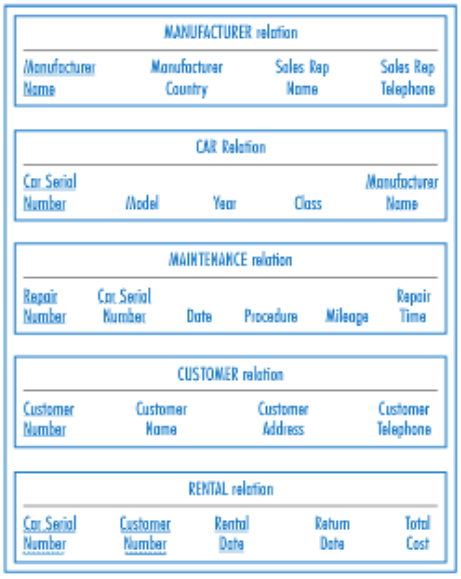

FIGURE 5.18
Lucky Rent-A-Car relational database

EXAMPLE: LUCKY RENT-A-CAR

Figure 5.18 shows the relational database for the Lucky Rent-A-Car example described earlier. There is a one-to-many relationship from manufacturers to cars and another one-to-many relationship from cars to maintenance events. The former requires the manufacturer primary key, Manufactuer Name, to be placed in the CAR relation as a foreign key. The latter requires the car primary key, Car Serial Number, to be placed in the MAINTENANCE relation as a foreign key. The many-to-many relationship among cars and customers requires the creation of a new relation, the RENTAL relation. Each record of the RENTAL relation records the rental of a particular car by a particular customer. Note that the combination of the Car Serial Number and Customer Number attributes is not sufficient as the primary key of the RENTAL relation. A given customer might have rented a given car more than once. Adding Rental Date to the primary key achieves the needed uniqueness.