EE100 Lab Report: **Design Poor Man's Square Wave Signal Generator**

Name:_____
TA: _____
Section:_____

**1-a)** Record DC measurement values. For what range of input voltages is the virtual ground property is valid?

| $V_{IN}$ | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| $V_{VGND}$ | | | | | | | | | | |

Validity range and condition:

**1-b)** Record DC measurement values.

| $V_{IN}$ | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| $V_{VGND}$ | | | | | | | | | | |

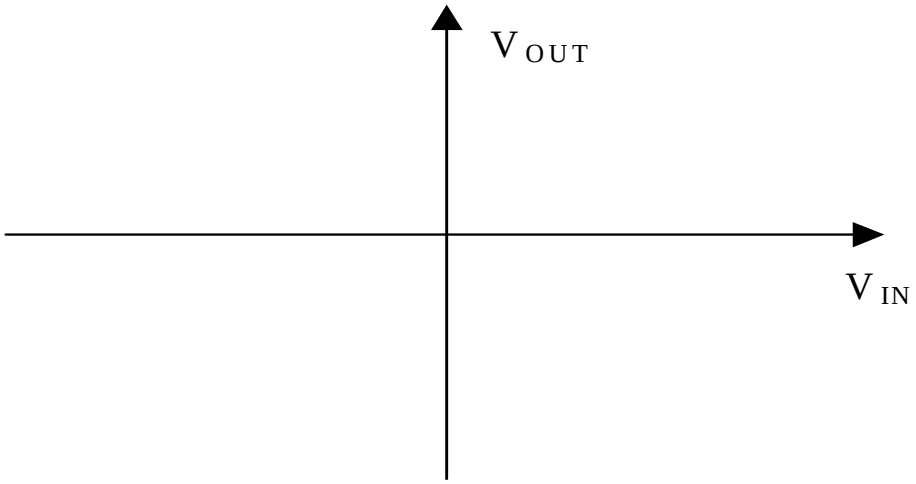
Necessary conditions for virtual ground property are : _____

**1-c)** Record DC measurement values.

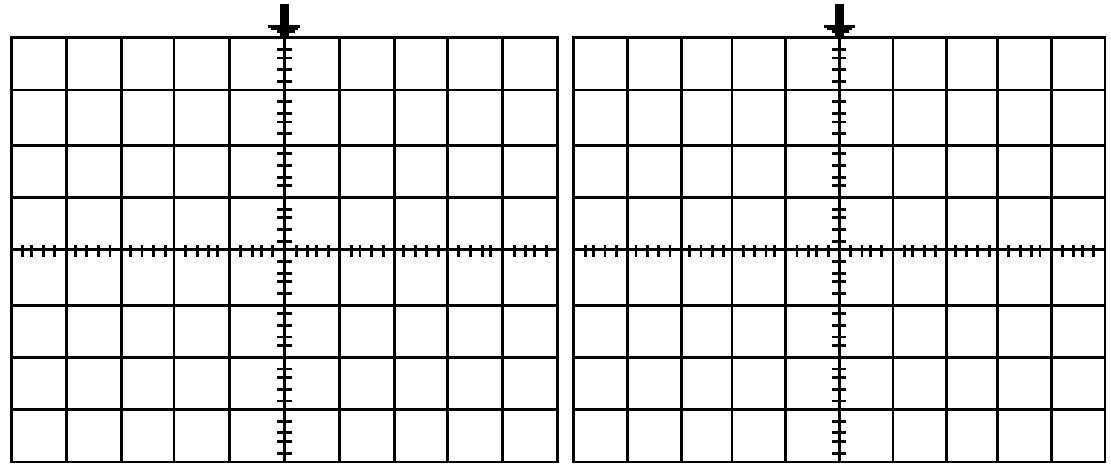
| $V_{IN}$ | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| $V_{OUT}$ | | | | | | | | | | |

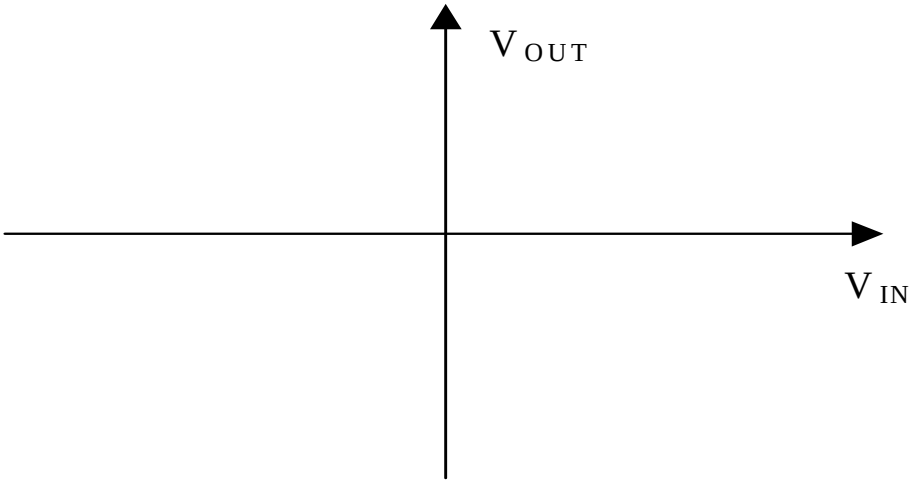
Saturation level is: _____

Transfer chart:



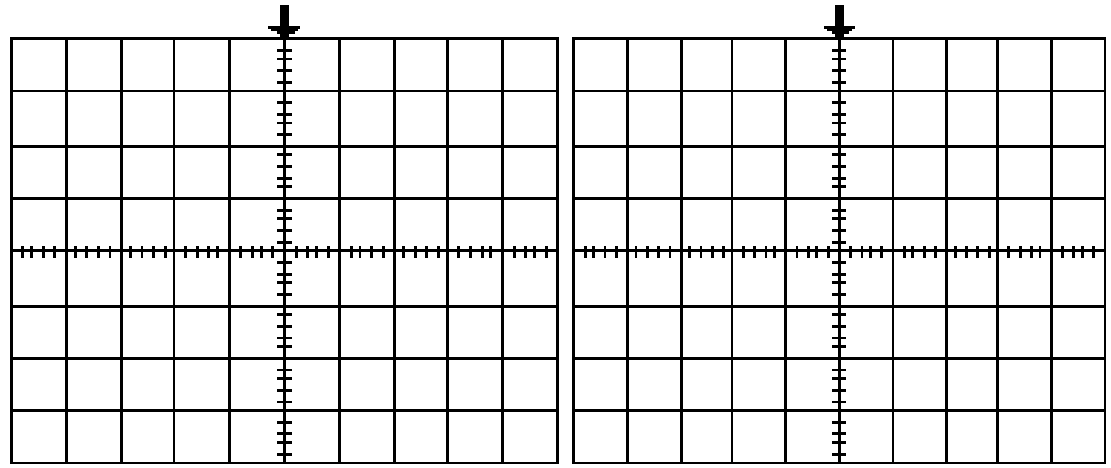
**1-d)** Input output signal and the transfer characteristic:

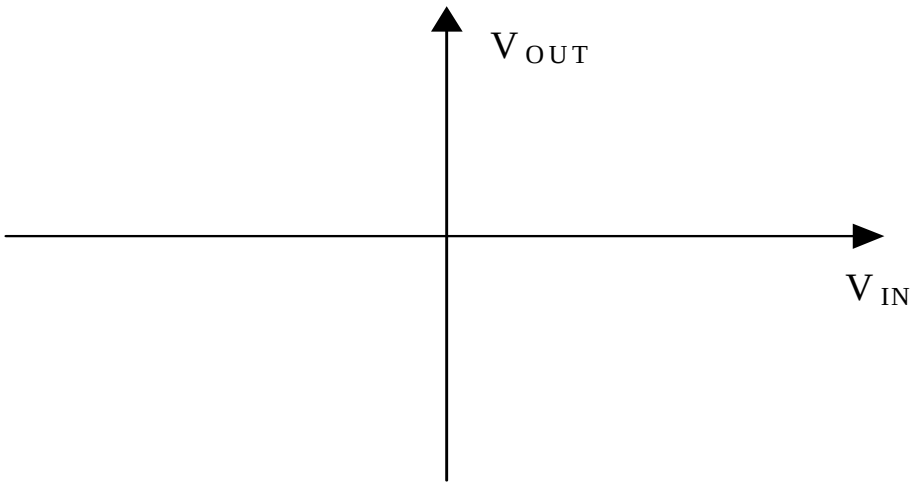





Conclusion:

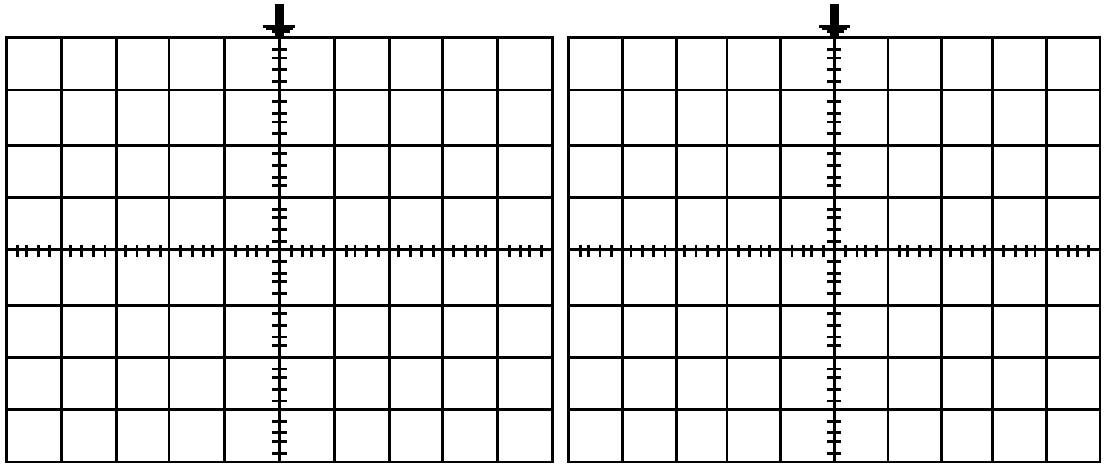
**1-e)** Input output signal and the transfer characteristic:





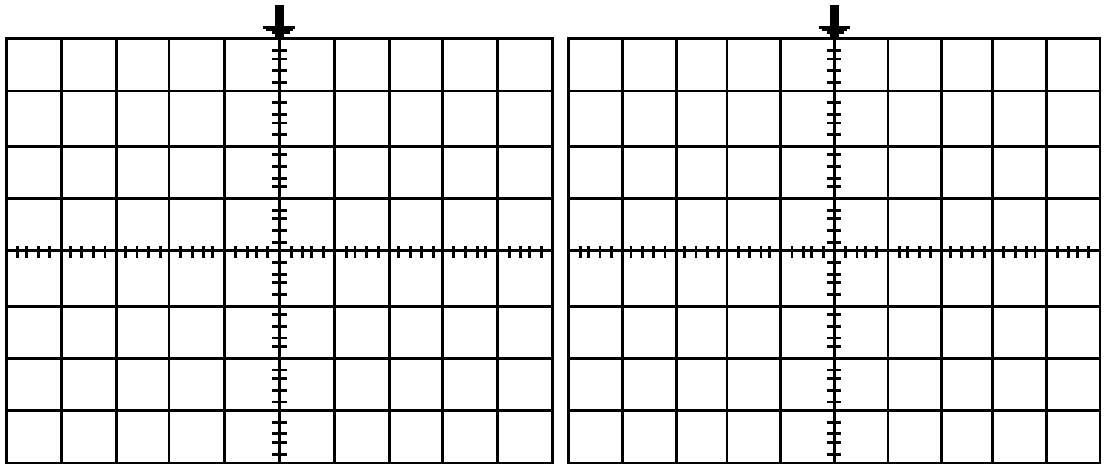

Conclusion:

**1-f)** Input-output are



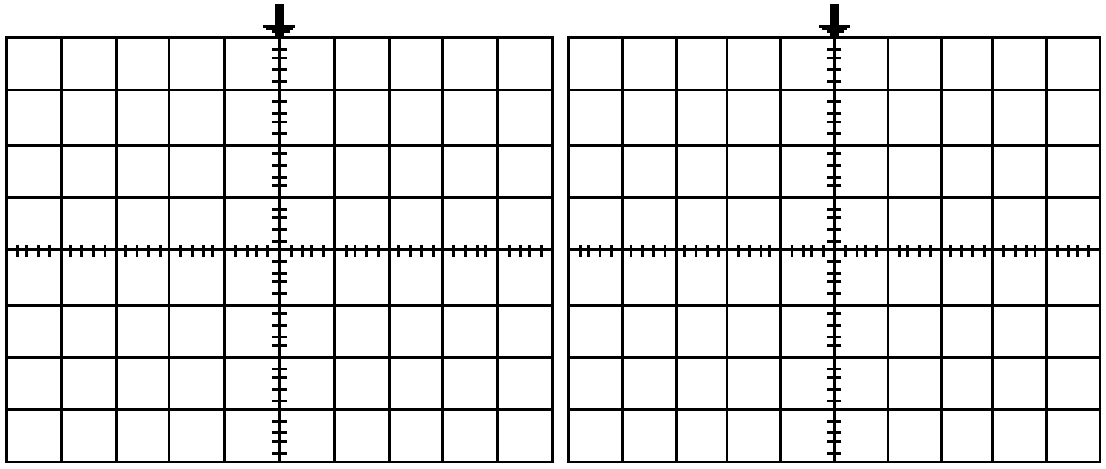
Conclusion:

**1-g)**



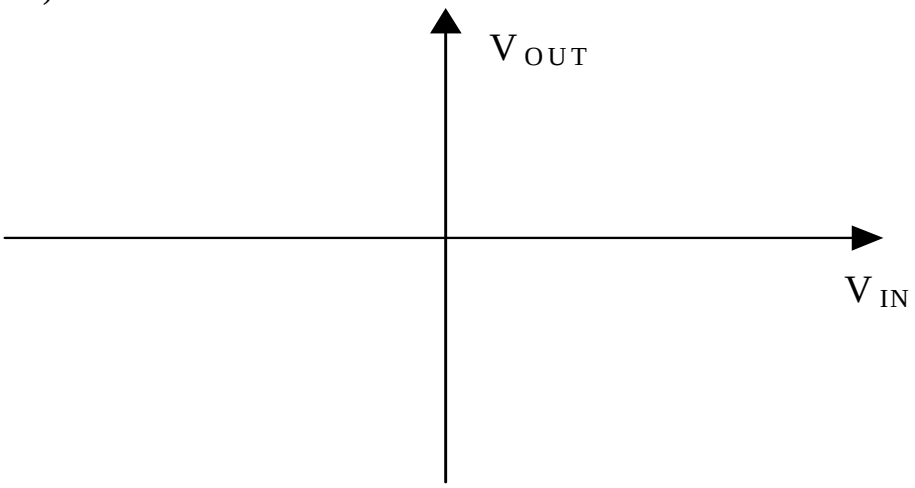
Conclusion:

**1-h)**



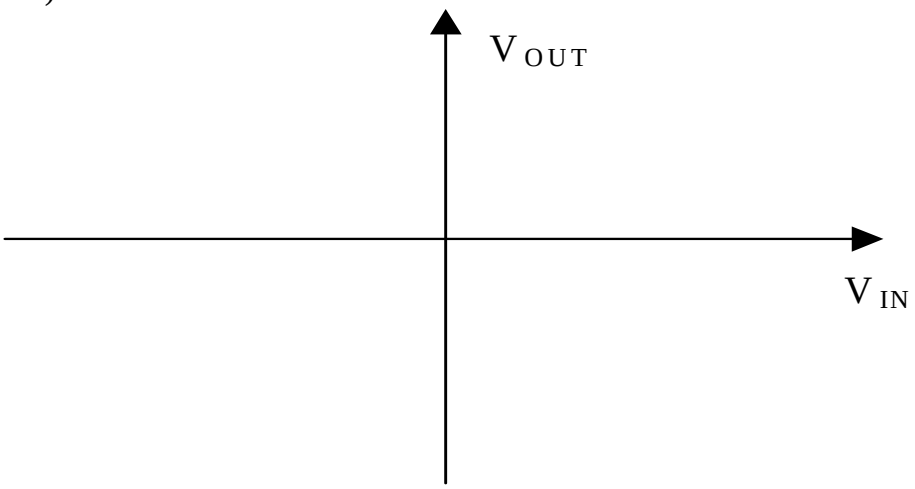
Conclusion:

2-a) the transfer characteristic is:



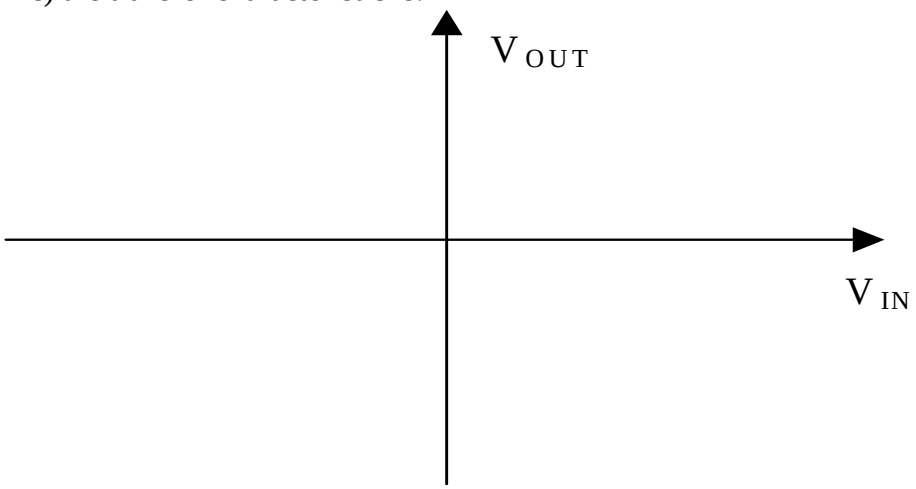

Conclusion:

2-b) the transfer characteristic is:




Conclusion:

2-c) the transfer characteristic is:




Conclusion: