**Pseudo Code**

**StartMenu**

void update()

if (NewGameButton is Pressed)

startGame()

else if (ExitGameButton is Pressed)

exitGame()

**Input**

void checkInput()

{

if (mouseClicked)

save MousePosition

else if (buttonPressed)

recognize which button

}

void startLevel()

{

create Level and HUD

create player, enemies, NPCs and objects

}

**GameManager**

void Update()

{

update entities

//for eacb object

checkCollision()

checkInput()

if(pauseButtonPressed)

pause Game

isLevelFinished()

if(player.health <= 0)

gameover()

}

void gameOver()

{

blackscreen for a few seconds

open startMenu

}

void pause()

{

open pauseMenu

freeze GameManger.Update()

if(continueButton is Pressed)

unfreeze GameManger.Update

}

void finish()

{

if reached end of level

open startMenu

}

**Player**

void takeDamage(int damage)

{

health -= damage;

update HUD

}

**Camera**

add methods to the class diagram

**StateMachine**

revise stateMachine in class diagram

**Character**

put health, damage from player and enemy here

**GameObject**

virtual reset Method