Digital Solutions Division

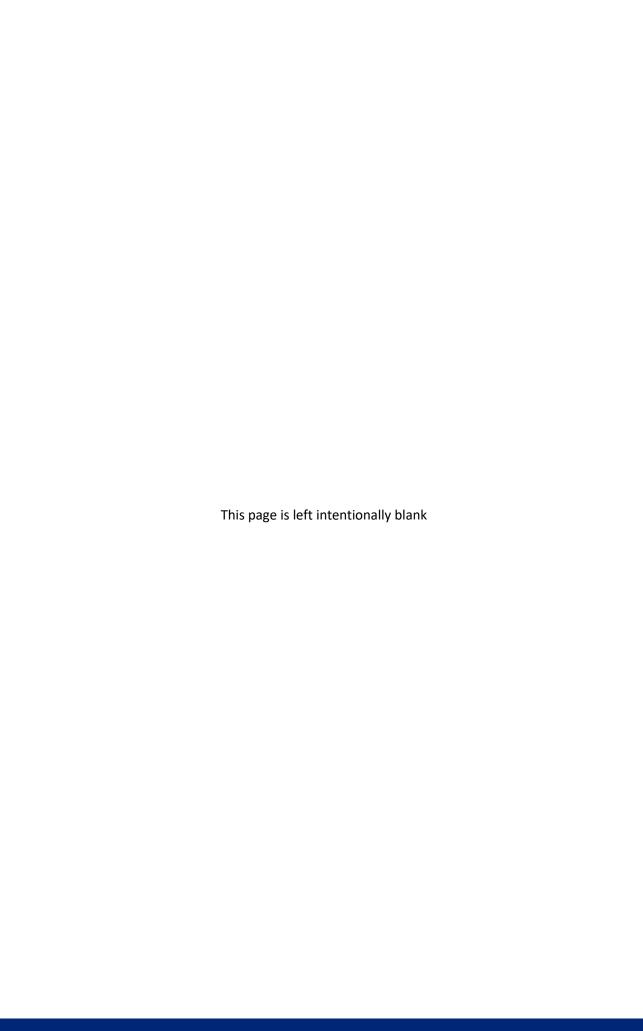


ACT Health

Canberra Health Services Non-Clinical Systems

Version 1.0





Document review

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Contents

1.	Intro	oduction	6
2.	Secu	urity Systems	7
	2.1.	Access Control	7
	2.2.	Fixed Duress	7
	2.3.	Alarms	7
	2.4.	Closed Circuit TV	7
	2.5.	Help Points	8
	2.6.	Key Management Solution	8
	2.7.	Security Monitoring	8
	2.8.	Data Cabinets Security Locks	9
3.	Life	Critical	10
	3.1.	Nurse Call	10
4.	Build	ding Management	11
	4.1.	Building Management and Control System	11
	4.2.	Digital Addressable Lighting Interface	11
	4.3.	Lift Controllers	11
	4.4.	Consumer Locks	11
	4.5.	Master Clocks	12
	4.6.	Fire Indicator Panel	12
5.	Mes	saging System	13
	5.1.	Messaging Engine	13
	5.2.	Messaging Integration Engine	13
	5.3.	Paging	13
6.	Aud	io Visual Systems	14
	6.1.	Patient Information and Entertainment System	14
	6.2.	IP Television	14
	6.3.	Video and Audio Conferencing	14
	6.4.	Digital Signage	14
	6.5.	Digital Way Finding	15
	6.6.	Theatre/Full AV	15
7.	Unif	ied Communications	16
	7.1.	SIP Exchange	16
	7.2.	Digital Voice Exchange	16
	7.3.	Instant Messaging	16

7	' .4.	Room Booking	16
8.	Loca	tion Tracking Systems	17
8	3.1.	Real Time Location System	17
8	3.2.	Asset Tracking	17
8	3.3.	Sterilised Asset Tracking	17
8	3.4.	RFID	17
9.	Wire	eless Network and Services	18
9).1.	Network	18
9).2.	Mobile Duress	18
10.	Netv	vork	19
1	.0.1.	Local Area and Wide Area Network	19
1	.0.2.	Starlight Foundation Services	19
1	.0.3.	Ronald McDonald House	19
1	.0.4.	Australian National University	19
11.	Tran	smission Systems	20
1	1.1.	Physical Fibre Network	20
1	.1.2.	Territory Radio Network	20
1	1.3.	Distributed Antennae System	20
12.	Misc	rellaneous	21
1	.2.1.	Neo Natal ICU Baby Monitor	21
1	22	Pneumatic Tuhe System	21

1. Introduction

This document provides a list of critical no-clinical systems that are in use across the Canberra Health Services (CHS) sites. These systems have been categorised under various system types and includes the system manufacturers/vendors that are used for each system.

Although this document endeavours to capture information at a high level, it is not intended to provide detailed technical information for the systems or the specific model numbers for each system.

2. Security Systems

2.1. **Access Control**

The access control system is a security management system that manages physical access to nominated areas within a building.

2.1.1. Manufacturer

The system is provided by Tyco/Software House.

2.1.2. System Components

The following components are used for the access control system:

- C-Cure 9000 Servers installed in a highly available configuration;
- iStar door controllers; and
- Card readers, electric strike and various other door hardware.

2.2. **Fixed Duress**

Fixed Duress is provided in various areas/rooms based on the business requirements.

2.2.1. Manufacturer

The system is provided by Tyco/Software House.

2.2.2. System Components

The following components are used for the fixed duress system:

- C-Cure 9000 Servers installed in a highly available configuration;
- iStar door controllers; and
- Duress buttons using dry contact.

2.3. Alarms

This system is involved in raising alarms.

2.3.1. Manufacturer

The system is provided by Tyco/Software House.

2.3.2. System Components

The following components are used for the alarm system:

- C-Cure 9000 Servers installed in a highly available configuration;
- iStar door controllers; and
- Alarms.

Closed Circuit TV 2.4.

This system provides Closed Circuit TV (CCTV) monitoring and recording of the CCTV footage.

2.4.1. Manufacturer

The system is provided by Avigilon.

2.4.2. System Components

The following components are used for the CCTV system:

- IP CCTV cameras indoor and outdoor;
- CCTV cameras must be able to leverage Power over Ethernet (POE) or POE+;
- Network Video Recorder (NVR). Must support IP network connectivity; and
- External CCTV cameras potentially installed on Hex Poles.

2.5. Help Points

The help points are provided in areas where public safety is important.

2.5.1. Manufacturer

The system is provided by Jacques Technologies.

2.5.2. System Components

The following components are used for the help points system:

- · Voice and video call points; and
- Must support IP network connectivity.

2.6. Key Management Solution

The electronic key management data cabinets are used to secure, manage and provide audit facility for the use of every key within the cabinet.

2.6.1. Manufacturer

The system is provided by Traka Assa Abloy.

2.6.2. System Components

The following components are used for the CCTV system:

- Key cabinet;
- Smart Traka software; and
- Must support IP connectivity.

2.7. Security Monitoring

2.7.1. Company

After-hours and offsite security monitoring is provided by SNP Security.

Data Cabinets Security Locks 2.8.

2.8.1. Manufacturer

The system is provided by Enlogic.

2.8.2. System Components

The following component is affected by this system:

• IP data cabinet locks.

3. Life Critical

3.1. **Nurse Call**

There are currently several nurse call systems installed at the ACT health Directorate.

3.1.1. Manufacturers

The systems are provided by Hills, Rauland and Tacera.

3.1.2. System Components

The following component are included in this system:

- Servers provisioned in highly available configuration;
- Buttons that provide nurse call, nurse assist etc;
- Annunciators; and
- Over door lights.

4. Building Management

4.1. Building Management and Control System

4.1.1. Manufacturer

The system is provided by Siemens.

4.1.2. System Components

The following component are included in this system:

- Meters;
- Controllers;
- Sensors; and
- Uses BACnet protocol.

4.2. Digital Addressable Lighting Interface

4.2.1. Manufacturer

The system is provided by Clipsal.

4.2.2. System Components

The following component are included in this system:

- Addressable lighting;
- Sensors;
- · Switches; and
- IP addressable.

4.3. Lift Controllers

4.3.1. Manufacturers

There are several lift providers at The Canberra Hospital.

4.3.2. System Components

The following component are included:

- Controllers;
- Direct Current (DC) cabling.

4.4. Consumer Locks

4.4.1. Manufacturer

This is provided by Salto.

4.4.2. System Components

Reader;

- Hospitality card; and
- 802.15.4 Zigbee mesh network.

Master Clocks 4.5.

4.5.1. Manufacturer

The clocks are provided by Krontech.

4.5.2. System Components

- IP Clocks; and
- Supports Network Time Protocol.

Fire Indicator Panel 4.6.

4.6.1. Manufacturer

The fire indicator panels are provided by various manufacturers.

4.6.2. System Components

Serial PRN to IP Moxa.

5. Messaging System

5.1. Messaging Engine

The messaging engine integrates with various systems.

5.1.1. Manufacturer

The messaging engine is provided by Ascom.

5.1.2. System Components

- DURAsuite appliances;
- Software components;
- Support for High Level Interface connection with other systems; and
- Must support IP connectivity.

Messaging Integration Engine 5.2.

5.2.1. Manufacturer

The messaging integration engine is provided by Spok.

5.2.2. System Components

- System appliances and servers;
- Software components;
- Support for High Level Interface connection with other systems; and
- Must support IP connectivity.

5.3. **Paging**

5.3.1. Manufacturer

The paging system is provided by Vitacom.

5.3.2. System Components

- Server appliances or virtual;
- Software components;
- Support for High Level Interface; and
- Must support IP connectivity.

Page 13 of 22

6. Audio Visual Systems

Patient Information and Entertainment System 6.1.

6.1.1. Manufacturer

The Patient Information and Entertainment System (PIES) is provided by various vendors.

6.1.2. System Components

- Server appliances or virtual;
- Software components;
- Support for High Level Interface; and
- Must support IP connectivity.

6.2. **IP** Television

6.2.1. Manufacturer

The IPTV is provided by Exterity.

6.2.2. System Components

- Television;
- Digital Media Player;
- Digital Media Manager;
- Transcoders; and
- Encoders.

Video and Audio Conferencing 6.3.

6.3.1. Manufacturer

The Video conferencing and collaboration solution is provided by Cisco.

6.3.2. System Components

- Integrated Cisco Webex video conferencing units of various sizes based on the room size and requirement; or
- Commercial television and video conferencing unit such as Cisco Webex Room Kit.

6.4. Digital Signage

6.4.1. Manufacturer

The digital signage is provided by Exterity.

6.4.2. System Components

- Television; and
- Digital Media Player.

6.5. Digital Way Finding

6.5.1. Manufacturer

The digital way finding is provided by Exterity.

6.5.2. System Components

- Television;
- Digital Media Player; and
- Dedicated kiosks.

6.6. Theatre/Full AV

6.6.1. Manufacturer

The is provided by Celestron.

6.6.2. System Components

- Controllers;
- Amplifiers;
- Speakers; and
- Microphones.

7. Unified Communications

7.1. SIP Exchange

7.1.1. Manufacturer

The provider is Asterix Open Systems.

7.1.2. System Components

• Voice over Internet Protocol (VoIP) exchange.

7.2. Digital Voice Exchange

7.2.1. Manufacturer

The provider is Cisco.

7.2.2. System Components

- Cisco unified Communications Manager;
- Appropriate hardware; and
- Cisco IP phones.

7.3. Instant Messaging

7.3.1. Manufacturer

The provider is Cisco.

7.3.2. System Components

• Jabber software.

7.4. Room Booking

7.4.1. Manufacturer

The provider is Evoko.

7.4.2. System Components

- Room booking panels; and
- Integration with Microsoft Outlook.

8. Location Tracking Systems

8.1. Real Time Location System

8.1.1. Manufacturer

The provider is Ekahau.

8.1.2. System Components

- Corporate wireless network;
- Ekahau software; and
- Servers.

8.2. Asset Tracking

8.2.1. Manufacturer

The provider is Motorola or Olinqua.

8.2.2. System Components

- Corporate wireless network;
- Software Topcat/Hardcat or other; and
- Server.

8.3. Sterilised Asset Tracking

8.3.1. Manufacturer

The provider is to be determined.

8.3.2. System Components

- Barcode readers;
- Exciters;
- Server; and
- Software.

8.4. RFID

8.4.1. System Components

- Exciters; and
- RFID labels.

9. Wireless Network and Services

9.1. Network

9.1.1. Manufacturer

The wireless network equipment is provided by Cisco. The wireless network is installed, configured and managed by ACT Government.

9.1.2. System Components

- Wireless access points;
- Wireless LAN Controllers; and
- Appropriate software.

9.2. Mobile Duress

9.2.1. Manufacturer

The provider is Ascom.

9.2.2. System Components

- DURAsuite hardware;
- Software; and
- High level interface.

10. Network

10.1. Local Area and Wide Area Network

10.1.1. Manufacturer

The LAN and WAN network is provided by Cisco.

10.1.2. System Components

- Core, distribution and access layer network switches; and
- Installed, configured and managed by ACT Government.

10.2. Starlight Foundation Services

10.2.1. Manufacturer

Not applicable.

10.2.2. System Components

• Children's channel which integrates with PIES.

10.3. Ronald McDonald House

Ronald McDonald house has separate network.

10.4. Australian National University

Primarily this is a separate network. However, ANU leverage ACT Government network which is made accessible to ANU via a separate Service Set Identified (SSID).

11. Transmission Systems

11.1. Physical Fibre Network

11.1.1. Manufacturer

The provider is AFC group.

11.1.2. System Components

- Single mode and multi-mode fibre; and
- MTP fibre network using Lucent Connector (LC).

11.2. Territory Radio Network

11.2.1. Manufacturer

The provider is Motorola.

11.2.2. System Components

- Trunk radio network;
- Antenna; and
- TRN handsets.

11.3. Distributed Antennae System

11.3.1. Manufacturer

DAS is provided by the three major carriers i.e. Telstra, Optus and Vodafone.

11.3.2. System Components

• The components required to support 3G. 4G and 5G.

12. Miscellaneous

Neo Natal ICU Baby Monitor 12.1.

12.1.1. Manufacturer

There are various providers involved with this system.

12.1.2. System Components

- NICUCAM;
- CCTV camera; and
- RFID exciters and wrist/ankle bands.

12.2. **Pneumatic Tube System**

12.2.1. Manufacturer

The provider is Lamson.

12.2.2. System Components

Pneumatic tube infrastructure.

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