

# Computer Science Team Week 2

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# Fun Coding Problems

Theme: clubs!

# Problem Sentence

**Problem Sentence** Given *clubs*, a dictionary of clubs where the name of the club is the key and the meeting day is the value, return a string containing a full sentence for each club that says when it meets.

```
def print_schedules(clubs: Dict[str, str]) -> str
```

# Problem Sentence

## Example

```
assert print_schedules({  
    "Gimkit Club": "10:00 am",  
    "Computer Science Team": "11:00 am",  
    "Math Club": "4:00 am",  
}) == ""  
Gimkit Club meets at 10:00 am.  
Computer Science Team meets at 11:00 am.  
Math Club meets at 4:00 am.  
""
```

# Problem Conflict

**Problem Conflict** *clubs* is a dictionary. The name of the club is the key. The value is a tuple of two integers, (start, end), where start and end represent the range of time that the club is meeting today, where start and end are the minutes after midnight yesterday. Return a list of clubs that conflict with other clubs.

```
def conflicts(clubs: Dict[str, Tuple[int, int]])  
    -> List[str]
```

# Problem Conflict

## Example

```
assert conflicts({  
    "Gimkit Club": (1, 3),  
    "Computer Science Team": (3, 4),  
    "Math Club": (21, 23),  
}) == ["Gimkit Club", "Computer Science Team"]
```

# Problem Recommendation

**Problem Recommendation** Given *members* dictionary where the key is the club name and members contain member names, give the student *student* recommendations for which clubs to join. Note: there are multiple solutions for this problem. Be creative!

```
def recommend(  
    members: Dict[str, List[str]],  
    student: str  
) -> [str]
```

# Problem Recommendation

## Example

```
assert recommend({  
    "Gimkit Club": ["Joe", "Sara"]  
    "Computer Science Team": ["Joe", "Sara"]  
    "Math Club": ["Sara"]  
}, "Joe") == ["Math Club"]
```



# The End

Questions? Comments? Remarks?  
Considerations? Confusions?