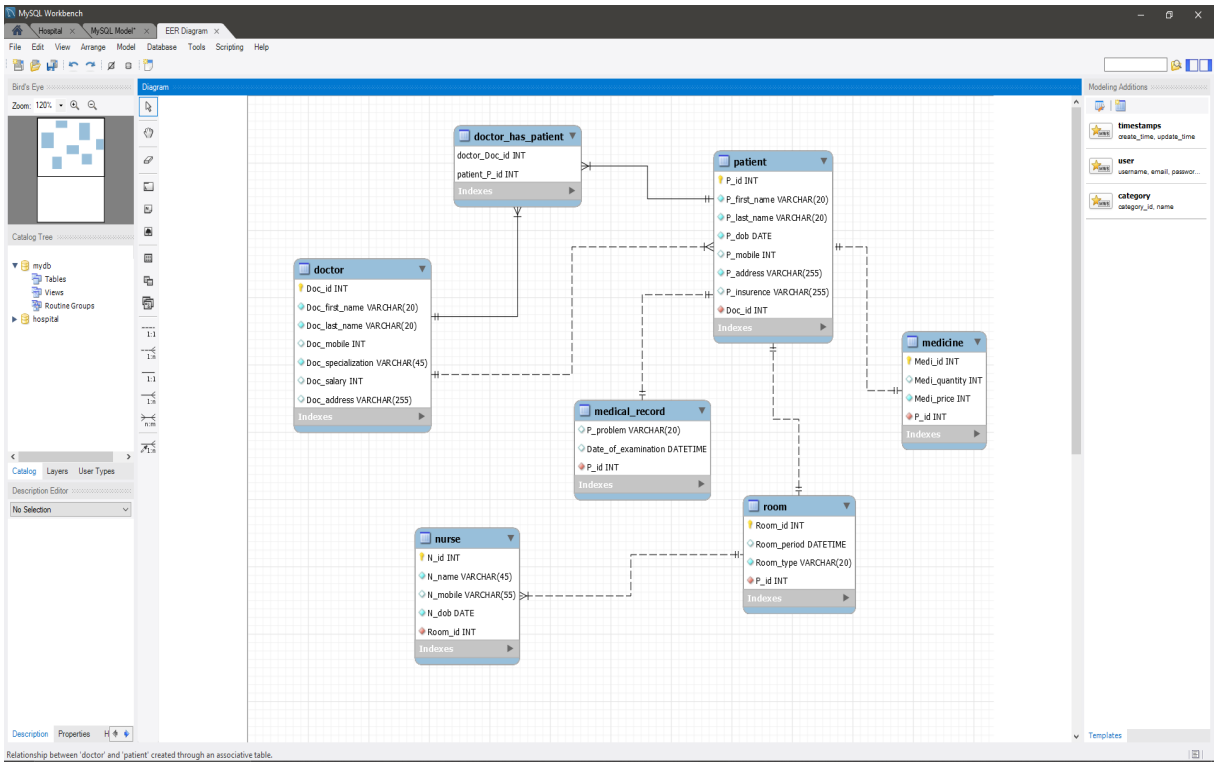
DBMS ASSIGNMENT-2

HOSPITAL DATABASE

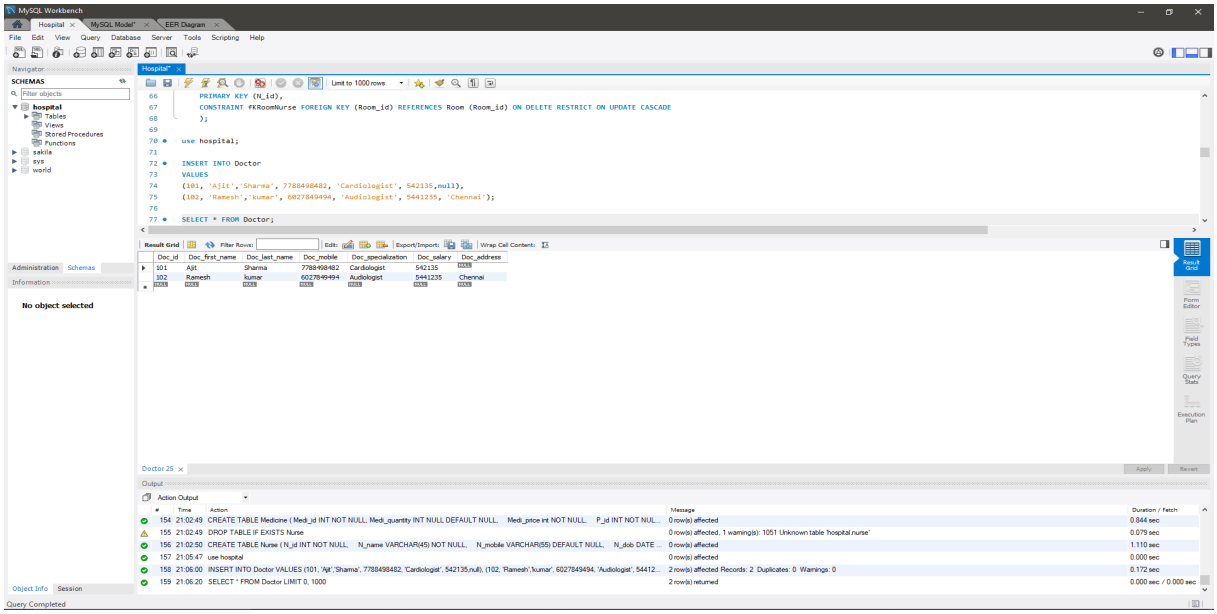
1. Showcased a many-many relation between doctor and Patient using doctor_has_patients entity.
2.
   - Composite Keys : In doctor_has_patients : Primary Key (doctor_Doc_id,patient_P_id)
   - Weak Entity : doctor_has_patients , medicine, medical_report, room



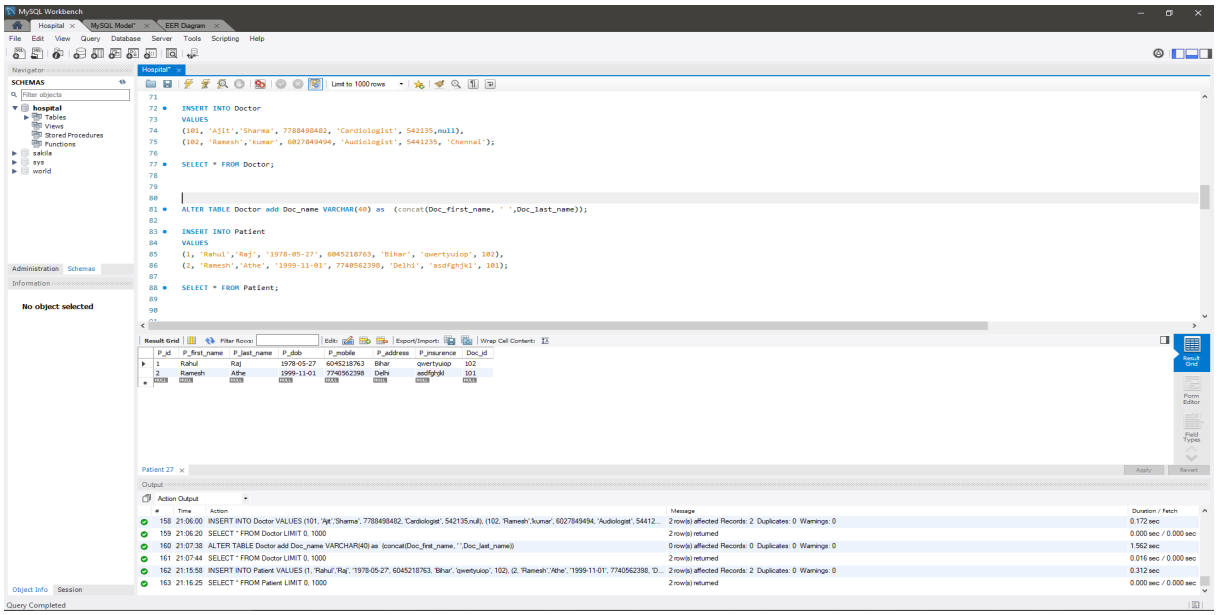
ER Diagram Of Company Database

3. • Checking Primary Key and Unique Constraint :

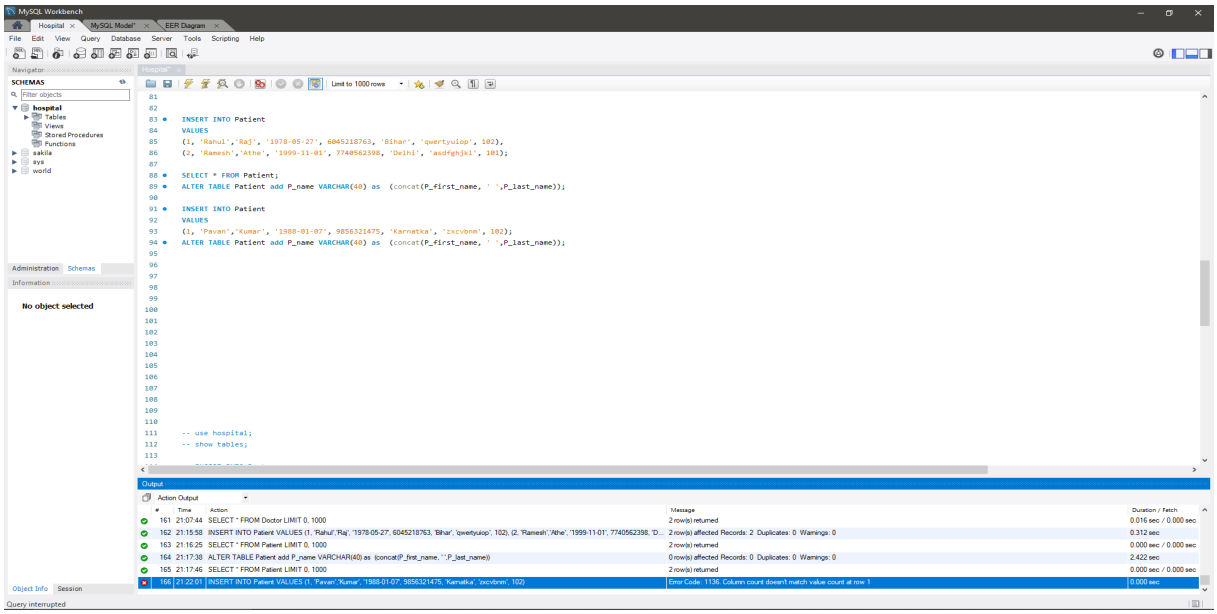
Inserting Doctor's details into tables :



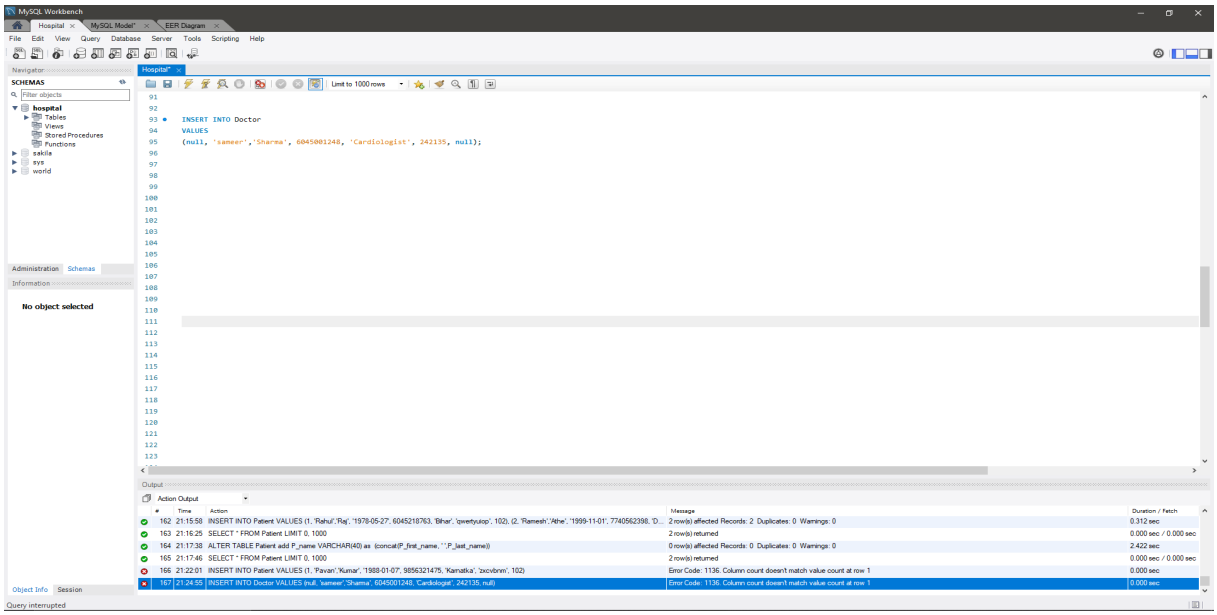
Inserting Patient's details into tables :



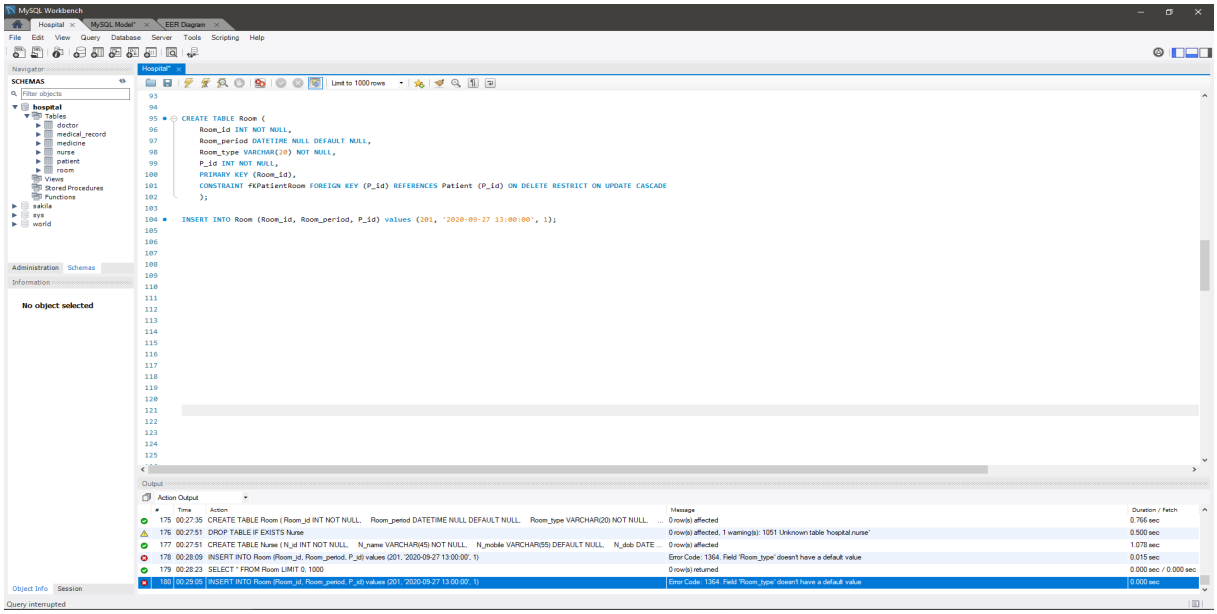
When Trying to insert duplicate value for attribute P_id of Patients table which is a primary key :



- Checking Not Null and Default Constraint :
  (a) When Trying to insert null value for attribute Doc_id of Doctor table which is specified as not null :

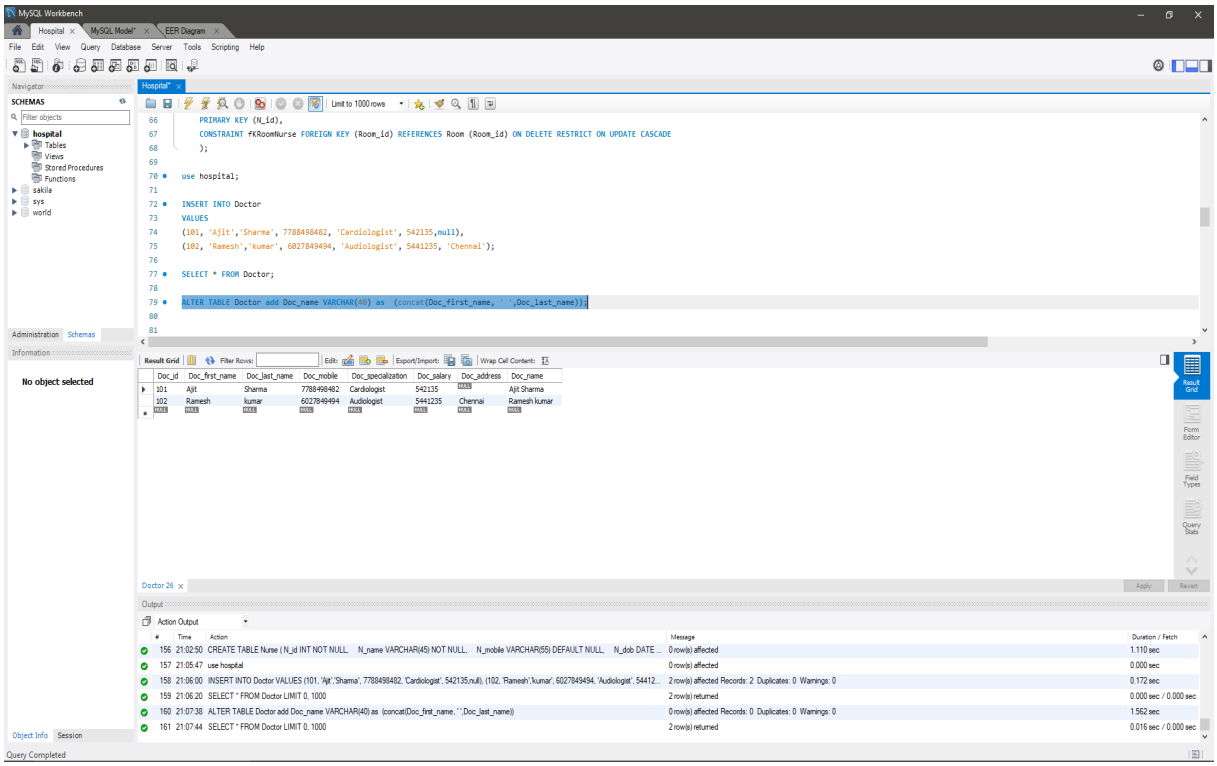


(b) When Trying to insert values into room table in which the attribute room_type doesn't have any default value :



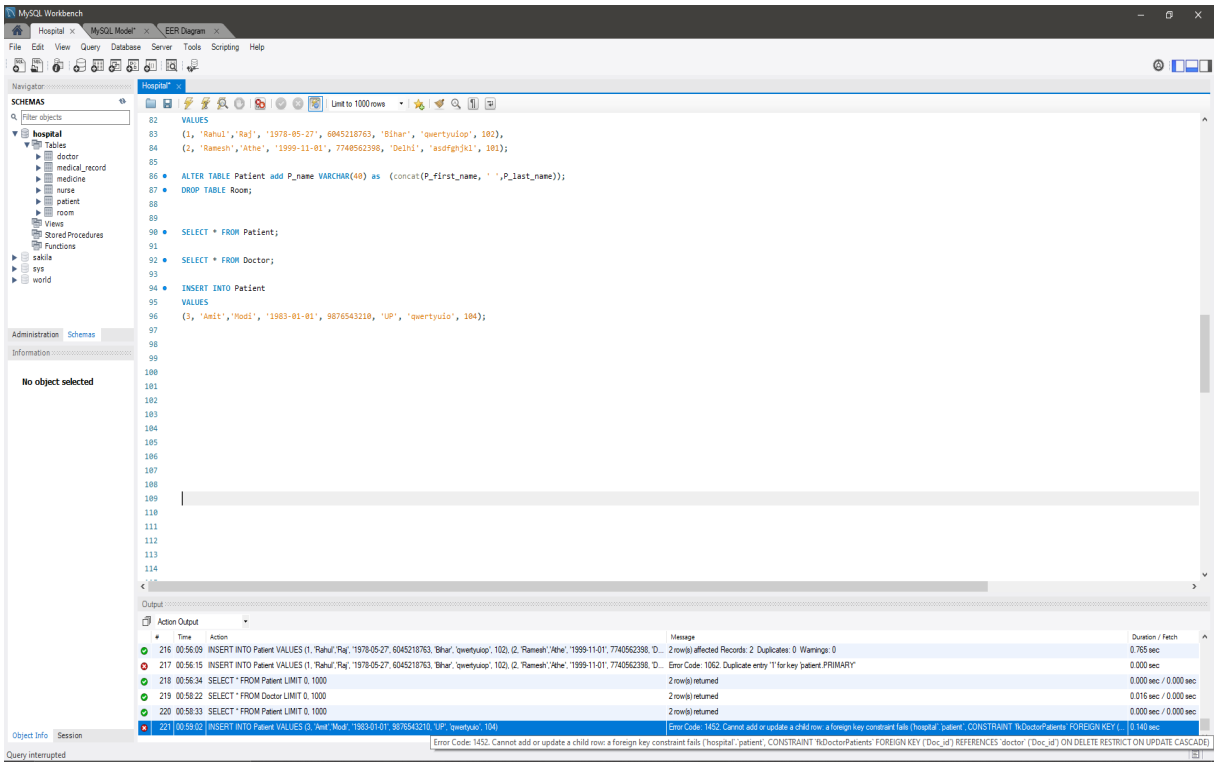
4. Derived Attributes :

   - Doc_name attribute of Doctor table:
     Dependant on/Derived from concatenation of Doc_first_name and Doc_last_name attributes of Doctor table.



5. Inserting tuples into dependant table of a foreign key constraint first.

   Patient table is dependant on Doctor table for getting Doc_id which is the foreign key of the table. If we insert data into Doc_id column of Patient table without inserting any data into Doctor table then :


MySQL Workbench
Hospital
MySQL Model*
EER Diagram
File Edit View Query Database Server Tools Scripting Help
Navigator
SCHEMAS
Filter objects
hospital
Tables
doctor
medical_record
medicine
nurse
patient
room
Views
Stored Procedures
Functions
sakila
sys
world
Administration Schemas
Information
No object selected
Object Info Session
Hospital*
Limit to 1000 rows
82 VALUES
83 (1, 'Rahul','Raj', '1978-05-27', 6045218763, 'Bihar', 'qwertyuiop', 102),
84 (2, 'Ramesh','Athe', '1999-11-01', 7740562398, 'Delhi', 'asdfghjkl', 101);
85
86 ALTER TABLE Patient add P_name VARCHAR(40) as (concat(P_first_name, ' ',P_last_name));
87 DROP TABLE Room;
88
89
90 SELECT * FROM Patient;
91
92 SELECT * FROM Doctor;
93
94 INSERT INTO Patient
95 VALUES
96 (3, 'Amit','Modi', '1983-01-01', 9876543210, 'UP', 'qwertyuio', 104);
97
98
99
100
101
102
103
104
105
106
107
108
109
110
111
112
113
114
Output
Action Output
Time Action Message Duration / Fetch
216 00:56:09 INSERT INTO Patient VALUES (1, 'Rahul','Raj', '1978-05-27', 6045218763, 'Bihar', 'qwertyuiop', 102), (2, 'Ramesh','Athe', '1999-11-01', 7740562398, 'D... 2 row(s) affected Records: 2 Duplicates: 0 Warnings: 0 0.765 sec
217 00:56:15 INSERT INTO Patient VALUES (1, 'Rahul','Raj', '1978-05-27', 6045218763, 'Bihar', 'qwertyuiop', 102), (2, 'Ramesh','Athe', '1999-11-01', 7740562398, 'D... Error Code: 1062. Duplicate entry '1' for key 'patient.PRIMARY' 0.000 sec
218 00:56:34 SELECT * FROM Patient LIMIT 0, 1000 2 row(s) returned 0.000 sec / 0.000 sec
219 00:58:22 SELECT * FROM Doctor LIMIT 0, 1000 2 row(s) returned 0.016 sec / 0.000 sec
220 00:58:33 SELECT * FROM Patient LIMIT 0, 1000 2 row(s) returned 0.000 sec / 0.000 sec
221 00:59:02 INSERT INTO Patient VALUES (3, 'Amit','Modi', '1983-01-01', 9876543210, 'UP', 'qwertyuio', 104) Error Code: 1452. Cannot add or update a child row: a foreign key constraint fails (`hospital`.`patient`, CONSTRAINT `fkDoctorPatients` FOREIGN KEY (... 0.140 sec
Error Code: 1452. Cannot add or update a child row: a foreign key constraint fails (`hospital`.`patient`, CONSTRAINT `fkDoctorPatients` FOREIGN KEY (`Doc_id`) REFERENCES `doctor` (`Doc_id`) ON DELETE RESTRICT ON UPDATE CASCADE)
Query interrupted