**Relational Schema**

**Patient**(

pid char(3) NOT NULL,

firstname varchar(20),

lastname varchar(20),

insurance varchar(20),

contact varchar(20),

type char(1), -- I, for Inpatient, O for Outpatient

admitted date,

discharged date,

PRIMARY KEY (pid)

)

**Treatment**(

tid char(3), -- chosen as the primary key

description varchar(20),

type char(1), -- I, for Inpatient, O for Outpatient

PRIMARY KEY (tid)

)

**Employee**(

eid char(3) NOT NULL,

firstname varchar(20),

lastname varchar(20),

doh date, -- doh is the standard abbreviated short form of “date of hire?”

category varchar(20),

PRIMARY KEY (eid)

)

**Doctor**(

eid char(3),

firstname varchar(20),

lastname varchar(20),

doh date,

PRIMARY KEY (eid),

FOREIGN KEY (eid), REFERENCES Employee(eid)

)

**Nurse**(

eid char(3),

firstname varchar(20),

lastname varchar(20),

doh date,

PRIMARY KEY (eid),

FOREIGN KEY (eid), REFERENCES Employee(eid)

)

**Technician**(

eid char(3)

firstname varchar(20),

lastname varchar(20),

doh date,

PRIMARY KEY (eid),

FOREIGN KEY (eid), REFERENCES Employee(eid)

)

**Administrator**(

eid char(3)

firstname varchar(20),

lastname varchar(20),

doh date,

PRIMARY KEY (eid),

FOREIGN KEY (eid), REFERENCES Employee(eid)

)

**AdminDoctor**(

eid char(3),

firstname varchar(20),

lastname varchar(20),

doh date,

PRIMARY KEY (eid),

FOREIGN KEY (eid), REFERENCES Doctors(eid)

)

**OrderedTreatment**(

orderid char(3) UNIQUE**,**

tid char(3),

pid char(3),

eid char(3),

timeordered date,

PRIMARY KEY (tid, eid, pid), -- pid is patient id

FOREIGN KEY (tid) REFERENCES Treatment(tid),

FOREIGN KEY (eid) REFERENCES Doctor(eid),

FOREIGN KEY (pid) REFERENCES Patient(pid)

)

**AdministeredTreatment**(

Orderid char(3),

tid char(3),

pid char(3),

eid char(3),

type char(1), -- Only Inpatient are administered treatment

time date, -- default CURRENT\_DATE,

PRIMARY KEY (tid, eid, pid),

FOREIGN KEY (tid) REFERENCES Treatment(tid),

FOREIGN KEY (eid) REFERENCES Employee(eid),

FOREIGN KEY (pid) REFERENCES Patient(pid)

)

**AdmittedPatient**(

pid char(3),

eid char(3),

admitted date,

discharged date,

PRIMARY KEY (pid, eid, admitted),

FOREIGN KEY (pid) REFERENCES Patient(pid),

FOREIGN KEY (eid) REFERENCES AdminDoctor(eid)

)