





Video Game & Calculator History Preservation





















Chuck McCord September 2025









Video Game History Foundation @ PAX | PAX West

youtube.com/watch?v=AMhgeWLdmH8

Preserving Stuff at the Video Game **History Foundation**





Agenda

- Calculator/Video Game Markets
- Archival Information- Where does it go?
 - Options (Choices)
 - Libraries
 - Companies & Preservation
- Examples
 - Game Informer
 - Computer Entertainer
- Super-collectors & Distinguished Presenters
- Preservation
 - Our roles
 - Preservation Champions
 - Video Game Foundation Setup



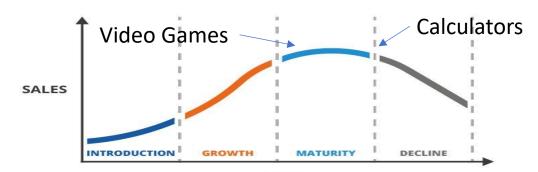
Questions to ask ourselves

Calculator/Video Game Markets

PRODUCT LIFE CYCLE

2024 Calculator Market: \$1.2B

2024 Video Game Market: \$298B

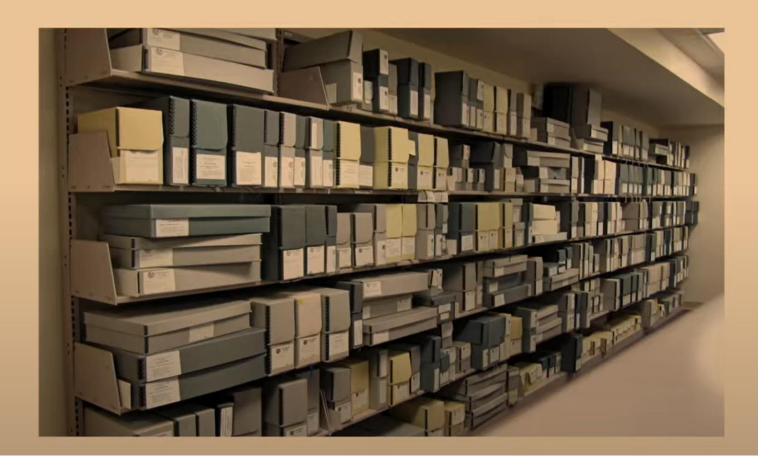


Prod	ucts &	Intro D	ates													TIME							
Year	1972	1973	1974	1975	1976	1977	1978	1979	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994
	HP-35	HP-80	HP-65	HP-55	HP-67	HP-290	HP-27	HP-34C		HP-120	HP-10C	•				HP-10B	HP-14B	HP-20S	HP-17BII	HP-32SII			
		HP-45	HP-70	HP-25	HP-25C	HP-10	HP-31E				HP-150					HP-43S	HP-17B	HP-21S					
				HP-21	HP-97	HP-19	HP-32E				HP-160					HP-28C	HP-19B						
				HP-22		ı	HP-33E										HP-22S						
						l	HP-37E										HP-23S						
						l	HP-38E										HP-32S						
						l	HP-38C										HP-28S						
Game Company		any																					
Atari			Home Pong			2600 400/800)	5200				130xe								Jaguar	
Nintendo					Famicon			า	NES			Gamebo		У	SNES								
Sega										ter Sys	tem		Genesis	Game Gear		r			32x				
Coleco						Col	Coleco Vision			Coleco Adam													
Comi	modore	<u> </u>				Pet				Cor	nodore	64		128									
Comi	modore	2												Amiga									



Source: Google AI

Archival game material - where does it go?





Archived Material: Where does it go?

Option One: Just Put It Online

- · Universal access! Anyone can have it!
- But only if they can find it
- And if they know it's out there to find
- And if it's still online when they look (can I get a reseed?)



Option Two: Donate It

- Cataloged and retrievable (librarians are amazing!)
- Maintained forever (conservationists are amazing!)
- On-site only (hotels are expensive!)
- Restricted usage (don't post it!)
- Almost entirely physical (how do you ctrl+f paper?)
- Extremely risk-averse (unlikely to ever leave or get copied)
- Museums don't handle materials they don't own

Dedicated Alternatives

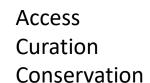


Hpcalc.org
Hpmuseum.org
Groups.io
Pahhc.org
Hpcc.org



Access
Curation
Conservation





86888



Libraries

The Industry* Hates Libraries

- Libraries cannot legally provide remote access to games
- There is no logistically-feasible way to legally preserve digital games, all we can do is shelve physical ones
- We did about all we can to mitigate concerns and find a compromise, but the industry won't budge
- The industry has chosen to sacrifice 87% of its history because you might accidentally have fun playing it

*As represented by the Entertainment Software Association

Don't send a prototype to a video game museum unless you don't want anyone to look at it.

This is different for the calculator industry. Developers, users, libraries, museums, & other preservationists are working cooperatively, productively.



Companies & Preservation

Companies Are a Black Hole

- Game companies, especially large ones, are legally conservative
- Your work may be headed to the shredder, and I mean that literally
- And even if they kept it, they're not showing it to anybody
- ...and it'll end up in the shredder anyway

- Companies' focus on P&L, IP protection, & changing goals is often not conducive to preservation/conservation
 - Even when it is in their best interest (e.g., lost calculator ROM codes)
- The HPs have recognized the value of preservation and are sponsoring Heritage Works
- The time to preserve ongoing development work is now...



Game Informer Example











By sheer size and density, this was the most important intact collection of video game history in the entire world and it wasn't even close.



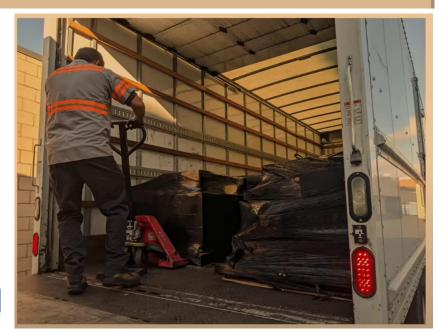
Preservation Project

The challenges

- · Owners wanted to keep their collection in the office
- Copyright and relationship concerns (they still did business with these companies!)
- Insurmountable volume (no way staff could get through it)
- Business uncertainty

The solution

- Frank & a team of volunteers relocated to Minesota for 5 weeks
- Institution trust & industry experience opened doors
- Showing the work every day builds enough trust for a donation change of heart



May 2019:







May 2019

- ~70% of collection archived/digitized
- 25Tb+ of data

June 2019

to be cont'd next year

March 2020

COVID

August 2024

Game Informer shut down

Game Informer reborn

Closets, Game library lost ☺



Computer Entertainer





The Video Game History Foundation acquired the rights to the Computer Entertainer magazine.

Computer Entertainer takeaways

- A library would have taken in the physical volumes and provided on-site access, but likely wouldn't have scanned it.
- Institutional trust made this possible (can't say this enough!)
- The approval process to destroy our duplicate volumes for proper scans was a five-minute conversation
- · Searchable, readable, and downloadable on our website
- Same lessons learned as with calculator literature preservation



Super-Collectors

- We know who we know. We don't know who we don't know. (e.g., Francis Hookham Collection at Whipple Museum).
- Super-collectors want to maintain control/ownership of their collection
- Super-collectors are often open to having professionals copy and share their collection
- We need to continue to:
 - Identify opportunities to copy/scan super-collectors' collections
 - Encourage known super-collectors to have directives
 - Try to identify "sleeper" super-collectors (forums?)



A personal collection



Frank copying the personal collection



Distinguished Presenters

Preservation is not just about preserving stuff – it is also about preserving peoples' stories.



- "HHC serves as a meeting place for collectors, programmers, and former HP engineers to share their knowledge and passion for these products."*
- HHC has a long history of Distinguished Presenters that have shared their knowledge and experiences.
 - Dave Cochran, Dave Conklin, Bill Wickes, Bernie Musch, Don Morris, Dennis York, Eric Vogel, Henry Horn, Jim Donnelly, Cyrille de Brebisson, Fred Valdez, Tim Wessman, Sam Kim and *many* others...
- We need to continue to solicit & encourage these presentations...



We all have a role in Preservation

- "If you see something, say something" @
 - When you encounter something interesting share it with community- get a scan/copy in archives
- We are subject matter experts, we are in the best position to gauge relevance

- This group has been doing excellent work identifying and preserving history!
 - The conference drive is an excellent resource.



Preservation Champions

"a persistent advocate who promotes an idea or cause"

- Defined by an unwavering support for preservation
- Self Motivated
- Often uncompensated
- Library skills (indexing, categorization)
- Scanning/OCR expertise
- Media duplication expertise
- Websites to share/disseminate information
- Storage technology skills
- Database skills



Video Game History Foundation Setup

Step One: Hire a Librarian

Step Two: Invent Multiple Things

- OCR that actually works
- A fair use argument for out-of-print magazines
- A custom frontend
- Complete catalog of all video game magazines
- Scanning tools and processes
- Buying duplicates to scan
- Selling duplicates to fund
- Partnering with community scanners

Calculator preservationists (especially Preservation Champions) have done the same (or very similar) Step Two things.



Next Steps...

Forget about how things are done now, how do *you* want things to be done?

Questions to ask yourselves (and others)

- Does the ESA's anti-library stance actually represent your values? If not, what can you do about that?
- How can you advance historical preservation within your circles? How can you promote change from within?
- Can your company help game preservation efforts?



Questions to ask yourselves (and others)

- If you're donating your materials: What do YOU want to happen to it? How do YOU want it accessed? Is what's being offered good enough for you?
- If you're an archive: Is your institution the best home for a particular item?
- If you're donating money: How do YOU want your money spent? Is your money going toward initiatives that speak to your values?

Get involved, however makes sense to you. Don't rely on any institutions, even ours, to save you. All we've got is each other, but I promise it's enough.



Thank You!!!

...Questions?





Classic example of what we don't want to happen to priceless collections...

