





#### **Trademarks**

Product names are trademarks or registered trademarks of their respective holders.

### The Genesis Group Trademark Information

GenWatch3® is a registered trademark of GenCore Candeo, LTD., a subsidiary of Burks Gencore Co., Inc. D.B.A. The Genesis Group and Phil Burks.

### Copyright

Copyright © 2012-2023; Burks Gencore Co., Inc. D.B.A. The Genesis Group and Phil Burks. All rights are reserved. No part of this publication or the associated program may be reproduced, transmitted, transcribed, in whole or in part, in any form or by any means, whether it is mechanical, magnetic, optical, electronic, manual or otherwise, without the prior written consent of Burks Gencore Co., Inc. D.B.A:

The Genesis Group and Phil Burks 5800 Eagles Nest Blvd Tyler, Texas 75703

Includes technology licensed from Motorola.

### **Disclaimer**

The GenWatch3 Security Compliance Book is printed in the U.S.A. Burks Gencore Co., Inc. D.B.A. The Genesis Group and Phil Burks believe that the information included in this manual is correct; however, Burks Gencore Co., Inc. D.B.A. The Genesis Group and Phil Burks reserves the right to alter, revise and make periodic changes to the manual and its contents. Burks Gencore Co., Inc. D.B.A. The Genesis Group does not assume responsibility to notify any person of such revisions or changes. While we have taken strides to carefully examine our software and documentation and believe that it is reliable, the Genesis Group and Phil Burks assume no responsibility for the use of the manual, or GenWatch3 software, nor for any patent infringements or other rights of third parties who may use the manual or the GenWatch3 software. Burks Gencore Co., Inc. D.B.A. The Genesis Group and Phil Burks make no representations or warranties with respect to the contents or fitness for a particular purpose beyond the cost of the software paid by the end-user.

The software contains valuable trade secrets and proprietary information. Unauthorized use of the manual or software can result in civil damages and criminal prosecution. As an end user, you agree to abide by and heed these statements.

#### License

Title to the media on which the program is recorded and to the documentation in support of the product is transferred to you, but title to the program, and all subsequent copies of the program, despite the form or media in or on license is not a sale of the original or any subsequent copy. You assume responsibility for the selection of the program to achieve your intended results, and for the installation, use, and results obtained from the program.

Refer to the GenWatch3 Manual Overview for your full license. All license information contained on pages 4-7 (book 600-2.23.5-AA.1) are to be considered as contained herein.

### Support

Customer satisfaction is our number one priority at Genesis. We are here to provide you with the best software possible, and we want to know when you have any questions, concerns or problems with GenWatch3 so that we can make it a better product for everyone.

Refer to the Troubleshooting & Support section of this manual for complete support and contact information.

# **Document History**

Revision	Description	Author
Revision #1.0	Initial Release	Jeff Schubert
Revision 2	Additional security documentation	Daron Walls

# **Table of Contents**

	ks	
The Genesis Group Trademark Information		
	t	
	r	
* *	History	
	ONTENTS	
	MANUAL	
GOALS		9
WHO SHOUL	D READ THIS MANUAL?	9
	ANUAL IS ORGANIZED	
CHAPTER 1	INTRODUCTION	11
PREAMBLE		12
OBJECTIVES.		12
DEFINITIONS		12
CHAPTER 2	AUDITING	13
AVAILABILIT	Y	14
CHAPTER 3	AUTHENTICATION	15
COMMAND-LINE TOOLS		16
Microsoft	SQL Server Command-Line Tools	16
GENWATCH	Databases	16
CHAPTER 4	DATABASE AUTHORIZATION	17
GW DATABA	\SE	18
Database Roles		18
KPI Database		18
	Roles	
TRIO DATAB	ASE	
Database	Roles	10

### Goals

This manual describes Security Compliance measures for the GenWatch3 solution including information for iVista and Trio.

### Who Should Read This Manual?

This manual is written for the intended audience of novice to mid-level Motorola trunked radio system users and novice to mid-level PC users.

## How This Manual Is Organized

This manual is organized as follows:

- **Introduction**: Provides information about the objectives, underpinning principles, and generic definitions.
- Auditing: Describes security compliance measures related to auditing.
- **Authentication**: Describes security compliance measures related to authentication.
- **Database Authorization**: Describes security compliance measures related to database authorization.

This manual contains the following images, used to indicate that a segment of text requires special attention:

Additional Information: Additional information is used to indicate shortcuts or tips.

Warning: Warnings are used to indicate possible problem areas. Such as a risk of data loss, or incorrect/unexpected function.

Chapter 1 Introduction

This chapter will provide information about the objectives, underpinning principles, and generic definitions for GenWatch3 security compliance.

This chapter contains the following sections:

- **Preamble:** Describes the structure of this Security Compliance document.
- **Objectives:** Describes the goals of this Security Compliance document.
- **Definitions:** A list of terms and definitions used within this manual.

### **Preamble**

This Security Compliance document is for GenWatch3, iVista, and Trio.

This document aims to provide compliance measures and details as it relates to security. Each section of this document contains measures pertinent to a specific security aspect, such as auditing.

### **Objectives**

The objectives of this document are to:

• Document how the product complies with various security requirements.

### **Definitions**

**GenWatch3** – Core GenWatch3 software distributed by The Genesis Group **iVista** – The GenWatch3 web interface software.

**Trio** – A module of GenWatch3 that is the core customer billing and management functionality.

Chapter 2 Auditing

This chapter outlines security compliance related to auditing.

This chapter contains the following sections:

• Availability: Describes how auditing affects system availability.

## **Availability**

Auditing measures are employed throughout the system. However, system availability is paramount to the operation of the system. As such, if resources required for auditing purposes are not available or near exhaustion, the availability of the system takes precedence and auditing events, logs, or records could be lost until those resources are restored.

Chapter 3 Authentication

This chapter outlines security compliance related to authentication.

This chapter contains the following sections:

- **Command-Line Tools:** Describes the use of authentication with command-line tools.
- **GenWatch Databases:** Describes the use of mixed-mode authentication.

### **Command-Line Tools**

When using command-line tools, users must use a logon method that does not expose the password. Obfuscation, such as display asterisks when a user types in a password, is one example. Any users who would use these tools should receive approval for their use, be trained in the importance of not using the plain-text password option and in how to keep the password hidden, and they must adhere to this practice.

### Microsoft SQL Server Command-Line Tools

SQLCMD and other command-line tools are part of any Microsoft SQL Server installation. While GenWatch uses SQL Server in a mixed-mode authentication environment, these tools are not used or needed by GenWatch.

### GenWatch Databases

GenWatch needs to use mixed-mode authentication in SQL Server during installation. GenWatch and SQL Server can be manually configured after installation to operate in Windows Authentication Mode. This applies to the GW, KPI, and Trio databases.

# **Chapter 4**

## **Database Authorization**

This chapter outlines security compliance related to database authorization.

This chapter contains the following sections:

- **GW database:** Describes the access control for the GW database.
- **KPI database:** Describes the access control for the KPI database.
- **Trio database:** Describes the access control for the Trio database.

### **GW Database**

Each GenWatch user has a corresponding account in SQL Server. GenWatch user accounts are assigned to the db\_gw3user role. The account which GenWatch Windows service runs under is assigned to the db\_gw3service role.

### **Database Roles**

- db\_gw3service
  - Owner: user that created role
  - o Permission: Delete
  - o Permission: Insert
  - o Permission: Update
  - o Permission: Select
  - o Permission: Insert
  - o Permission: Alter any user
  - o Permission: Checkpoint
- db gw3user
  - Owner: db\_securityadmin
  - o Permission: Delete
  - o Permission: Insert
  - o Permission: Update
  - o Permission: Select
  - o Permission: Execute

### **KPI Database**

Each GenWatch user has a corresponding account in SQL Server. GenWatch user accounts are assigned to the db\_gw3user role. The account which GenWatch Windows service runs under is assigned to the db\_gw3service role.

### **Database Roles**

- db gw3service
  - Owner: user that created role
  - o Permission: Delete
  - o Permission: Insert
  - o Permission: Update
  - o Permission: Select
  - o Permission: Insert
  - o Permission: Alter any user
  - o Permission: Checkpoint
- db\_gw3user
  - Owner: db securityadmin
  - o Permission: Delete
  - o Permission: Insert
  - o Permission: Update
  - o Permission: Select
  - o Permission: Execute

### Trio Database

Each GenWatch user has a corresponding account in SQL Server. GenWatch user accounts are assigned to the db\_gw3user role. The account which GenWatch Windows service runs under is assigned to the db\_gw3service role.

### **Database Roles**

- db\_gw3service
  - Owner: user that created role
  - o Permission: Delete
  - o Permission: Insert
  - o Permission: Update
  - o Permission: Select
  - o Permission: Insert
  - o Permission: Alter any user
  - o Permission: Checkpoint
- db\_gw3user
  - Owner: db\_securityadmin
  - o Permission: Delete
  - o Permission: Insert
  - o Permission: Update
  - o Permission: Select
  - o Permission: Execute