

Columnar Exercise using Sybase Sap IQ By Priyanka Labh

1. Install SAP IQ
2. Create the tables as shown in the previous relational model for an OLAP information system. SAP IQ uses SQL, so you can use the same SQL Code to implement and query your database.

```
CREATE TABLE REGION(region_id INTEGER,region_desc VARCHAR(100));
```

```
CREATE TABLE SUBREGION(subregion_id INTEGER,subregion_desc VARCHAR(100),region_id INTEGER);
```

```
CREATE TABLE WAREHOUSE(code INTEGER,subregion_id INTEGER,region_id INTEGER);
```

```
CREATE TABLE BOOKS(isbn INTEGER,title VARCHAR(45),price NUMERIC(15,2));
```

```
CREATE TABLE YEAR_T(year_id TINYINT,year_f TINYINT );
```

```
CREATE TABLE MONTH_T(month_id TINYINT,month_f TINYINT,year_id );
```

```
CREATE TABLE DAY_T(Num_day TINYINT,day_id TINYINT,month_id TINYINT );
```

```
CREATE TABLE FACTS_TICKET(Sell_by_product TINYINT,Ticket_number INTEGER,Books_isbn INTEGER,Warehouse_code INTEGER,Day_id TINYINT );
```

3. Populate the database, just to execute the following query.

```
INSERT INTO region(region_id, region_name) VALUES (1,'america');
```

```
INSERT INTO region(region_id, region_name) VALUES (2,'europa');
```

```
INSERT INTO region(region_id, region_name) VALUES (3,'asia');
```

```
INSERT INTO region(region_id, region_name) VALUES (4,'africa');
```

```
INSERT INTO region(region_id, region_name) VALUES (5,'oceania');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (1,1,'north america');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (2,1,'central america');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (3,1,'caribe');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (4,1,'south america');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (5,2,'north of europe');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (6,2,'south of europe');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (7,2,'western europe');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (8,2,'eastern europe');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (9,3,'northern of asia');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (10,3,'southern asia');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (11,3,'eastern asia');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (12,3,'central asia');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (13,3,'southeast asia');
```

```
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (14,4,'north africa');
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (15,4,'southern africa');
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (16,4,'west africa');
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (17,4,'east africa');
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (18,4,'central africa');
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (19,5,'australia');
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (20,5,'melanesia');
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (21,5,'micronesia');
INSERT INTO subregion(subregion_id, region_id, subregion_name) VALUES (22,5,'polynesia');
```

```
INSERT INTO year (year_id, year) VALUES (1,'2017');
```

```
INSERT INTO month (month_id, year_id, month) VALUES(1,1,'january');
INSERT INTO month (month_id, year_id, month) VALUES(2,1,'february');
INSERT INTO month (month_id, year_id, month) VALUES(3,1,'march');
INSERT INTO month (month_id, year_id, month) VALUES(4,1,'april');
INSERT INTO month (month_id, year_id, month) VALUES(5,1,'may');
INSERT INTO month (month_id, year_id, month) VALUES(6,1,'june');
INSERT INTO month (month_id, year_id, month) VALUES(7,1,'july');
INSERT INTO month (month_id, year_id, month) VALUES(8,1,'august');
INSERT INTO month (month_id, year_id, month) VALUES(9,1,'september');
INSERT INTO month (month_id, year_id, month) VALUES(10,1,'october');
INSERT INTO month (month_id, year_id, month) VALUES(11,1,'november');
INSERT INTO month (month_id, year_id, month) VALUES(12,1,'december');
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(1,1,'sunday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(2,1,'monday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(3,1,'tuesday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(4,1,'wednesday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(5,1,'thursday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(6,1,'friday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(7,1,'saturday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(8,1,'sunday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(9,1,'monday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(10,1,'tuesday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(11,1,'wednesday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(12,1,'thursday',12);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(13,1,'friday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(14,1,'saturday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(15,1,'sunday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(16,1,'monday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(17,1,'tuesday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(18,1,'wednesday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(19,1,'thursday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(20,1,'friday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(21,1,'saturday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(22,1,'sunday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(23,1,'monday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(24,1,'tuesday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(25,1,'wednesday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(26,1,'thursday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(27,1,'friday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(28,1,'saturday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(29,1,'sunday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(30,1,'monday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(31,1,'tuesday',31);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(32,2,'wednesday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(33,2,'thursday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(34,2,'friday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(35,2,'saturday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(36,2,'sunday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(37,2,'monday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(38,2,'tuesday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(39,2,'wednesday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(40,2,'thursday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(41,2,'friday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(42,2,'saturday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(43,2,'sunday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(44,2,'monday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(45,2,'tuesday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(46,2,'wednesday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(47,2,'thursday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(48,2,'friday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(49,2,'saturday',18);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(50,2,'sunday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(51,2,'monday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(52,2,'tuesday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(53,2,'wednesday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(54,2,'thursday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(55,2,'friday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(56,2,'saturday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(57,2,'sunday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(58,2,'monday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(59,2,'tuesday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(60,3,'wednesday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(61,3,'thursday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(62,3,'friday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(63,3,'saturday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(64,3,'sunday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(65,3,'monday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(66,3,'tuesday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(67,3,'wednesday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(68,3,'thursday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(69,3,'friday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(70,3,'saturday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(71,3,'sunday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(72,3,'monday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(73,3,'tuesday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(74,3,'wednesday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(75,3,'thursday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(76,3,'friday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(77,3,'saturday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(78,3,'sunday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(79,3,'monday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(80,3,'tuesday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(81,3,'wednesday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(82,3,'thursday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(83,3,'friday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(84,3,'saturday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(85,3,'sunday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(86,3,'monday',27);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(87,3,'tuesday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(88,3,'wednesday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(89,3,'thursday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(90,3,'friday',31);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(91,4,'saturday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(92,4,'sunday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(93,4,'monday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(94,4,'tuesday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(95,4,'wednesday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(96,4,'thursday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(97,4,'friday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(98,4,'saturday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(99,4,'sunday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(100,4,'monday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(101,4,'tuesday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(102,4,'wednesday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(103,4,'thursday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(104,4,'friday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(105,4,'saturday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(106,4,'sunday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(107,4,'monday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(108,4,'tuesday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(109,4,'wednesday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(110,4,'thursday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(111,4,'friday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(112,4,'saturday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(113,4,'sunday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(114,4,'monday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(115,4,'tuesday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(116,4,'wednesday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(117,4,'thursday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(118,4,'friday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(119,4,'saturday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(120,4,'sunday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(121,5,'monday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(122,5,'tuesday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(123,5,'wednesday',3);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(124,5,'thursday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(125,5,'friday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(126,5,'saturday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(127,5,'sunday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(128,5,'monday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(129,5,'tuesday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(130,5,'wednesday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(131,5,'thursday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(132,5,'friday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(133,5,'saturday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(134,5,'sunday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(135,5,'monday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(136,5,'tuesday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(137,5,'wednesday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(138,5,'thursday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(139,5,'friday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(140,5,'saturday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(141,5,'sunday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(142,5,'monday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(143,5,'tuesday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(144,5,'wednesday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(145,5,'thursday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(146,5,'friday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(147,5,'saturday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(148,5,'sunday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(149,5,'monday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(150,5,'tuesday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(151,5,'wednesday',31);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(152,6,'thursday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(153,6,'friday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(154,6,'saturday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(155,6,'sunday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(156,6,'monday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(157,6,'tuesday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(158,6,'wednesday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(159,6,'thursday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(160,6,'friday',9);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(161,6,'saturday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(162,6,'sunday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(163,6,'monday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(164,6,'tuesday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(165,6,'wednesday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(166,6,'thursday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(167,6,'friday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(168,6,'saturday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(169,6,'sunday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(170,6,'monday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(171,6,'tuesday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(172,6,'wednesday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(173,6,'thursday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(174,6,'friday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(175,6,'saturday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(176,6,'sunday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(177,6,'monday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(178,6,'tuesday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(179,6,'wednesday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(180,6,'thursday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(181,6,'friday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(182,7,'saturday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(183,7,'sunday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(184,7,'monday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(185,7,'tuesday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(186,7,'wednesday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(187,7,'thursday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(188,7,'friday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(189,7,'saturday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(190,7,'sunday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(191,7,'monday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(192,7,'tuesday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(193,7,'wednesday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(194,7,'thursday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(195,7,'friday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(196,7,'saturday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(197,7,'sunday',16);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(198,7,'monday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(199,7,'tuesday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(200,7,'wednesday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(201,7,'thursday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(202,7,'friday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(203,7,'saturday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(204,7,'sunday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(205,7,'monday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(206,7,'tuesday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(207,7,'wednesday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(208,7,'thursday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(209,7,'friday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(210,7,'saturday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(211,7,'sunday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(212,7,'monday',31);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(213,8,'tuesday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(214,8,'wednesday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(215,8,'thursday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(216,8,'friday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(217,8,'saturday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(218,8,'sunday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(219,8,'monday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(220,8,'tuesday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(221,8,'wednesday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(222,8,'thursday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(223,8,'friday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(224,8,'saturday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(225,8,'sunday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(226,8,'monday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(227,8,'tuesday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(228,8,'wednesday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(229,8,'thursday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(230,8,'friday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(231,8,'saturday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(232,8,'sunday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(233,8,'monday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(234,8,'tuesday',22);
```



```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(235,8,'wednesday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(236,8,'thursday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(237,8,'friday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(238,8,'saturday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(239,8,'sunday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(240,8,'monday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(241,8,'tuesday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(242,8,'wednesday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(243,8,'thursday',31);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(244,9,'friday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(245,9,'saturday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(246,9,'sunday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(247,9,'monday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(248,9,'tuesday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(249,9,'wednesday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(250,9,'thursday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(251,9,'friday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(252,9,'saturday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(253,9,'sunday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(254,9,'monday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(255,9,'tuesday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(256,9,'wednesday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(257,9,'thursday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(258,9,'friday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(259,9,'saturday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(260,9,'sunday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(261,9,'monday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(262,9,'tuesday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(263,9,'wednesday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(264,9,'thursday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(265,9,'friday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(266,9,'saturday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(267,9,'sunday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(268,9,'monday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(269,9,'tuesday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(270,9,'wednesday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(271,9,'thursday',28);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(272,9,'friday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(273,9,'saturday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(274,10,'sunday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(275,10,'monday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(276,10,'tuesday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(277,10,'wednesday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(278,10,'thursday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(279,10,'friday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(280,10,'saturday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(281,10,'sunday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(282,10,'monday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(283,10,'tuesday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(284,10,'wednesday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(285,10,'thursday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(286,10,'friday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(287,10,'saturday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(288,10,'sunday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(289,10,'monday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(290,10,'tuesday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(291,10,'wednesday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(292,10,'thursday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(293,10,'friday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(294,10,'saturday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(295,10,'sunday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(296,10,'monday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(297,10,'tuesday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(298,10,'wednesday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(299,10,'thursday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(300,10,'friday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(301,10,'saturday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(302,10,'sunday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(303,10,'monday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(304,10,'tuesday',31);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(305,11,'wednesday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(306,11,'thursday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(307,11,'friday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(308,11,'saturday',4);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(309,11,'sunday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(310,11,'monday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(311,11,'tuesday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(312,11,'wednesday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(313,11,'thursday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(314,11,'friday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(315,11,'saturday',11);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(316,11,'sunday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(317,11,'monday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(318,11,'tuesday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(319,11,'wednesday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(320,11,'thursday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(321,11,'friday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(322,11,'saturday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(323,11,'sunday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(324,11,'monday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(325,11,'tuesday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(326,11,'wednesday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(327,11,'thursday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(328,11,'friday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(329,11,'saturday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(330,11,'sunday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(331,11,'monday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(332,11,'tuesday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(333,11,'wednesday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(334,11,'thursday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(335,12,'friday',1);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(336,12,'saturday',2);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(337,12,'sunday',3);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(338,12,'monday',4);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(339,12,'tuesday',5);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(340,12,'wednesday',6);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(341,12,'thursday',7);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(342,12,'friday',8);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(343,12,'saturday',9);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(344,12,'sunday',10);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(345,12,'monday',11);
```

```
INSERT INTO day (day_id, month_id, day, num_day) VALUES(346,12,'tuesday',12);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(347,12,'wednesday',13);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(348,12,'thursday',14);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(349,12,'friday',15);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(350,12,'saturday',16);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(351,12,'sunday',17);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(352,12,'monday',18);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(353,12,'tuesday',19);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(354,12,'wednesday',20);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(355,12,'thursday',21);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(356,12,'friday',22);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(357,12,'saturday',23);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(358,12,'sunday',24);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(359,12,'monday',25);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(360,12,'tuesday',26);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(361,12,'wednesday',27);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(362,12,'thursday',28);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(363,12,'friday',29);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(364,12,'saturday',30);
INSERT INTO day (day_id, month_id, day, num_day) VALUES(365,12,'sunday',31);
```

```
INSERT INTO warehouse (code, subregion_id) VALUES (1,1);
INSERT INTO warehouse (code, subregion_id) VALUES (2,1);
INSERT INTO warehouse (code, subregion_id) VALUES (3,2);
INSERT INTO warehouse (code, subregion_id) VALUES (4,2);
INSERT INTO warehouse (code, subregion_id) VALUES (5,3);
INSERT INTO warehouse (code, subregion_id) VALUES (6,3);
INSERT INTO warehouse (code, subregion_id) VALUES (7,4);
INSERT INTO warehouse (code, subregion_id) VALUES (8,4);
INSERT INTO warehouse (code, subregion_id) VALUES (9,5);
INSERT INTO warehouse (code, subregion_id) VALUES (10,5);
INSERT INTO warehouse (code, subregion_id) VALUES (11,6);
INSERT INTO warehouse (code, subregion_id) VALUES (12,6);
INSERT INTO warehouse (code, subregion_id) VALUES (13,7);
INSERT INTO warehouse (code, subregion_id) VALUES (14,7);
INSERT INTO warehouse (code, subregion_id) VALUES (15,8);
INSERT INTO warehouse (code, subregion_id) VALUES (16,8);
```

```
INSERT INTO warehouse (code, subregion_id) VALUES (17,9);
INSERT INTO warehouse (code, subregion_id) VALUES (18,9);
INSERT INTO warehouse (code, subregion_id) VALUES (19,10);
INSERT INTO warehouse (code, subregion_id) VALUES (20,10);
INSERT INTO warehouse (code, subregion_id) VALUES (22,11);
INSERT INTO warehouse (code, subregion_id) VALUES (21,11);
```

```
INSERT INTO books (isbn, title, price) VALUES (9706279301,'A Gentleman Never Keeps Score',384.00);
INSERT INTO books (isbn, title, price) VALUES (9728304802,'Texas Glory',94.50);
INSERT INTO books (isbn, title, price) VALUES (9702833303,'Rainy day friends',45.00);
INSERT INTO books (isbn, title, price) VALUES (9703859304,'Crazy Rich Asians',1234.50);
INSERT INTO books (isbn, title, price) VALUES (9728304810,'Book 10 for Texas',84.50);
INSERT INTO books (isbn, title, price) VALUES (9702833311,'Book 11 for Rainy day',75.00);
INSERT INTO books (isbn, title, price) VALUES (9703859312,'Book 12 for Crazy Rich Asians',124.50);
INSERT INTO books (isbn, title, price) VALUES (9793937413,'Book 13 for you',23.60);
INSERT INTO books (isbn, title, price) VALUES (9729473014,'Book 14 for the spy and the traitor',240.00);
INSERT INTO books (isbn, title, price) VALUES (9793937413,'Book 15 for the Sky ',135.00);
INSERT INTO books (isbn, title, price) VALUES (9739482716,'Book 16 for the Nigh Charter',125.99);
INSERT INTO books (isbn, title, price) VALUES (9706279317,'Book 17 Keeps Score',314.00);
INSERT INTO books (isbn, title, price) VALUES (9728304818,'Book 18 Glory',84.50);
INSERT INTO books (isbn, title, price) VALUES (9702833319,'Book 19 day friends',65.00);
INSERT INTO books (isbn, title, price) VALUES (9703859320,'Book 20 Asians',1434.50);
INSERT INTO books (isbn, title, price) VALUES (9703859321,'Book 21 for the Bible',1434.50);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(329,24,9728304810,84,7);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(344,38,9793937405,225,7);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(328,10,9739482716,105,7);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(239,32,9703859304,840,8);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(66,6,9793937405,225,8);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(44,30,9729473006,222,8);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(355,10,9703859320,198,9);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(54,13,9702833319,246,9);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(296,37,9703859304,240,10);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(49,18,9703859321,27,10);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(233,6,9729473014,364,11);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(88,5,9728304818,35,11);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(95,36,9728304810,72,11);
```

```
INSERT INTO facts_ticket (day_id, warehouse_code, books_isbn,sell_by_product, ticket_number) VALUES
(341,21,9703746207,112,11);
```

4. Obtain total daily sales by product and subregion.

```
SELECT s.subregion_desc,d.day_id,p.book_isbn,
SUM (sell_by_product) AS SALES_AMOUNT
FROM facts_ticket v
INNER JOIN warehouse t ON v.warehouse_code = t.code
INNER JOIN SUBREGION s ON t.subregion_id = s.subregion_id
INNER JOIN day d ON v.day_id = d.day_id
INNER JOIN books p ON v.books_isbn = p.isbn
GROUP BY s.subregion_id, d.day_id, p.isbn
ORDER BY s.subregion_id, d.day_id, p.isbn;
```