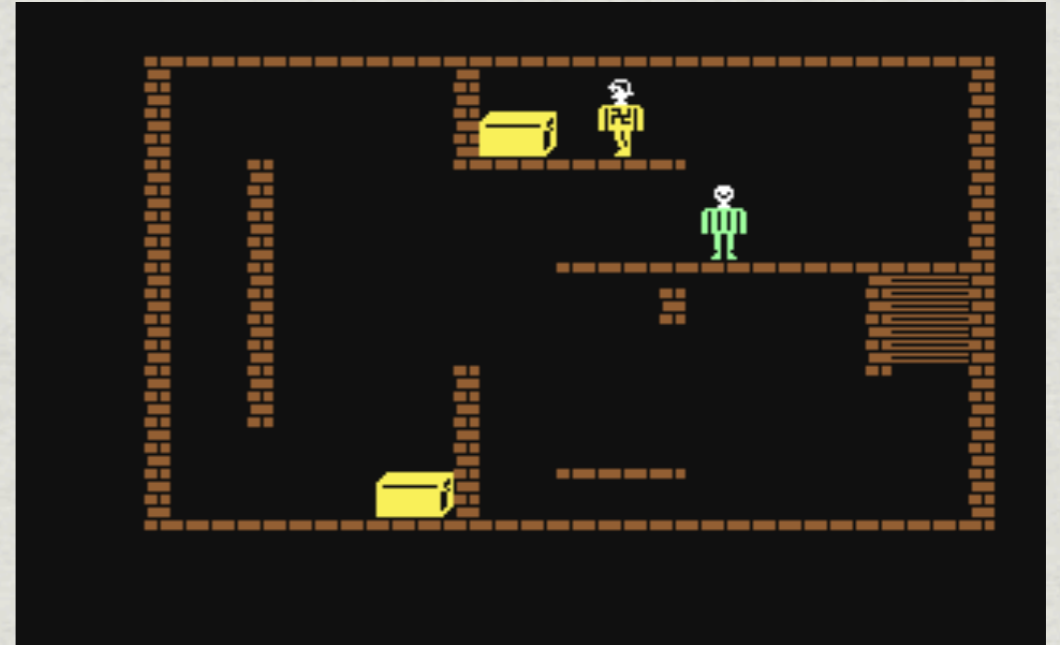


ESCAPE! from the Home Brew Computer Club

What *really* happened the day Woz showed off the Apple II for the first time...

Castle Wolfenstein



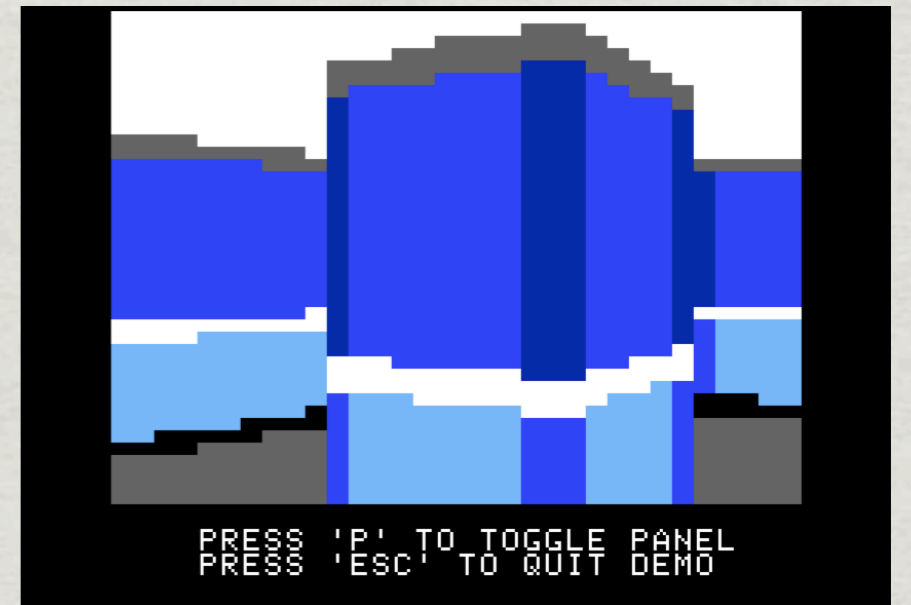
- * One of the first, great Apple II games
- * Cool concept (Silas Warner)
- * Good “bad guys”
- * Primitive top-down room view 280x192
- * Digitized sound

Wolfenstein 3-D



- * Similar concept but less stealth
- * 2 /12 D ray caster 320x200
- * Very high frame rate for 1992
- * Set the standard for all FPS (John Carmack)

DUUM 3-D



- * A bunch of tests to try ray casting on the Apple II
- * Simultaneous sound and joystick reading
- * Would have seemed impossible in 1977
- * Technology demo released January 2007
- * Merlin hosted

The Case For LO-RES

- * 16 colors vs 6 colors
- * Frame rate vs resolution 40x48
- * Fast full screen is more immersive than small window
- * Entire column render code unrolled for 4 cases

Sound And Input

- * Sound is fully CPU driven (speaker toggle)
- * Analog input is fully CPU driven (poll RC charge)
- * Combine two axis analog input with sound gen
- * Don't need full resolution of analog input
- * Critical timing so all code paths of equal length

Maps and Textures

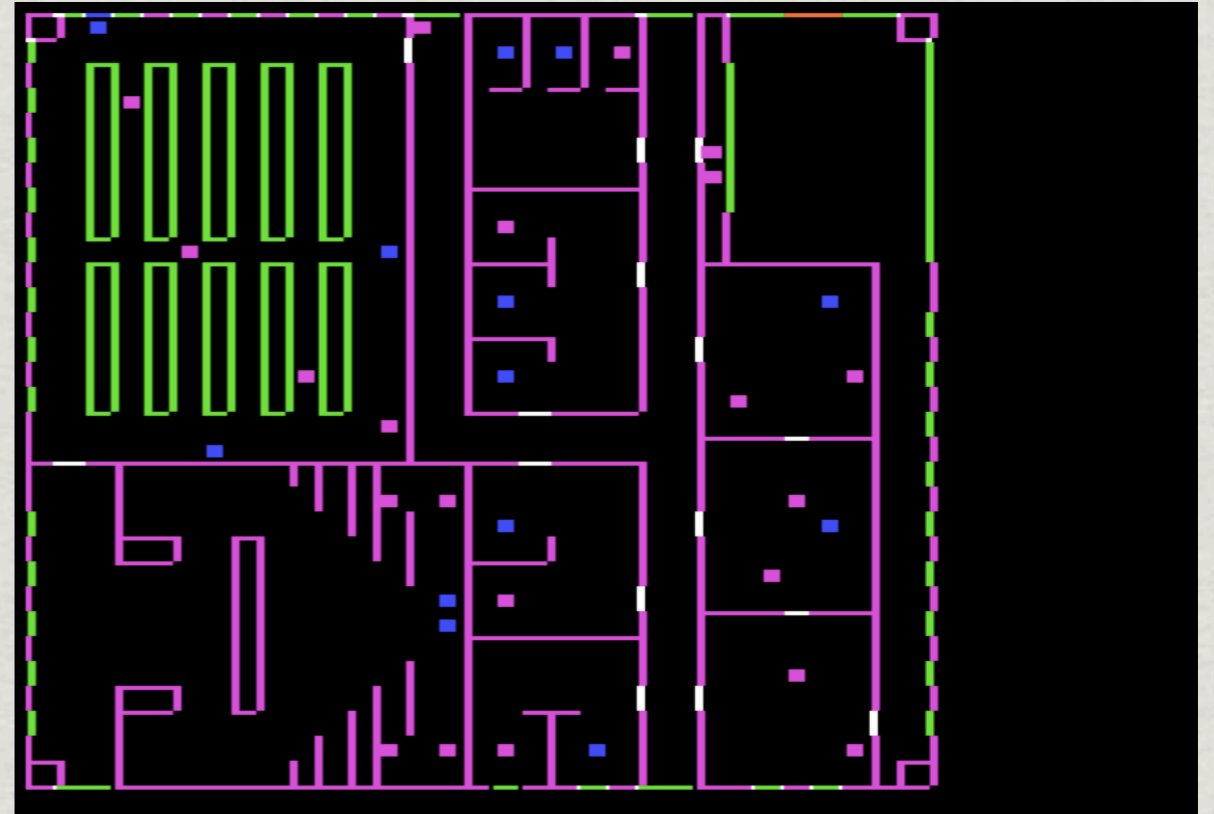
- * 32x32 level map
- * 16x16 textures, 15 colors + alpha
- * Hand-coded maps and textures

HBCC 3-D



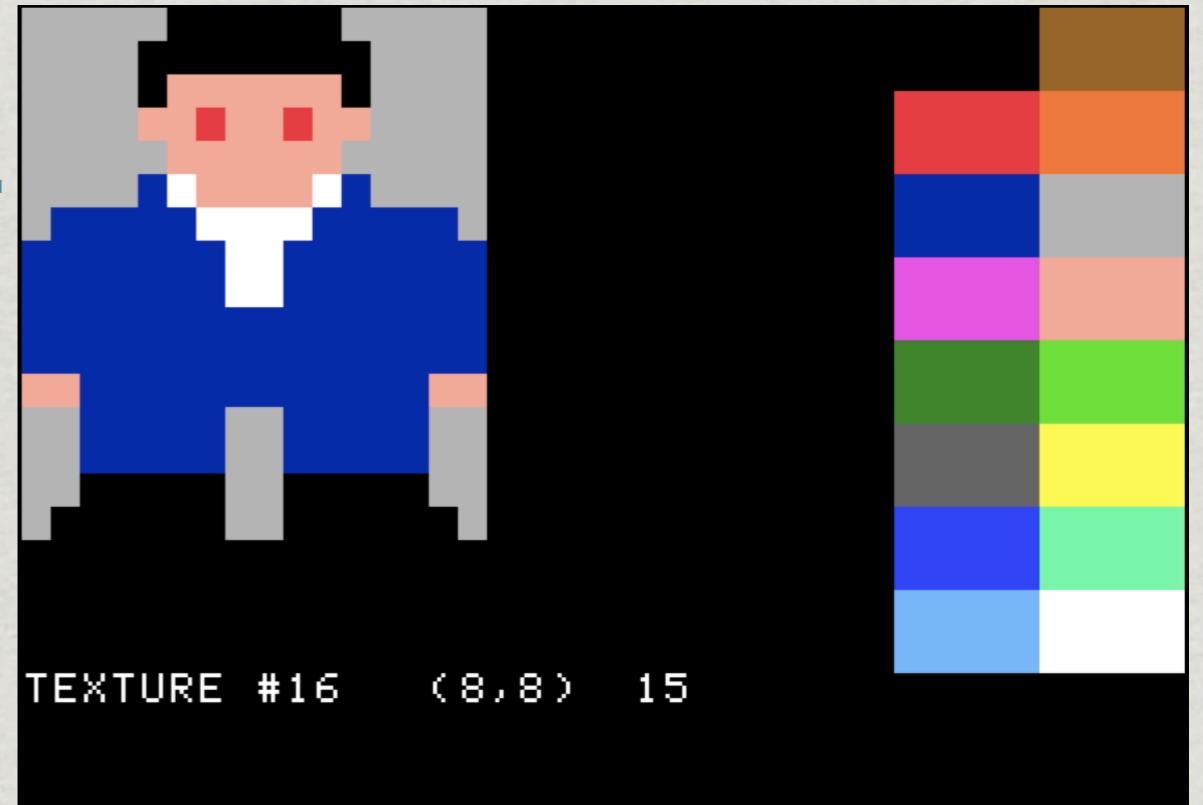
- * Silly concept including Woz and stealth play
- * Added scaled, depth sorted sprites
- * Animated textures and location based texture sets
- * Fairly sophisticated line-of-sight “bad guy” AI
- * Cross developed using CC65

Map Editor



- * Written in BASIC w/ ASM helper
- * Wall, texture, power ups, and bad guy placement
- * Should run in emulated super-speed

Image Editor



- * Written in BASIC
- * Textures and sprites in one file
- * Should run in emulated super-speed

Apple][Forever!

