

```
mysql> create table Event(Event_ID int, Duration int, Status_Code
varchar(5), Reason_Code varchar(5));
Query OK, 0 rows affected (0.03 sec)
```

```
mysql> create table Status(Status_Code varchar(5), Name varchar(20));
Query OK, 0 rows affected (0.02 sec)
```

```
mysql> create table ReadyReason(Reason_Code varchar(5), Name
varchar(20));
Query OK, 0 rows affected (0.02 sec)
```

```
mysql> create table DelayReason(Reason_Code varchar(5), Name
varchar(20));
Query OK, 0 rows affected (0.03 sec)
```

```
mysql> create table SpareReason(Reason_Code varchar(5), Name
varchar(20));
Query OK, 0 rows affected (0.02 sec)
```

```
mysql> create table DownReason(Reason_Code varchar(5), Name
varchar(20));
Query OK, 0 rows affected (0.02 sec)
```

```
mysql> insert into Event(Event_ID, Duration, Status_Code, Reason_Code)
values(1,5,'R','S'),(2,60,'D1','S'),(3,10,'S','C'),(4,20,'D2','H'),
(5,15,'S','H'),(6,25,'D1','V'),(7,20,'R','S'),(8,60,'D2','B');
Query OK, 8 rows affected (0.02 sec)
Records: 8 Duplicates: 0 Warnings: 0
```

```
mysql> insert into Status(Status_Code, Name) values('R','Ready'),
('D1','Delay'),('S','Spare'),('D2','Down');
Query OK, 4 rows affected (0.00 sec)
Records: 4 Duplicates: 0 Warnings: 0
```

```
mysql> insert into SpareReason(Reason_Code, Name) values('C','Cold
Spare'),('H','Hot Spare');
Query OK, 2 rows affected (0.01 sec)
Records: 2 Duplicates: 0 Warnings: 0
```

```
mysql> insert into DownReason(Reason_Code, Name) values('B','Broken
Part'),('H','Over Heated');
Query OK, 2 rows affected (0.00 sec)
Records: 2 Duplicates: 0 Warnings: 0
```

```
mysql> select * from Event;
```

Event_ID	Duration	Status_Code	Reason_Code
1	5	R	S
2	60	D1	S
3	10	S	C
4	20	D2	H
5	15	S	H
6	25	D1	V
7	20	R	S
8	60	D2	B

```
+-----+-----+-----+-----+
8 rows in set (0.00 sec)
```

```
mysql> select * from Status;
```

```
+-----+-----+
| Status_Code | Name |
+-----+-----+
| R           | Ready |
| D1          | Delay |
| S           | Spare |
| D2          | Down |
+-----+-----+
```

```
4 rows in set (0.00 sec)
```

```
mysql> select * from ReadyReason;
```

```
+-----+-----+
| Reason_Code | Name |
+-----+-----+
| S           | Standby |
| R           | Running |
+-----+-----+
```

```
2 rows in set (0.00 sec)
```

```
mysql> select * from DelayReason;
```

```
+-----+-----+
| Reason_Code | Name |
+-----+-----+
| S           | No Spare |
| V           | Vendor |
+-----+-----+
```

```
2 rows in set (0.00 sec)
```

```
mysql> select * from SpareReason;
```

```
+-----+-----+
| Reason_Code | Name |
+-----+-----+
| C           | Cold Spare |
| H           | Hot Spare |
+-----+-----+
```

```
2 rows in set (0.00 sec)
```

```
mysql> select * from DownReason;
```

```
+-----+-----+
| Reason_Code | Name |
+-----+-----+
| B           | Broken Part |
| H           | Over Heated |
+-----+-----+
```

```
2 rows in set (0.00 sec)
```

```
mysql> create table temp select Status.Status_Code,
ReadyReason.Reason_Code, ReadyReason.Name from Status cross join
ReadyReason;
```

```
Query OK, 8 rows affected (0.03 sec)
```

```
Records: 8 Duplicates: 0 Warnings: 0
```

```
mysql> insert into temp(Status_Code, Reason_Code, Name) select
Status.Status_Code, DelayReason.Reason_Code, DelayReason.Name from
Status cross join DelayReason;
Query OK, 8 rows affected (0.01 sec)
Records: 8 Duplicates: 0 Warnings: 0
```

```
mysql> insert into temp(Status_Code, Reason_Code, Name) select
Status.Status_Code, SpareReason.Reason_Code, SpareReason.Name from
Status cross join SpareReason;
Query OK, 8 rows affected (0.00 sec)
Records: 8 Duplicates: 0 Warnings: 0
```

```
mysql> insert into temp(Status_Code, Reason_Code, Name) select
Status.Status_Code, DownReason.Reason_Code, DownReason.Name from Status
cross join DownReason;
Query OK, 8 rows affected (0.01 sec)
Records: 8 Duplicates: 0 Warnings: 0
```

```
mysql> select * from temp;
```

Status_Code	Reason_Code	Name
R	S	Standby
R	R	Running
D1	S	Standby
D1	R	Running
S	S	Standby
S	R	Running
D2	S	Standby
D2	R	Running
R	S	No Spare
R	V	Vendor
D1	S	No Spare
D1	V	Vendor
S	S	No Spare
S	V	Vendor
D2	S	No Spare
D2	V	Vendor
R	C	Cold Spare
R	H	Hot Spare
D1	C	Cold Spare
D1	H	Hot Spare
S	C	Cold Spare
S	H	Hot Spare
D2	C	Cold Spare
D2	H	Hot Spare
R	B	Broken Part
R	H	Over Heated
D1	B	Broken Part
D1	H	Over Heated
S	B	Broken Part
S	H	Over Heated
D2	B	Broken Part
D2	H	Over Heated

```
32 rows in set (0.00 sec)
```

```
mysql> create table QueryResult select event.event_id, event.duration,
event.Status_Code, event.Reason_Code, status.name from event,status
where event.status_Code=Status.Status_Code;
Query OK, 8 rows affected (0.02 sec)
Records: 8 Duplicates: 0 Warnings: 0
```

```
mysql> select * from QueryResult;
```

event_id	duration	Status_Code	Reason_Code	name
1	5	R	S	Ready
2	60	D1	S	Delay
3	10	S	C	Spare
4	20	D2	H	Down
5	15	S	H	Spare
6	25	D1	V	Delay
7	20	R	S	Ready
8	60	D2	B	Down

```
8 rows in set (0.00 sec)
```

```
mysql> alter table QueryResult add column(Reason_Name varchar(20));
Query OK, 0 rows affected (0.07 sec)
Records: 0 Duplicates: 0 Warnings: 0
```

```
mysql> update QueryResult set Reason_Name= temp.Name on
QueryResult.Status_Code=temp.Status_Code and
QueryResult.Reason_Code=temp.Reason_Code;
```

```
mysql> alter table QueryResult drop duration;
Query OK, 0 rows affected (0.07 sec)
Records: 0 Duplicates: 0 Warnings: 0
```

```
mysql> alter table QueryResult drop Status_Code;
Query OK, 0 rows affected (0.06 sec)
Records: 0 Duplicates: 0 Warnings: 0
```

```
mysql> select * from QueryResult;
```

event_id	Reason_Code	name	Reason_Name
1	S	Ready	NULL
2	S	Delay	NULL
3	C	Spare	NULL
4	H	Down	NULL
5	H	Spare	NULL
6	V	Delay	NULL
7	S	Ready	NULL
8	B	Down	NULL

```
8 rows in set (0.00 sec)
```