

# Whole-system EDRMS Preservation

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 **Stabilize**  
Solving digital infrastructure obsolescence

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 **GATES  
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# Agenda

1. New opportunities for managing EDRMS lifecycles with whole system preservation  
(Euan - Stabilize, 10 Minutes)
2. Case Study: Emulating Legacy Systems at Gates Archive  
(Sally, Andrew, Gates Archive, 10-13 minutes)

# Retain Access to Legacy Systems

EDRMS  
(e.g. Objective,  
OpenText,  
Documentum)

Intranets  
(e.g. Notes/SharePoint)

Databases  
(e.g. MSSQL, Oracle)

CRM Systems  
(e.g. Dynamics)

Web Servers

ERP Systems  
(e.g. SAP, Odoo,  
PeopleSoft)

# New opportunities for managing EDRMS lifecycles

- ✓ Secure access to entire EDRMS and other records-containing systems past end of support
- ✓ Recover live-access to entire legacy systems (e.g. EDRMS) from backups
- ✓ Insure against data loss and ensure legal compliance during system upgrades or records disposal projects
- ✓ Retire legacy systems gracefully in stages (transfer records **and** retain)

# Demo

Available at <https://stabilize.app>

And <https://youtu.be/tvdJq-4kSDw>

# New opportunities

1. Retain access to entire EDRMS indefinitely
2. Transfer records to an archive and retain access to the original EDRMS in non-edit mode
3. Gracefully “sunset” legacy systems with a phased retirement approach
4. Recover records locked in legacy data backups
5. Respond to records access requests quickly with print-to-PDF and data export tools

# Thank you

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Case Study:  
Emulating Legacy  
Systems at Gates  
Archive



# Why did we start on this emulation journey?



## High-value legacy systems

Donor organization was retiring several legacy systems core to business operations and we knew majority of records in these systems were of high value.

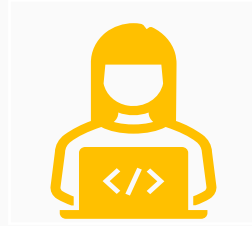
Some were **custom web applications**, other were **SharePoint-based applications**. We also have other software in our holdings.



## Don't reinvent the wheel

Considered flat exports from systems or SQL backups but making meaning of data or reconstituting the records requires queries. The **original, custom applications provide optimized, built-in ways of accessing complex data**.

# Other considerations before we decided to emulate



## Tech support

We knew we would want **vendor support** for emulation.

We also knew we would need **system administration support** to set up complex networked applications in an emulator. Consumer software and other applications with more straightforward installation processes can be set up directly by archivists.



## Information security

Old software has vulnerabilities. We are working closely with Stabilize and information security to **ensure we can emulate systems and output data while keeping our networks safe.**

## Donor decommissioning process



**System 1 - SharePoint application** – Donor exports  
.cmp file(s)



**System 2 - Custom web application** – Donor  
packaged up:

- .vhd files
- several SQL backups
- spreadsheet with system requirements

# Metadata

	Mainstream Support End Date	Extended Support End Date	System 1	System 2	System 3
Lifecycle Stage			Migrate/Modernize	Migrate/Modernize	Inactive
Deprecated Date!					
Score			● 0.00	● 0.33	● 1.40
Weighted Score			● -0.43	● 0.47	● 1.28
<b>Type</b>					
<b>Platforms</b>					
Dynamics CRM x.x	1/1/1950	1/1/1960	Sunk		
Dynamics CRM xxxx	1/1/2020	1/1/2025			
SharePoint xxxx	1/1/1940	1/1/2060			Sinking
SharePoint xxx	1/1/1960	1/1/1970			
<b>Infrastructure Applications</b>					
Internet Explorer xx	1/1/1990	1/1/1995			
.NET x.x	1/1/2001	1/1/2007		Sunk	
.NET x.x	1/1/2010	1/1/2012	Sinking		
.NET x.x	1/1/2020	1/1/2050			
ASP.NET x	1/1/2030	1/1/2050			Floating
ASP.NET CORE x.x	1/1/1991	1/1/2001			
Silverlight x	1/1/1980	1/1/1990			
Silverlight x	1/1/2000	1/1/2030			Floating
SQL Server xxxx	1/1/2030	1/1/2040		Sinking	

## How we set up applications in Stabilize



**System 1 - SharePoint application** – create machine in Stabilize, install Sharepoint with license keys, load CMP data, create user accounts.



**System 2 - Custom web application** – Import .vhds into Stabilize. If needed, Create SQL machine and restore databases. Use Stabilize networking to interconnect machines.

# Emulation challenges – application transfer and setup



## Process tweaks

Ensuring donor creates **local accounts** prior to transfer

Asking for all **system documentation** and diagrams

Being **generous with time estimates** for complex application setup



## Future work required

Where to **source copies of legacy software** needed to run systems?

What **metadata is needed to support standard accessioning?**

What standard process can we use to determine if we choose **to emulate a system or migrate it?**

# Current and future state of access to emulated applications



## Current state – early successes!

- Have emulated one major legacy system and nearly have the second running. Have already used to serve an access request!
- Small number of emulated systems mean archivists ‘know where to go’ to use these.
- Access to systems is internal, with archivists doing research in systems and outputting needed information.



## Next steps – scaling up

- Creating consistent metadata and placing links to emulated systems in our collection management and access systems.
- More training and documentation on complex legacy systems so future users know how to use them – e.g. piloting recording a user walking through common uses before retirement.

## **Benefits**

**Appraisal** – ability to work with data in original application

**Ready access** – we have already served an access request from an emulated application

**Migration** - Can make more deliberative choices about future migration

**System and environment segmentation** – ability to run legacy application with lower risk than if it was 'live'



## Questions?

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