

# **Dark Night**

## **Program Design Language**

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## ***Revision Control***

### ***History Revision:***

<b><i>Revision Date</i></b>	<b><i>Person Responsible</i></b>	<b><i>Version Number</i></b>	<b><i>Modification</i></b>
11/16/16	Ethan Fredric Y. Tan	1.0	Initial Document
11/17/16	Ethan Fredric Y. Tan	1.1	Added movement specification
11/18/16	Hans G. Capiral	1.2	Added combat and in-game menu specification
11/18/16	Jahziel Rae M. Arceo	1.3	Added additional specification information

***Program Specification:*** General Movement

**Input:**

Direction key - key of where to direct movement

**Output:**

Sound - sound describing result of action

**Program Logic:**

```
IF direction key points forward
    IF there is an obstacle
        PLAY SOUND hitting a wall
    ELSE IF there is no obstacle
        MOVE forward
        PLAY SOUND player movement
ELSE IF direction key points backward
    IF there is an obstacle
        PLAY SOUND hitting a wall
    ELSE IF there is no obstacle
        MOVE backward
        PLAY SOUND player movement
ELSE IF direction key points to the left
    FACE left
ELSE IF direction key points to the right
    FACE right
```

***Program Specification:*** Combat

**Input:**

Action key - key to attack enemy

**Output:**

Sound - sound of weapon hitting enemy and enemy reaction,  
enemy attacking player and player's reaction

**Program Logic:**

```
WHILE enemy is alive
    PLAY SOUND player's heartbeat
    IF player's turn to attack
        PLAY SOUND weapon swinging
        PLAY SOUND enemy in pain
        DECREASE health of enemy
    ELSE IF enemy's turn to attack
        PLAY SOUND enemy attacking
        IF randomizer suggests that player inflicts damage
            PLAY SOUND player in pain
            INCREASE player's heartbeat
IF enemy is dead
    PLAY SOUND enemy falling to the ground
```

**Program Specification:** In-game Menu

**Input:**

Menu key - key to enter the in-game menu  
Select key - key to choose highlighted/current option  
Navigation keys - keys to move up or down the options

**Output:**

Sound - sound of narrator reading the highlighted option,  
selecting an option, initial menu sound

**Program Logic:**

```
IF menu key is pressed
    PLAY SOUND starting the menu
    X:
    PLAY SOUND read current option
    IF select key is pressed
        PLAY SOUND select sound
        IF "resume game" is selected
            RESUME the game and quit menu
        ELSE IF "save game" is selected
            SAVE the game
        ELSE IF "quit game" is selected
            QUIT the game
    ELSE IF navigation key UP is pressed
        HIGHLIGHT option above current option
        GOTO X
    ELSE IF navigation key DOWN is pressed
        HIGHLIGHT option below current option
        GOTO X
```









