PART1 RESULT (THERE IS ONLY PART 1 BECAUSE IT IS COMPLİCATED A LITTLE BIT)

1.QUESTION

```
schedule_conflict():-
    courseid(X,Y),
    courseid(Z,W),
    X \== Z,
    roomoccupancyinformation(K,X,L),

    roomoccupancyinformation(M,Z,N),
    K == M,
    L == N,
    format("There is conflict between : "),
    format("X:~w Y:~w Z:~w W:~w", [X, Y, Z, W]).
```

```
true ;
Student:ahmet
true ;
Student:mehmet
true ;
Student:mehmet
true ;
false.

6 ?- schedule_conflict().
There is conflict between : X:cse331 Y:5 Z:cse351 W:13
```

2.QUESTION

```
checkwhichroomtogivenclass(X):-
    courseinstructor(X,Y),
    coursecapacity(X,Z),
    courseitem(X,K),
    coursetime(X,L),


    roomcapacity(M,N), % m =room
    roomwhen(A,B), % a = room
    roomitem(U,W), % u= room

    instructoritem(Y,T),
    roomitem(Q,T),

    Z =< N,
    B == L,
    W == K,

    A==U,
    A==M,
    U==M,
    Q==A,
    Q==M,
    Q==U,
    format("The room is : "),
    format("M:~w A:~w U:~w Q:~w", [M,A,U,Q]).
```

```
For built-in help, use ?- help(Topic). or ?- ap

1 ?- ['C:/Prolog/1801042674.pl'].
true.

2 ?- schedule_conflict().
There is conflict between : X:cse331 Y:5 Z:cse3
true ;
There is conflict between : X:cse351 Y:13 Z:cse
true ;
false.

3 ?-
checkwhichroomtogivenclass(cse341).
The room is : M:z10 A:z10 U:z10 Q:z10
true .

4 ?- checkwhichroomtogivenclass(cse341).
The room is : M:z10 A:z10 U:z10 Q:z10
true ;
false.

4 ?-
```

RESULT IS Z10

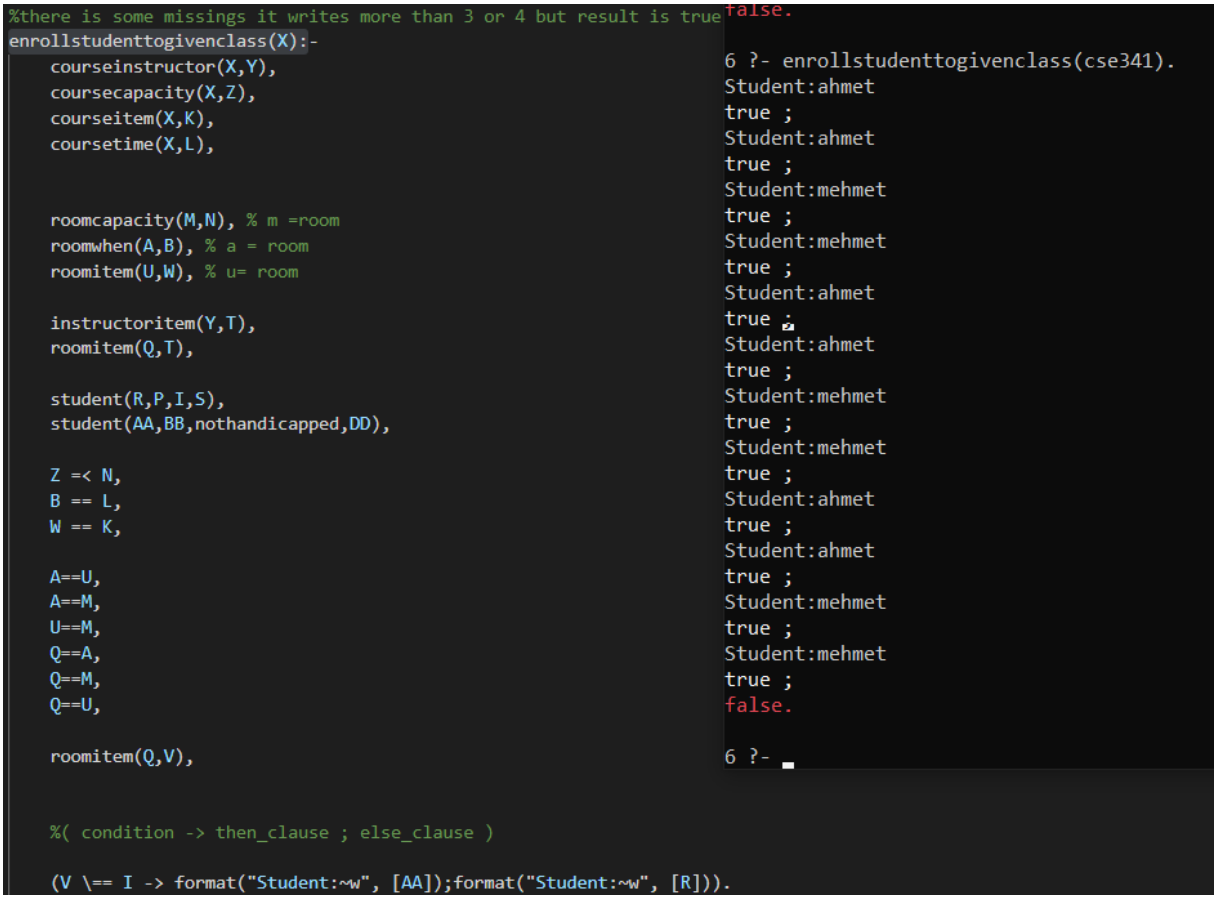
3.QUESTION

```
checkwhichroomtowhichclass():-
    checkwhichroomtogivenclass(X),
    format(" X:~w ", [X]).

%there is some missings it writes more than 3 or 4 but result is true
enrollstudenttogivenclass(X):-
    courseinstructor(X,Y),
```

```
false.

4 ?- checkwhichroomtowhichclass().
The room is : M:z10 A:z10 U:z10 Q:z10 X:cse341
true ;
The room is : M:z6 A:z6 U:z6 Q:z6 X:cse331
true ;
The room is : M:z23 A:z23 U:z23 Q:z23 X:cse222
```

RESULT IS Z23

4.QUESTION



```
%there is some missings it writes more than 3 or 4 but result is true
enrollstudenttogivenclass(X):-
    courseinstructor(X,Y),
    coursecapacity(X,Z),
    courseitem(X,K),
    coursetime(X,L),


    roomcapacity(M,N), % m =room
    roomwhen(A,B), % a = room
    roomitem(U,W), % u= room

    instructoritem(Y,T),
    roomitem(Q,T),

    student(R,P,I,S),
    student(AA,BB,nothandicapped,DD),

    Z =< N,
    B == L,
    W == K,

    A==U,
    A==M,
    U==M,
    Q==A,
    Q==M,
    Q==U,

    roomitem(Q,V),


    %( condition -> then_clause ; else_clause )

    (V \== I -> format("Student:~w", [AA]);format("Student:~w", [R])).
```

```
false.

6 ?- enrollstudenttogivenclass(cse341).
Student:ahmet
true ;
Student:ahmet
true ;
Student:mehmet
true ;
Student:mehmet
true ;
Student:ahmet
true ;
Student:ahmet
true ;
Student:mehmet
true ;
Student:mehmet
true ;
Student:ahmet
true ;
Student:ahmet
true ;
Student:mehmet
true ;
Student:mehmet
true ;
false.

6 ?-
```

5.QUESTION

```
%there is some missings it writes more than 3 or 4 but result is true
checkwhichstudenttowhichclass():-
    enrollstudenttogivenclass(X),
    format(" Lecture:~w ", [X]).
```

```
7 ?- checkwhichstudenttowhichclass().
Student:ahmet Lecture:cse341
true ;
Student:ahmet Lecture:cse341
true ;
Student:mehmet Lecture:cse341
true ;
Student:mehmet Lecture:cse341
true ;
Student:ahmet Lecture:cse341
true ;
Student:ahmet Lecture:cse341
true ;
Student:mehmet Lecture:cse341
true ;
Student:mehmet Lecture:cse341
true ;
Student:ahmet Lecture:cse341
true ;
Student:ahmet Lecture:cse341
true ;
Student:mehmet Lecture:cse341
true ;
Student:mehmet Lecture:cse341
true ;
Student:ahmet Lecture:cse331
true ;
Student:mehmet Lecture:cse331
```

İt is writing more than one but result is true when compared with database.

```
Student:mehmet Lecture:cse331
true ;
Student:ahmet Lecture:cse331
true ;
Student:mehmet Lecture:cse331
true ;
Student:ahmet Lecture:cse222
true ;
Student:ahmet Lecture:cse222
true ;
Student:ahmet Lecture:cse222
true ;
Student:mehmet Lecture:cse222
true ;
Student:mehmet Lecture:cse222
```

```
tudent:ahmet Lecture:cse222
rue ;
tudent:ahmet Lecture:cse222
rue ;
tudent:mehmet Lecture:cse222
rue ;
tudent:mehmet Lecture:cse222
rue ;
tudent:mehmet Lecture:cse222
rue ;
tudent:ahmet Lecture:cse222
rue ;
tudent:bill Lecture:cse222
rue ;
tudent:ahmet Lecture:cse222
rue ;
tudent:mehmet Lecture:cse222
rue ;
tudent:bill Lecture:cse222
rue ;
tudent:mehmet Lecture:cse222
```