

book table

```
CREATE TABLE book(  
  ISBN INTEGER,  
  title VARCHAR(100),  
  authors VARCHAR(100),  
  publisher VARCHAR(100),  
  year_pub INTEGER,  
  copies INTEGER,  
  price REAL,  
  format VARCHAR(9) CHECK(format="hardcopy" OR format="softcopy"),  
  subject VARCHAR(50),  
  PRIMARY KEY(ISBN)  
)
```

customer table

```
CREATE TABLE customer(  
  name VARCHAR(100),  
  user VARCHAR(20),  
  password VARCHAR(20),  
  card_no VARCHAR(16),  
  address VARCHAR(100),  
  phone_no INTEGER,  
  PRIMARY KEY(user)  
)
```

keyword table

```
CREATE TABLE keyword(  
  tag VARCHAR(100),  
  PRIMARY KEY(tag)  
)
```

invoice table

```
CREATE TABLE invoice(  
  number INTEGER,  
  date DATE,  
  status VARCHAR(50),  
  PRIMARY KEY(number)  
)
```

tag relation

```
CREATE TABLE tag(  
  ISBN INTEGER,  
  tag VARCHAR(100),  
  PRIMARY KEY (ISBN, tag)  
  FOREIGN KEY (ISBN) REFERENCES book  
  FOREIGN KEY (tag) REFERENCES keyword  
)
```

order relation

```
CREATE TABLE order(  
  number INTEGER,  
  user VARCHAR(20),  
  PRIMARY KEY(user, number),  
  FOREIGN KEY (user) REFERENCES customer,  
  FOREIGN KEY (number) REFERENCES invoice  
)
```

content relation

```
CREATE TABLE content(  
  number INTEGER,  
  ISBN INTEGER,  
  copies INTEGER,  
  PRIMARY KEY (number, ISBN),  
  FOREIGN KEY (number) REFERENCES invoice,  
  FOREIGN KEY (ISBN) REFERENCES book  
)
```

feedback relation

```
CREATE TABLE feedback(  
  ISBN INTEGER,  
  user VARCHAR(20),  
  comment TEXT,  
  date DATE,  
  score INTEGER,  
  PRIMARY KEY (ISBN, user),  
  FOREIGN KEY (ISBN) REFERENCES book,  
  FOREIGN KEY (user) REFERENCES customer  
)
```

rating relation

```
CREATE TABLE rating(  
  ISBN INTEGER,  
  user_feedback VARCHAR(20),  
  user_rate VARCHAR(20),  
  rate INTEGER,  
  PRIMARY KEY((ISBN, user_feedback), user_rate),  
  FOREIGN KEY (ISBN) REFERENCES book,  
  FOREIGN KEY (user_feedback) REFERENCES customer,  
  FOREIGN KEY (user_rate) REFERENCES customer  
)
```