Space Assailants (1986) – Anschuetz/Weisgerber/Anschuetz

Game Play

Space Assailants is an obvious Space Invaders clone, with some slightly different twists. Instead of avoiding shots fired by the invaders, the player must dodge a starfield that constantly scrolls vertically from top-to-bottom and repeats. The game starts with only one row of invaders. After you clear the first set, the next set requires the player to shoot down two rows of invaders. On the next set, a third row of invaders arrives. The pattern continues until there are six rows of 6 invaders once you reach the 6th level, but the characters in rows 4-6 are a repeat of the same characters used in rows 1-3.

The invaders move across the playfield until they hit one end of the screen, then they drop down a level, reverse direction, and head the other way. The invaders are arranged in a hovering position above their spaceship. Once the spaceship lands at the bottom of the screen, or the player loses all three lives, the game is over. The status banner at the top of the screen indicates the number of lives, the score, and the level. Once the game is over, an end-of-game screen shows you this information and lets you start anew.

The following description of the gameplay was written by the A/W/A Team to be submitted to a computer magazine along with the game.

> In the game Space Assailants, you are earth's lone defender in a battle which takes place in the midst of a treacherous meteor shower. You must protect the earth from an invading fleet of evil aliens, while avoiding the hurtling meteors. Your main concern is keeping the mothership, which leads the enemy armada, from landing. Although your weaponry cannot breach the powerful shields of the mothership, you can prevent its landing by destroying the accompanying fleet of alien vessels. The fleet drops each time it reaches a side of the playfield in its back and forth motion. After the fleet has dropped ten times, the mothership is considered to have landed, and your game is over. If you are able to destroy the fleet before the mothership lands, you will move on to the next round.
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> Rounds one through six consist of an alien fleet which increases in size from six to thirty-six at the rate of six per round. Rounds seven through twelve are exactly like one through six, but the aliens' speed is doubled. During rounds thirteen through eighteen, the aliens move slowly again, but the meteors travel at double speed. In rounds nineteen through twenty-four, both the aliens and meteors move doubly fast. Sets after this remain at the same level of difficulty as sets nineteen through twenty-four.
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> If you are hit by a meteor, you lose one of three lives and must start your current round over. You score ten points for each alien vessel destroyed. Your score is

located at the top and middle of the screen. To its left are lives remaining, and to its right is the round number.

You may only fire one missile at a time, and you must wait until the missile either hits an alien or clears the screen to fire again. As the rounds progress, and there are more aliens to contend with, you will find that the best strategy consists of destroying the end columns of assailants, thus lengthening the amount of time between drops of the fleet. Destroying the bottom row of aliens will not delay the mothership's landing.

Recollections

Space Assailants was primarily written by John Weisgerber and really pushed the envelope with what could be done with Atari Basic. The scrolling stars are actually in a different display list than the invaders, and the two screens are alternated very rapidly (every 1/60th of a second) so the eyes perceive them to be on the screen at the same time. In the screenshots above, only either the invaders or the stars are visible, but the images are combined for the player's experience. There is a flickering effect (like the one criticized so heavily in the Atari 2600 Pac-Man), but the flickering effect wasn't too dramatic on old raster-scan televisions.

The banners on the left and right edge of the screen are Player/Missile graphics. The ship and its shot are also Player/Missile graphics. The stars are low resolution graphics pixels. The invaders are re-defined characters in multi-color mode, and they animate with every move in two different poses. The game makes use of the typical droning vibrato background sound effect used in may A/W/A games to take the place of a background melody.

Eric originally wrote an assembly routine to be run during the vertical blank interrupt that would smoothly move the ship left and write based on joystick controls. It worked perfectly except for one problem: John's technique of allowing for interleaving the two graphics modes disabled the vertical blank interrupt, so you couldn't do both! The game as it stands uses BASIC to move the space ship and so it is not as smooth as it would have been in assembly language.

The technique used in this game to interleave two graphics display modes was definitely not used in any other BASIC game or any other game that the A/W/A Team is aware of!

More information about the technical aspects of this game can be read in the original accompanying article sent to computer magazines, A/W/A Game Write-Ups section of this document.