Cairo University

Faculty of Engineering

Computer Engineering Department

**SPACE INVADERS**

**Microprocessors Systems Project - Phase 1**

Submitted to

**Dr. Khaled Mohammad Soradi**

**Team Members: Sec B.N**

Khaled Galal Helmy 1 17

AbdElRahman Muhammad ElGamil 1 33

Youssef Mohammad Dawood 2 36

**Contact Info:**

Khaledgalal002@gmail.com

12/8/2018

# **Game Description**

Our game’s name is “Space Invaders”. The game is about two spaceships placed at the very ends of the screen, where both can move vertically and can fire missiles horizontally. Every player has his own health that is reduced when a missile hits his ship. Some Powers fall in the middle of the screen randomly, like a health packet or a reflecting wall etc... These powers are activated when the players shoot them.

## **Powers functionalities**

The game has four different types of powers.

* Health Packet: It will increase the player’s health by one heart if his health was not maximum and the health packet will disappear once it is used.
* Shield: It will protect the ship from one missile and the shield (#) will disappear once it has been shot.
* Super Missile: which double the damage of any missile going through it.
* Reflecting Wall: A wall that will reflect the missiles when they hit it.

## **In-Game Controls**

* Pause game -> P key

Player one (Ship 1) Player two (Ship 2)

* Move up -> W key Move up -> Up arrow
* Move down -> S key Move down -> Down arrow
* Fire -> Spacebar key Fire -> Enter Key

## **How-to Play**

You should compile our game.asm file using emu8086, that will generate an executable .exe file. But as it’s a 16-bit application and your OS most probably only supports 32/64-bit applications, then use DOSBox to run the .exe file. And now, you’re all-set! Enjoy our game :D.