

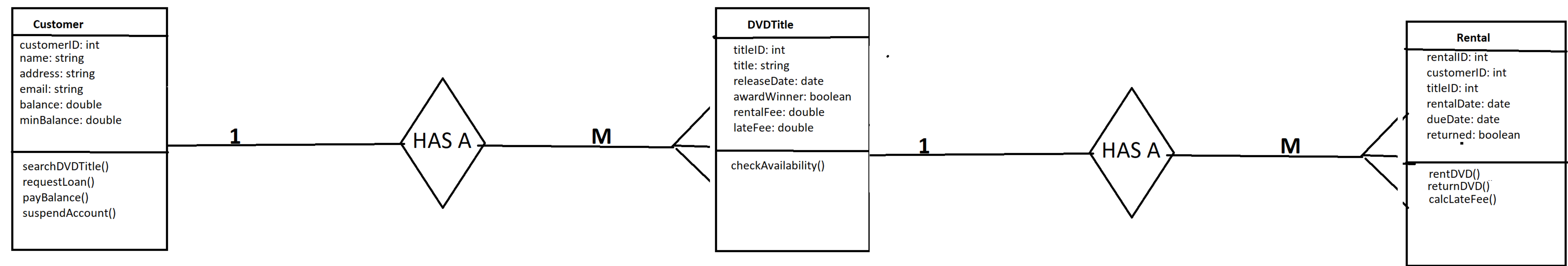
Solution:2

The UML class diagram consists of three classes: Customer, DVDTITLE, and Rental.

-- The Customer class contains information about customers, such as their customer ID, name, address, email, balance, and minimum balance. It also has methods for searching DVD titles, requesting loans, paying balances, and suspending accounts.

-- The DVDTITLE class contains information about DVD titles, such as the title ID, title, release date, whether it is an award winner, rental fee, and late fee. It has a method for checking availability.

-- The Rental class represents a rental transaction and contains information about the rental ID, customer ID, title ID, rental date, due date, whether the DVD has been returned, and the calculated late fee. It has methods for renting DVDs, returning DVDs, and calculating late fees.



In the UML class diagram provided, the association between the three classes is as follows:

-- The Customer class has a one-to-many association with the Rental class. This means that a single customer can rent multiple DVDs, but each rental is associated with only one customer.

-- The DVDTITLE class also has a one-to-many association with the Rental class. This means that a single DVD title can be rented multiple times, but each rental is associated with only one DVD title.

-- There is no direct association between the Customer and DVDTITLE classes. However, both classes are indirectly associated through the Rental class, as a rental transaction involves both a customer and a DVD title.