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GV-AS21xx, GV-AS41xx and GV-AS81xx Version History

IMPORTANT: Controller firmware versions **V1.xx**, **V2.xx**, and **V4.xx** are designed for **GV-ASManager** applications, while version **V3.xx** is intended solely for **GV-Cloud Access Control**. Firmware for GV-AS4110 / 4111 **Local** and GV-AS4110 / 4111 **Cloud** are not interchangeable and cannot be upgraded across platforms.

[GV-AS41 Series V3.xx for GV-Cloud Applications]

GV-AS41 Series Firmware V3.02 2026-10-07

The version history applies to the following models:

- GV-AS4110 / 4111 Cloud controller with GV-AS41 Series Cloud Net Module

New:

- Support for direct connection to the following GV-Cloud Camera models with firmware V1.09 or later for playback on GV-Cloud Access Control: GV-GBL4900 / GBL4911 / GDR4900 / GEB4900 / GVD4910

GV-AS41 Series Firmware V3.01 2026-01-20

The version history applies to the following models:

- GV-4110 / 4111 Cloud controller with GV-AS41 Series Cloud Net Module

New:

- Support for visitor mobile cards via the GV-Mobile Access app within GV-Cloud Access Control (V1.5.0) integration

Fixed:

Issue with synchronizing daylight-saving time (DST) from GV-Cloud Access Control in specific months

GV-AS41 Series Firmware V3.00 2025-09-12

The version history applies to the following models:

- GV-AS4110 / 4111 Cloud controller with GV-AS41 Series Cloud Net Module

New:

- Support for the following cloud-based software
  - GV-Cloud Access Control
  - GV-Cloud VMS

[GV-AS21 / 41 / 81 Series V4.xx requires GV-ASManager V6.4.0 for Multi Access Group Support]

GV-AS21 / 41 / 81 Series Firmware V4.00 2026-10-02

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

IMPORTANT:

1. **System Compatibility:** Firmware V4.00 for GV-AS21xx, GV-AS41xx and GV-AS81xx controllers requires GV-ASManager V6.4.0.
2. **Required Upgrade Sequence:** Upgrading to Firmware V4.00 without updating the software to V6.4.0 will cause the system to fail to log access events.
3. **Card Capacity Reduction:** Upgrading to Firmware V4.00 / Software V6.4.0 reduces total card capacity from 100,000 to 40,000. Verify that your system has 40,000 or fewer active card IDs before upgrading; **any card ID beyond 40,000 limit will be removed.**

New:

- Support for assigning up to four Access Groups to a card/vehicle for each Device Group
- Support for Microsoft Edge for Web interface login
- Support for TLS 1.2 and TLS 1.3 security protocols
- Event log addition in GV-ASManager: “Door/Gate Unlock –Exit Button” in when the Exit button is triggered

Fixed:

- Issue with the fire alarm failing to trigger Fire Unlock / Fire Lock mode after a controller restart

Modified:

- Total card capacity reduced from 100,000 to 40,000 cards

[GV-AS21 / 41 / 81 Series V1.xx and V2.xx for GV-ASManager Applications]

GV-AS21 / 41 / 81 Series Firmware V2.90 2026-09-15

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

New:

- Support for Microsoft Edge for Web interface login
- Support for TLS 1.2 and TLS 1.3 security protocols
- Event log addition in GV-ASManager: “Door/Gate Unlock –Exit Button” in when the Exit button is triggered
- Support for the Modbus protocol

Fixed:

- Issue with the fire alarm failing to trigger Fire Unlock / Fire Lock mode after a controller restart

GV-AS21 / 41 / 81 Series Firmware V2.82 2024-12-25

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

Note: Firmware V2.82 only works with GV-ASManager V6.1.1 or later.

New:

- Support for using passcode for the Release by Card mode

Fixed:

- Chances of LED display color errors occurred when pressing a fingerprint on the

fingerprint reader (GV-GF1921 / 1922) connected to the GV-AS Controller

GV-AS21 / 41 / 81 Series Firmware V2.80 2024-11-14

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

Note: Firmware V2.80 only works with GV-ASManager V6.1.1 or later.

New:

- Support for 100 Special Cards for separately applying Lock Reset Time and Held Open Time
- Addition of Force Unlock with Timer to a controller or door, which counts down the specified time before the force lock is executed

Modified:

- The number of Special Days in Holiday, Weekly, Authentication and Exit Button schedules increased from 3 to 8 days

GV-AS21 / 41 Series Firmware V2.60 2023-03-25

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111

New:

- Support for GV-AS Bridge connection for cloud access control management on GV-Cloud Access Control

Modified:

- Failure of card reading after port scanning

GV-AS81 Series Firmware V2.60 2023-03-25

The version history applies to the following models:

- GV-AS810 / 8110 / 8111

New:

- Support for GV-DES1352, GV-QR1352 and GV-R1354 connection via RS-485A+ / A- interface

Modified:

- Failure of card reading after port scanning

GV-AS21 / 41 / 81 Series Firmware V2.50 2022-04-18

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

New:

- Support for Visitor mobile cards (only compatible with GV-QR1352 firmware V1.10 and GV-Mobile Access app V1.10, or later versions)

Fixed:

- Failure to open the Web interface using Microsoft Edge and Google Chrome on Windows 11 and 10
- Chances of failure to detect the controller using GV-IP Device Utility
- Failure to exit a monitored area set up with the Area Occupancy function and GV-ASManager V6.0 (only for GV-AS810 / 8110 / 8111)

Modified:

- SSL certificate updated

GV-AS21 / 41 / 81 Series Firmware V2.41 2021-09-08

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

New:

- Support for GV-RKD1352 card reader via Wiegand

GV-AS21 / 41 Series Firmware V2.40 2021-06-07

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111

New:

- Support for GV-DES1352 / QR1352 (for the features of dynamic QR codes and smart phone access, it is required to work with GV-ASManager V5.3.3)
- Issue with time disparity after being disconnected from GV-ASManager for a certain period of time

GV-AS21 / 41 / 81 Series Firmware V2.32 2021-01-26

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

Modified:

- Interlock function by which an interlocking door is closed when its associated door unlocks, in addition to being open

GV-AS21 / 41 / 81 Series Firmware V2.31 2020-07-02

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

Note: Users must read the necessary upgrade instructions carefully before upgrading GV-AS21 / 41 / 81 Series Controller to firmware V2.31 or later.

New:

- Support for software licensing for GV-ASManager V5.3.0 or later

Fixed:

- Cybersecurity enhanced as follows:
  - Removing user account for engineering mode
  - Fixing misuse of the same cryptographic key to prevent MITM attacks
  - Requiring certain levels of authentication for system log disclosure
  - Buffer overflow vulnerability addressed, with enhanced security protecting devices from plausible unauthenticated cyberattacks
- Incorrectly reflecting DST (Daylight Saving Time) end date and time on Web interface
- Chances of inability to store snapshots, into the SD card, captured from extended readers

- Inability to connect GV-AI FR to controllers by IP connection on GV-ASManager, and requiring additional configuration via the controllers' Web interface

Improved:

- Reestablishing port connection periodically in inhibiting unauthorized servers from occupying device port to ensure connection to GV-ASManager

Modified:

- Requiring users to set a new password upon first-time login
- Password strengths of "Normal" or higher required when changing the password of Administrator account
- Changing the access card number of unknown faces detected by GV-FR2020 from 000-65535 to 000-00000

GV-AS21 / 41 / 81 Series Firmware V2.21 2019-08-17

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

Fixed:

- Chances of disconnection of GV-GF1921 / 1922 readers and lighting of Purple LED upon card swipe or fingerprint scanning

GV-AS21 / 41 / 81 Series Firmware V2.20 2019-05-13

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

New:

- Support for GV-CR1320

Modified:

- Ceased support for backing up a copy of log information into micro SD cards once connected to GV-ASManager
- Ability to unlock doors or fire doors from GV-ASManager, without the card, during the Release by Card mode
- Release By Card mode to unlock and lock the door each time a card is presented during the time specified for Release Mode

GV-AS21 / 41 / 81 Series Firmware V2.15 2018-08-14

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

Fixed

- Occasional failure of the exit button during the Exit Button Schedule
- One snapshot being captured only if swiping cards on more than one GV-FR2020s simultaneously

GV-AS21 / 41 / 81 Series Firmware V2.12 2018-01-16

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

New:

- GV-AS 21 / 41 / 81 series Controllers to renew the controller data automatically with GV-ASManager after the firmware upgrade

GV-AS21 / 41 / 81 Series Firmware V2.11 2017-11-09

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

New:

- “Armed status” added to Input Function to enter into arm mode where no cards can be granted access
- “Alarm Keyswitch” added to Output Function to trigger the output after the correct PIN code and Security card are presented

Fixed:

- Some enrolled cards being invalid either
  - after clicking Sync Controller to renew the controller settings on GV-ASManager, or
  - restarting, or powering off and on the controllers
- Missing Door Unlock / Lock messages on the Event Monitor of GV-ASManager after opening or closing the two-person-rule enabled door
- Output not triggered when Output Type is set to Normal and Wiegand is selected, even though the correct card is presented to Wiegand readers

GV-AS21 / 41 / 81 Series Firmware V2.00 2017-08-15

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110 / 4111
- GV-AS810 / 8110 / 8111

New:

- Number of cards increased from 40,000 to 100,000
- Anti-passback function to monitor the access into a controlled area by users
- Filter option added to Wiegand Configuration to prevent the same card from being swiped multiple times consecutively
- All Zone and Area Occupied added to Output Function to trigger the alarm device when a person enters the controlled area

Changed:

- Latch disabled under Normal Output type not to produce a momentary alarm except triggering Access Granted and Access Denied
- Lock Reset Time changed to 600 seconds in the Parameter Configuration page

GV-AS21 / 41 / 81 Series Firmware V1.41 2016-12-09

The version history applies to the following models:

- GV-AS210 / 2110 / 2120
- GV-AS410 / 4110
- GV-AS810 / 8110

New:

- Support for GV-FR2020
- Disable local APE option added to “Edit the Card” to exempt the card from the APB setting

Changed:

- Removed support for GV-GF1901 / 1902 / 1911 / 1912 to connect through RS-485
- The alarm event of Forced Open option to be enabled before the Forced open message will be sent

Fixed:

- Failure to release electric locks correctly using the exit button before a card is presented during the Release mode

GV-AS21 / 41 / 81 Series Firmware V1.40 2016-03-10

New:

- Support for Special Day function in GV-ASManager V4.4.0.0 or later

GV-AS21 / 41 / 81 Series Firmware V1.30 2015-04-09

New:

- Support for setting device name, rebooting, and restoring default settings through GV-IP Device Utility V8.6.2.0
- Support for passcode function
- Allowing Urgent Code to unlock doors under lockdown mode
- Support for showing input status in the Device View of GV-ASManager
- Support for RS485-B interface on the controller to connect 8 additional readers (GV-AS810 only)

Changed:

- New Web interface
- Removed support for manually entering the card number and pin code to gain access under Card and Pin Code Mode

GV-AS21 / 41 / 81 Series Firmware V1.23 2014-11-11

New:

- Configurations on Web interface to set connected GV-R1352 / RK1352 to read GID or UID
- Support for allowing specified cards to access doors in Lockdown Mode
- Fast backup and restore function to export and import controller settings
- All Zone Fire Sensor function to trigger the fire sensors on all connected doors when one fire sensor is triggered
- Series Function to extend the All Zone Fire Sensor function to multiple associated controllers

Fixed:

- SSL security issue by supporting TLS V1 only
- Setting for Wiegand E ~ H missing in Output Setting page (GV-AS410 only)
- Incorrect Wiegand settings after GV-AS810 restarts (GV-AS810 only)
- Support for RS485-B interface on the controller to connect 8 additional readers (GV-AS810 only)

Improved:

- Unmount and Check buttons added to Web interface to safely remove inserted SD card and to repair SD card errors
- Current Local Time button added in Time Setting page of Web interface to synchronize controller time with PC time

GV-AS21 / 41 / 81 Series Firmware V1.22 2014-04-14

New:

- Schedule for exit button to specify when to allow access to the exit button
- Urgent Code function to unlock the associated door when the Urgent Code is entered
- Support for formatting and displaying information of the micro SD card through the controller's Web interface

Fixed:

- Failure to reset APB function for all cards when the Reset Anti-passback function is selected on GV-ASManager
- Inability to unlock the door of GV-GF1901 / 1902 / 1911 / 1912 connected through RS-485 connection if the door direction is set to Out
- Failure to send duress alert during Card and PIN Code Mode when PIN plus 1 is entered on the reader's keypad
- Problem with connecting to GV-ASManager when the log time in micro SD card is before year 2010

Changed:

- Time required for input to trigger output shortened from 1 second to 0.5 seconds
- Support for setting multiple input devices or sensors for the same input function in Web interface

GV-AS21 / 41 / 81 Series Firmware V1.20 2013-12-09

New:

- Lock Down function for connected doors
- Support for disabling Lock Card Time function for the selected cards
- Support for interlocking a door with multiple doors of the same controller
- Support for typing GeoFinger Server IP address and port in the Extended Reader page to allow remote fingerprint enrollment on all connected GV-GF1921 / 1922 readers

Fixed:

- Door staying unlocked until the specified Lock Reset Time even if the door closes before the end of Lock Reset Time
- Inability to unlock doors 5 – 8 by typing the door password under Card or Common Mode (GV-AS810 only)

GV-AS21 / 81 Series Firmware V1.10 2013-05-28

The version history applies to the following models:

- GV-AS210
- GV-AS810

New:

- Input state setting on Web interface to set input devices to NO or NC circuit
- Support for connecting to GV-CR420 V1.0.1 using MAC address
- LED indicator on GV-CR420 V1.0.1 turning into a solid pink light when network connection is interrupted
- Support for GV-GF1921 / 1922

Fixed:

- Door remains open 1 second longer than the specified lock reset time
- Failure to trigger output device when the reader is using network connection, output type is set to Normal type, and output is set to trigger upon card swipe
- Failure to record output trigger to I/O Log in ASWeb when the output is set to Normal type and trigger upon card swipe