

Joseph Gallucci  
Mona Jimenez  
Handling New Media  
16 March 2010

### Preservation Considerations for Nintendo's *World Class Track Meet*



Above: Screenshot of title menu for *World Class Track Meet* for the Nintendo Entertainment System.

### Background

*World Class Track Meet* was designed by the Japanese video game developers Bandai in the mid-1980's. Konami had, in 1983, developed a popular arcade game, *Track & Field*, that simulated various Olympic events that required the rapid alternating pushing of buttons to facilitate game play. The game was first released for the Nintendo Entertainment System under its original title of *Family Trainer: Runner Stadium* in Japan on December 23, 1986<sup>1</sup>. Nintendo purchased the rights from Bandai and in September 1987 released the newly dubbed *Stadium Events* stateside. The game made use of a special mat, initially called the Family Fun Fitness Control Mat, which enabled an extra level of physical interaction with the video game beyond simply controlling a character with a joystick. Nintendo rebranded the mat as the Power Pad in 1988, and subsequently also re-titled *Stadium Events* as *World Class Track Meet*. All three games are essentially the same in look and feel, with the exception of their title screens. *World Class Track Meet* was made available both as an individual NES title and combined with two other games on a cartridge (often referred to as a "multicart"), the original *Super Mario Brothers* and *Duck Hunt*. In December of 1988, Nintendo began to sell a "Power Set" bundle that contained this multicart, a Power Pad, a Zapper (an accessory used for *Duck Hunt*), and two NES controllers, which was initially priced at about \$150<sup>2</sup>.

<sup>1</sup> <http://www.gamefaqs.com/console/nes/data/587781.html>.

<sup>2</sup> Jeffrey A. Tannenbaum. "At Consumer Electronics Show, Gimmicks Abound – But Is There a New Blockbuster?" *Wall Street Journal* (Eastern edition). New York, NY: 8 June 1988, 1.

Only eleven games were created for use with the original Power Pad, including *Athletic World*, *Super Team Games*, *Street Cop*, *Dance Aerobics*, and *Short Order/Eggplode*. While the Power Pad sold significantly when first released, its success proved to be short-lived, perhaps on account of The Power Pad's limited functionality. The Power Pad can be seen as a precursor to other step-based interactive video games such as *Dance Dance Revolution*, a popular arcade game that requires the player to complete a series of dance moves on a 3x3 keypad. In the mid-to-late 2000s, there grew an increasing interest in active gaming<sup>3</sup>, exemplified by the enormous popularity of Playstation 2's *Guitar Hero* franchise and the Nintendo Wii entertainment system, whose lightweight remote could be used as a virtual implement for bowling, golf and tennis games. *Active Life: Outdoor Challenge*, which was released for the Nintendo Wii in the US in September 2008, uses a pad very similar to the Power Pad, which can be used in conjunction with the Wii Remote.



Above: *The Power Pad, side B.*

### Game play

The Power Pad consists of a 4'x4' vinyl mat, inside of which are twelve buttons that are activated by pressing down on them with one's foot. There are two sides to the mat, side A and side B. On the whole, side A, which only utilized eight of the twelve pads, was used significantly less than side B, which features all twelve pads arranged in a 4x3

---

<sup>3</sup> Blake Hannon, "Active gaming: Today's gaming and consoles provide a more interactive experience." *Knight Ridder Tribune Business News*, 28 June 2007, 1.

pattern (Side B was not used at all for *World Class Track Meet*). The six blue-colored pads on the left designate the Player 1 position; the six red-colored pads on the right belong to Player 2.

The Power Pad works through sensors placed underneath each “button”. The mat is hooked into the Nintendo Entertainment System console’s second port (P2). The first port (P1) can be used to output the standard NES controller, which may be used to determine the player’s desired game options. When a player steps on a button, a bit is set in the data stream into P2. Two 4021 shift registers record the state of each button and send their data to the console simultaneously; the action is translated into the space of the game, depicted on the monitor<sup>4</sup>.

The Power Pad as it pertains to *World Class Track Meet* helps perform two primary functions. Running is accomplished by alternately stepping on two of the pad’s consecutive buttons, which simulate those used on the standard Nintendo game controller. The faster the player moves, the quicker his or her character will run in the game. If a player jumps in the air, thus removing both feet from the Power Pad, the player’s character will likewise jump in the air.



---

<sup>4</sup> Tennessee Carmel-Veilleux. “Power Pad information”, version 1.2, created 12 March 2000, accessed 16 March 2010, <http://nesdev.parodius.com/powerpad.txt>.

*Above: Screenshot of two-player 100m dash mode for WCTS. Player 1 is squaring off against Turtle, the slowest computer-controlled opponent in the game.*

*World Class Track Meet* contains six levels of gameplay which involve some combination of running and jumping: the 100m dash, the 110m hurdle, the long jump, the triple jump, the Olympics (a combination of the previous four levels), and a tournament competition in which a single player “faces off” against six bosses – each represented by an animal, from turtle (slowest) to cheetah (fastest) – to try to win as many gold medals as possible. Players are instructed to wait until the gun goes off before they begin to run. Two false starts leads to a disqualification and hence a loss.

### Risk factors

As with many video games made before a certain year, obsolescence is the number one risk factor in the preservation of *World Class Track Meet*. Nintendo has long stopped making games for its original entertainment system, and all special equipment affiliated with its games have long since gone extinct as well. This includes the controllers, the Power Pad, the Zapper, and any number of other special devices manufactured solely to be used for the NES console.

The materiality of the Power Pad also needs to be taken into account when drafting a preservation plan. The Power Pad is made of two layers of thin vinyl with small pads cushioned in between it. While the pads were designed to withstand pressure from the average human body, there were still numerous reports at the time from “hardcore” gamers of the Power Pad tearing or simply ceasing to function due to the exertion of excessive weight and force. Both the flimsiness of the pad and the sensitivity of its sensors need to be taken into account for the long-term preservation of the Power Pad.

### Preservation issues

One of the initial tasks that a preservationist tasked with retaining the digital information must first face is deciding which incarnation of the game should be captured. As mentioned in the background section, the game went through multiple iterations in its brief existence, and was marketed under different names in different countries. The North American release of *Stadium Events* enjoyed an extremely brief existence thanks to Nintendo’s last-minute rebranding decisions; as such, less than a thousand copies were ever sold in stores before the game was repackaged as *World Class Track Meet*. As such, this particular iteration of *Stadium Events* is one of the rarest video games in existence; in February 2010, a seller on eBay netted over \$13,000 for a mint condition version of the game in its original container<sup>5</sup>. Given the limited lifespan of *Stadium Events*, it would be much easier for the preservationist to track down *World Class Track Meet*, which is still widely available through used video game retail outlets and online stores such as Amazon

---

<sup>5</sup> Michael Sheridan, “Classic Nintendo NES console nabs \$13G on eBay for rare ‘Stadium Events’ game”. *NY Daily News*, 14 February 2010, accessed 15 March 2010  
[http://www.nydailynews.com/tech\\_guide/2010/02/14/2010-02-14\\_classic\\_nintendo\\_nes\\_console\\_nabs\\_13g\\_on\\_ebay\\_for\\_rare\\_stadium\\_events\\_game.html](http://www.nydailynews.com/tech_guide/2010/02/14/2010-02-14_classic_nintendo_nes_console_nabs_13g_on_ebay_for_rare_stadium_events_game.html).

or eBay. As noted earlier, all of the iterations of the game, from its original Bandai release in Japan up through its inclusion on the North American multicart and all international versions, are essentially exactly the same (language barriers notwithstanding) with no significant difference in functionality.

“Active games” such as *World Class Track Meet* necessarily require not just the preservation of the 8-bit digital information of which the game is composed but also the preservation of the actions associated with the game as it was originally played. The game was intended to function as a kind of exercise platform that utilized novel video game technology. While there are multiple emulators that can process the 8-bit information from the game itself, nothing can emulate the experience of running and jumping necessary to play the game itself. At best, any emulator can only hope to capture a repetitive pressing of keys on a computer keyboard, much in the style of Konami’s *Track & Field* arcade game from 1983.

Another option for the preservationist would be to maintain a working NES console on which one could play *World Class Track Meet*. In this sense, the actions associated with the Power Pad would be preserved as one could actually play the game in its initial configuration. The problem with this approach to preservation is the upkeep necessary for not just the Power Pad but also the NES console itself, the actual cartridge that contains the video game and the controller used to select the player’s preferred game, all of which are integral to the function of the game but none of which are still produced by Nintendo anymore. Both emulation and preservation of the original NES technology thus each present their own issues.

At present there appear to be no plans for the preservation of either *World Class Track Meet* (in any of its various incarnations) or its associated equipment. The technology behind the Power Pad still exists in a different form, the Active Life Mat associated with the game *Active Life: Outdoor Challenge* and its sequel *Active Life: Extreme Challenge*, both released for the Nintendo Wii. The pad works in a similar fashion to the Power Pad, with players stepping and jumping on touch-sensitive buttons cushioned within a vinyl mat to complete simulated running/track and field exercises. The pad is not backwards-compatible with the Nintendo Entertainment System, nor could one play *World Class Track Meet* on the Nintendo Wii.

At the very least, it is suggested that a video game archivist who is tackling the problem of preserving *World Class Track Meet* should record the data logarithms that dictate the user interaction between the Power Pad and the game<sup>6</sup>. While this merely records the functionality of the game, it also demonstrates the basic circuitry that Bandai engineers employed in the creation of the game. While these strategies for preservation are purely documentary and hence superficial, there will still be some record of how the Power Pad functioned should it completely cease to exist.

---

<sup>6</sup> Tennessee Carmel-Veilleux’s guide to the technical specifications of the Power Pad supplies a basic - if not terribly clearly written – example of these algorithms (cf. footnote 4),