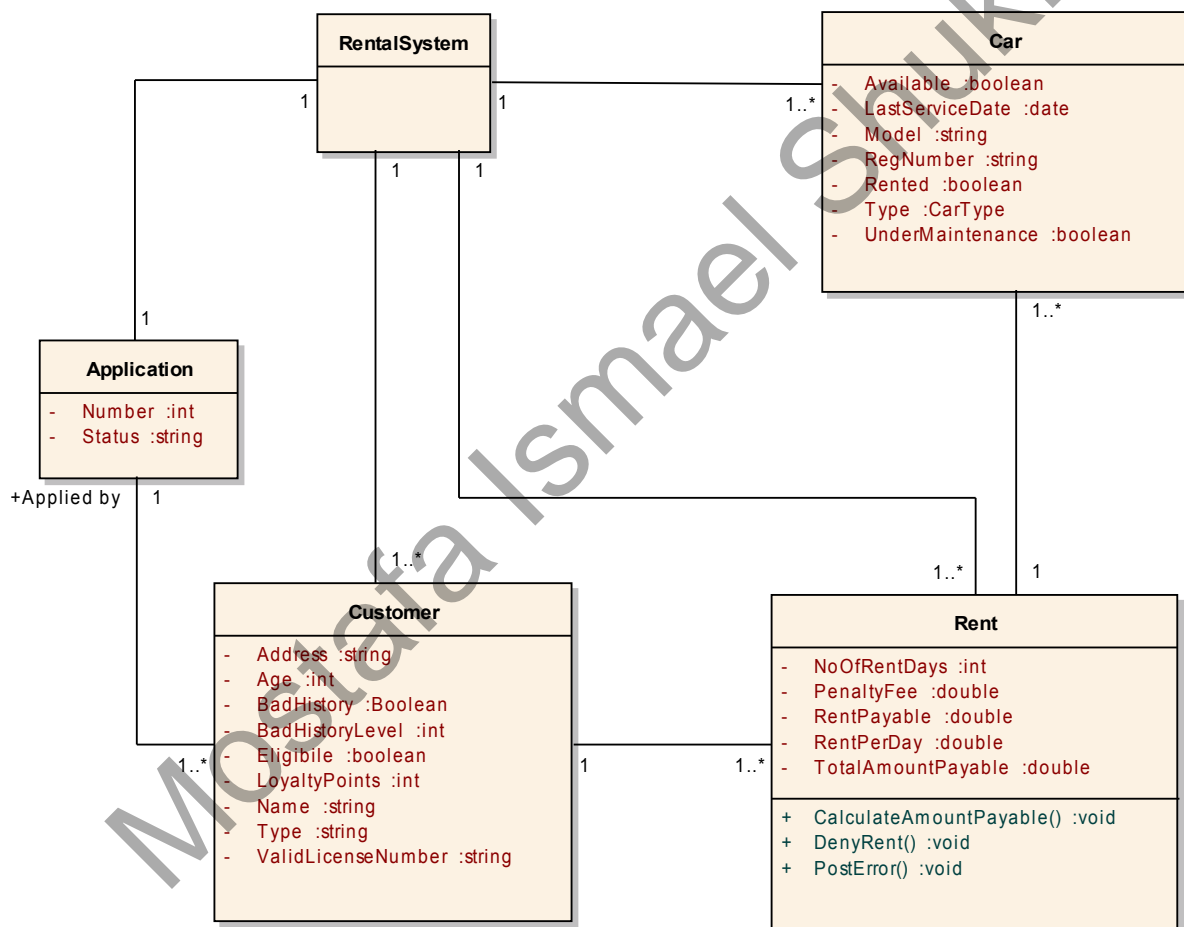
Note: The Business Domain Model can be refined later to use specific attribute types that are appropriate to the target language. This could be automated using [model transformation](#).



## The Completed Business Domain Model

The Business Domain Model provides the business vocabulary - terms and facts - on which Business Rules can be modeled. In Enterprise Architect a Business Domain Model is created as a conceptual class diagram where each business object is represented by a class.

The following diagram shows an example Business Domain Model, for a Car Rental system.



To enable a class to process the rules, right click on the appropriate class and add "Rule Flow Activity" as a behavior to the class. For this example, ProcessApplication Rule Flow Activity is added to the Rental System class.



## Section Review



### What have we learned?

We have created a **Business Domain Model** within Enterprise Architect based on the UML Class diagram. A Business Domain Model describes your business vocabulary by defining all your key terms and concepts. We have created relationships between each entity and developed a set of attributes for each class. The attributes and classes you have defined will form the basis of your executable code. Our car rental system has defined key terms that include Customer, Car, Application, Rent and the Rental System itself.

### Where to next?

You need to consider the sequence in which **Rule Tasks** are executed. For example, there is no point calculating the amount of rent payable, if the customer is not eligible to rent a car. The correct sequence of events must therefore be defined in order to properly execute Business Rules. An excellent way to model the sequence of events is to use an Activity Flow diagram.

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