# Course Activity

Introduction

#### Grouping

- 2 students per group except Final
- Filled in the group list in https://docs.google.com/spreadsheets/d/1Mk0caT pd8WkgSw6hMiaHOLYG\_98LlgfyGqox3r5intk/edit? usp=sharing
- Remember your group number, this sheet will be read-only after 9/25 23:59

#### Course Activity

- In-class exercise
  - Deadline: Tuesday (maybe extended)
  - Inter/inner group discussion ok!
  - Inter group code exchange FORBIDDEN
    - DO NOT SHOW YOUR CODE TO OTHERS EXCEPT YOUR TEAMATE

#### Server

- mvnl.csie.ntu.edu.tw
- e.g. nc mvnl.csie.ntu.edu.tw 7770
- Send "Q" for problem, send "A" for submitting, send "P" for problem description
- If correct, the server returns flag

#### Activity #0 : Test ( NO CREDIT )

- A+B question
- nc mvnl.csie.ntu.edu.tw 7770
- Sample code in https://drive.google.com/open?id=0B4Qc-NfoSFXscDZVV3BsQUJSZnM

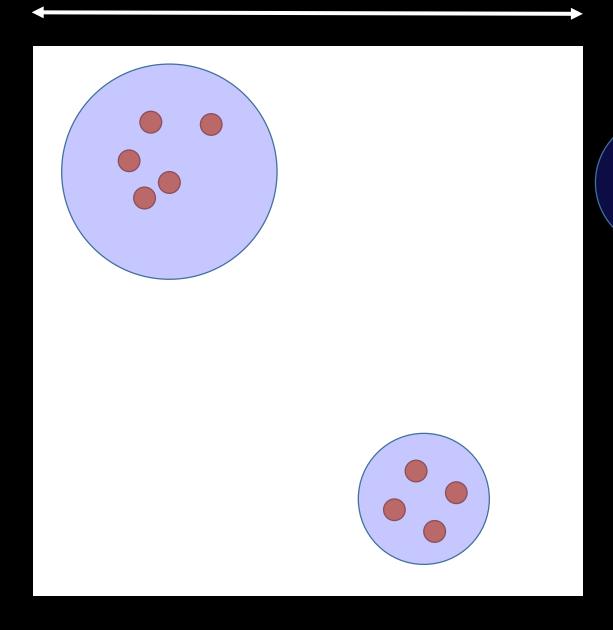
### Activity #0 : Test ( NO CREDIT )

```
[MATLAB] Test
= Problem =
In this problem, you need to return the result of a+b using MATLAB
= Input Format =
a b
a,b: integer in [1,100]
= Output Format =
C
c: result of a+b
= Sample Input =
12
= Sample Output =
3
```

### Activity #1 : Multiplexing

- nc mvnl.csie.ntu.edu.tw 7771
- Utility SNR code in https://drive.google.com/open?id=0B\_Z-TUMjZ2A8dk5QRUIUcFBoQ2c

#### 40m



Receiver



### Activity #1 : Multiplexing

- In this problem, you need to calculate the valid Tx positions and
- transmission powers respectively given the Rx locations.
- location ([0,40],[0,40])
- Tx power (10mW, 1000mW)
- Noise floor 10^(-7.5) mW
- PathLossExponent = 2
- SINR must over 100

## Activity #1 : Multiplexing-p3

• nc mvnl.csie.ntu.edu.tw 7772

#### Activity #1 : Multiplexing-p3

- In this problem, you need to calculate the valid Tx positions and
- transmission powers respectively given the Rx locations.
- location ([0,40],[0,40])
- Tx power (10mW, 1000mW)
- Noise floor 10^(-7.5) mW
- PathLossExponent = 3
- SINR must over 100

#### Submit

- courses.dlc.ntu.edu.tw
  - Exercise > Multiplexing
  - .zip containing (code.m)/ report.pdf/ flag.txt