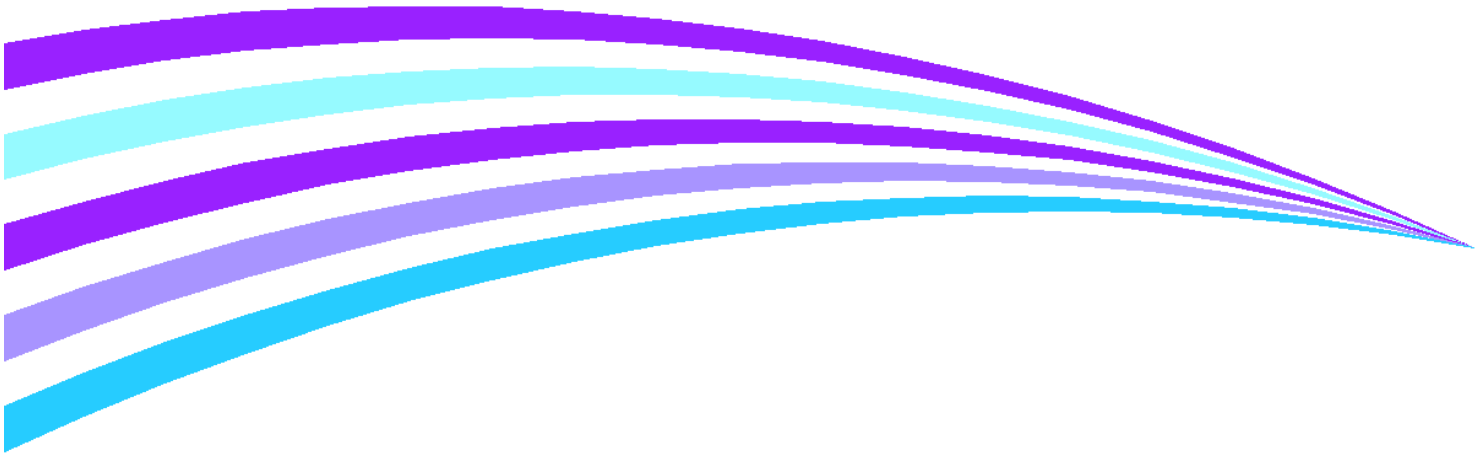
ConnectKey 2.0 WorkCentre 5945i/5955i 5945/5955

Statement of Volatility

Version 1.0

Document Version: 1.0 (April 2016).



Notice

This document describes the locations, capacities and contents of volatile and non-volatile memory devices within the WorkCentre 5945i/5955i. Also included are older 5945/5955 devices that have 073.091.075.34540 or later firmware.

The context of the information in this document is that normal means of access or data extraction are being attempted in order to reproduce, read, or extract stored or latent data. This does not include attempts to reproduce, read or extract data or reverse engineer storage methods by individuals or organizations with advanced skills or with extraordinary resources and measures or specialty equipment not normally available in the industry or to the public.

The content of this document is provided for information purposes only. Performance of the products referenced herein is exclusively subject to the applicable Xerox Corporation terms and conditions of sale and/or lease. Nothing stated in this document constitutes the establishment of any additional agreement or binding obligations between Xerox Corporation and any third party.

Introduction

The WorkCentre products are used to perform the following tasks:

- Printing
- Copying
- Scanning
- Faxing

This document describes the amounts and types of memory contained in the device in an easy to read tabular format. To allow security issues to be addressed as needed, specific commentary has been included about potential locations of job data and Personally Identifiable Information (PII).

The information contained in this document has been verified at the time the product is released for sale. Manufacturing process changes may require that memory amounts are increased but, the purpose or contents of the memory should not change.

General Memory Information

Volatile Memory

All volatile memory listed is cleared after power is removed (decay occurs generally within 20 seconds at room temperature).

All volatile memory listed is required for normal system operation and during service and diagnostic procedures.

Removal of any volatile memory will void the warranty.

Non-Volatile Memory

All non-volatile memory listed is required for normal system operation and during service and diagnostic procedures.

Removal of any non-volatile memory will void the warranty.

Non-volatile memory in the system cannot be accessed by accidental keystrokes.

Controller Module

Volatile Memory				
Type (SRAM, DRAM, etc.)	**Size**	**User Modifiable (Y/N)**	**Function or Use**	**Process to Clear:**
DDR3 SDRAM non ECC – System Memory	2GB	N	Executable code, Printer control data, temporary storage of job data	Power Off System
DDR2 SDRAM non ECC – Image Memory	1GB	N	Image data - copy/scan/print/Fax	Power Off System
DDR2 SDRAM non ECC – Page Buffer	512MB	N	Scanner image page buffer	Power Off System
DDR2 SDRAM non ECC – Page Buffer (Pyxis)	512MB	N	Scanner image page buffer	Power Off System
SRAM	1MB	N	JPEG image processing buffer	Power Off System
Additional Information: There are two main blocks of Volatile memory in the controller, System and Image memory. System memory contains a mixture of executable code, control data and job data. Job data exists in System memory while the job is being processed. Once the job is complete, the memory is reused for the next job. Likewise, image memory holds job data in a proprietary format while the job is being processed. Once the job is complete, the image memory is reused for subsequent jobs.				

Non-Volatile Solid State Memory				
Type (Flash, EEPROM, etc.)	**Size**	**User Modifiable (Y/N)**	**Function or Use**	**Process to Clear:**
SD CARD	4GB	via Diagnostics	Control set points, configuration settings, Boot Memory	Diagnostic
EEPROM	1Mb	Via Diagnostics	Programs Taurus ASIC	Diagnostic
EEPROM(Pyxis)	1Mb	Via Diagnostics	Programs Taurus ASIC	Diagnostic
Flash	38KB	Via Diagnostic	Boot sector for power manager, MAC address	Diagnostic
Battery Backed SRAM	6kB	Via Diagnostic	Power manager variables	Diagnostic
Additional Information: All memory listed above contains code for execution and configuration information. No user or job data is stored in these locations.				

Non-Volatile Hard Disk Memory					
Drive / Partition (System, Image):	**Removable Y / N**	**Size:**	**User Modifiable: Y / N**	**Function:**	**Process to Clear:**
System Disk / System partition	No	27GB	N with normal operation	Operating System, Fonts, configuration file storage.	Diagnostic Procedure
System Disk / Image partition	No	48GB	N with normal operation	Job Images	Diagnostic Procedure

Media and Storage Descriptions					
Type (disk drives, tape drives, CF/SD/XD memory cards, etc.):	**Removable Y / N**	**Size:**	**User Modifiable: Y / N**	**Function:**	**Process to Clear:**
None					

RFID Devices	
RFID Device and location	**Purpose**
RFID reader in IOT	An RFID reader in the print engine reads tags on consumable supplies, e.g. toner.

USB Port(s)	
USB port and location	**Purpose**
Front panel – 1 Host port	User retrieves print ready files from Flash Media or stores scanned files on Flash Media. Physical security of this information is the responsibility of the user or operator.
Rear panel – 2 Host ports	User retrieves print ready files from Flash Media or stores scanned files on Flash Media. Physical security of this information is the responsibility of the user or operator. Optional security devices, such as a CAC reader, communicate with the machine via this port. No job data is transmitted across this interface when an optional security device is connected.
Rear panel – 1 Target port	User PC direct connection for printing, Xerox Customer Service Engineer PWS connection for problem diagnosis. The optional Copy Assistant kit communicates with the machine via this port. No job data is transmitted across this interface.
Additional Information A number of devices can be connected to the 3 USB Host ports. Once information has been copied (either as a back-up data set or as a transfer medium, physical security of this information is the responsibility of the user or operator.)	

Marking Engine Modules

Volatile Memory				
Type (SRAM, DRAM, etc.)	**Size**	**User Modifiable (Y/N)**	**Function or Use**	**Process to Clear:**
DRAM (MCU PWBA)	32M x 16 bit	N	Temporary Storage of variables	Power Off System
RAM (UI PWBA)	1kbyte	N	Temporary Storage of variables	Power Off System

Non-Volatile Solid State Memory				
Type (FLASH, EEPROM, etc.)	**Size**	**User Modifiable (Y/N)**	**Function or Use**	**Process to Sanitize:**
Flash (MCU PWBA)	16Mbit	N	Permanent storage of program. User image data are not stored.	Not customer alterable.
EEPROM (LED Driver, PWBA, K)	128Kbit	N	Permanent storage of setup data.	Not customer alterable.
EEPROM (MM PWBA)	128Kbit	N	Permanent storage of parameters and setup data. User image data are not stored.	Not customer alterable.
EEPROM (UI PWBA)	1kbit x 2	N	Permanent storage of setup data. Storage of UI error log data	Not customer alterable.
EEPROM (DADF PWBA) LOW (PF2.01) or HIGH(PF2.02)	16Kbit	N	Permanent storage of DADF configuration code. User image data are not stored.	Not customer alterable.
EEPROM (TM PWBA)	2kbit	N	Permanent storage of TM configuration code. User image data are not stored.	Not customer alterable.
Flash or ROM (UI PWBA)	32kbyte	N	Permanent storage of UI executable code. User image data are not stored.	Not customer alterable.
ROM (DADF PWBA) LOW (PF2.01) or HIGH(PF2.02)	256kbit	N	Permanent storage of DADH configuration code. User image data are not stored.	Not customer alterable.
EEPROM (IIT)	16Kbit	N	Permanent storage of setup data	Not customer alterable

Media and Storage					
Type (disk drives, tape drives, CF/SD/XD memory cards, etc.):	**Removable Y / N**	**Size:**	**User Modifiable: Y / N**	**Function:**	**Process to Clear:**
None					

Feeder and Finisher Modules

The text below details the information regarding the volatile and non-volatile memory contained in the supported feeders. This document lists the available options. Depending on the configuration purchased, your system will contain on or more of these devices. **NOTE: None of these devices stores any job data or Personally Identifiable Information in electronic form.**

Feeder Modules

High Capacity Feeder

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

High Capacity Tandem Tray Module

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

Three Tray Module

Memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

One Tray Module

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

Finisher Modules

Depending on the configuration purchased, your system will contain one or more of these devices. **NOTE: None of these devices stores any job data or Personally Identifiable Information in electronic form.**

Integrated Office Finisher

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

Office Finisher LX

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

Professional Office Finisher

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

BR Finisher

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

BR Booklet Maker Finisher

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.

CZ Folder

All memory inside the device is used for configuration settings and normal operation. Removal of any memory will void the warranty. Access to any memory is by system programs or diagnostics only.