

# Software Preservation



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# What's all this then?

- A bit about ABUG
- What is software preservation?
- How you can help!

# ABUG (Acorn and BBC User Group) updates

- About us -
  - Founded by members of the Stardot forums (<https://stardot.org.uk/forums/>)
  - In-person gatherings since 2014, online since this year (2020)
- BBC Micro - source code
  - MASM Assembler 1.15, MOS 1.2, BBC BASIC (various versions), DNFS v3, 6502 TUBE ROM
- 65Host/65Tube emulator v1.0 (and unreleased 65Turbo emulator)
  - 65Turbo emulates a “Turbo” 6502 co-pro with extra RAM
  - <http://4corn.co.uk/articles/65hostandmos/>
- This was only possible with the help of the community
  - Stuart Swales, Paul Fellows
  - ABUG Preservation Team

# Current ABUG preservation WIP

- Standard file management scheme
  - Allows us to delegate management to individual maintainers (or teams)
  - Consistent file naming scheme
  - Policies for completeness and correctness of submissions
- Content management system
  - Present the things we've archived in a clear, accessible way
- Identify what's out there and mirror it
  - Find online archives (and no-longer-online ones)
- More info: <https://stardot.org.uk/forums/viewtopic.php?f=81&p=288918#p288876>

# Software preservation in a nutshell

- It is what it says: preserving the history of our platform for the future
  - Specifically the software - games, applications, utilities
  - Without the software, the data is useless
  - Lots of innovative software which in some cases pre-dated that on other platforms
- Image the contents of floppy discs (diskettes) and CDs
  - Floppies: [Greaseweazle](#), [DiscBeast](#), [DiscFerret](#), Kryoflux
  - CDs: A CD/DVD/BluRay drive, 'dd', 'ddrescue' and 'cdrdao'
- Scan manuals, keystrips, other paper materials

# The harder bits - making things accessible (ABUG APT)

- Clean up scans and images
- Check disc images for damage - repair if possible
  - Viruses, bad sectors, copy protection (e.g. install credits used up)...
  - Merge duplicates with issues (e.g. bad sectors) into one 'good' copy
- Remove any user data
  - Sometimes hard to identify 'user' data from tutorials (having the manuals helps!)
- Identify hidden, potentially interesting data or metadata
  - Mastering data (TRACEBACK) - date of duplication
  - Fragments of other software (dev tools, mastering) or files
- Convert to agreed, open formats
- Make the results available

# Why now?

- We're on borrowed time
  - Floppy disks and CDs don't last forever.
  - We're well past the 10 year expected lifespan of floppies (closer to 30!)
    - Mould, weakening magnetic field, poor media/binder quality (sticky-shed), effects of nearby magnets...
  - Cheap CD-Rs have a similar lifespan
    - "Laser rot", dye degradation, poor recording quality (no leadout)...
- Some games archived -- but not many applications
  - JASPP (primarily games) -- and ADFFS software disc image emulator
  - Until now, there has been no major effort (that we're aware of) to preserve non-game software

# Archiving your own data

- Need a floppy drive and a RISC OS computer, or “flux imager”
  - Best current options - Greaseweazle or Discbeast
  - Kryoflux works too, if you have one
- RISC OS computer - archiving data
  - ADFFS or DImager - Produces an ADF (Acorn Disc Format) image
  - Doesn't record mastering information or 'odd' formats - but good for “data” disks
- Need to be careful
  - These are old disks - up to 30 years old
  - Poor storage or poor media quality causes issues
    - Mould, sticky-shed (failing binder), poor recording quality...
- If you have something potentially rare - talk to us first.
  - ABUG Preservation Team can help



# How you can help

- Take a look in those old disk boxes - maybe you have something we don't?
- Duplicates are good too!
  - Useful for fixing errors and undoing modifications (registration, high scores, viruses ...)
  - Might be a different version which hasn't been archived
- Maybe you know someone who wrote software in the 'old days'?
  - Put them in touch!
  - Source code and release permission is gold - but binaries are as almost good!
- Talk to us!
  - Stardot forums: <https://stardot.org.uk/forums/>
  - Discord: <https://discord.com/invite/pRy44Wz>
  - E: [philpem@gmail.com](mailto:philpem@gmail.com) or [philpem@philpem.me.uk](mailto:philpem@philpem.me.uk)

# Thanks!

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