



Suprema Webinar

BioStar 2 New Features

2.8.15 – 2.8.17

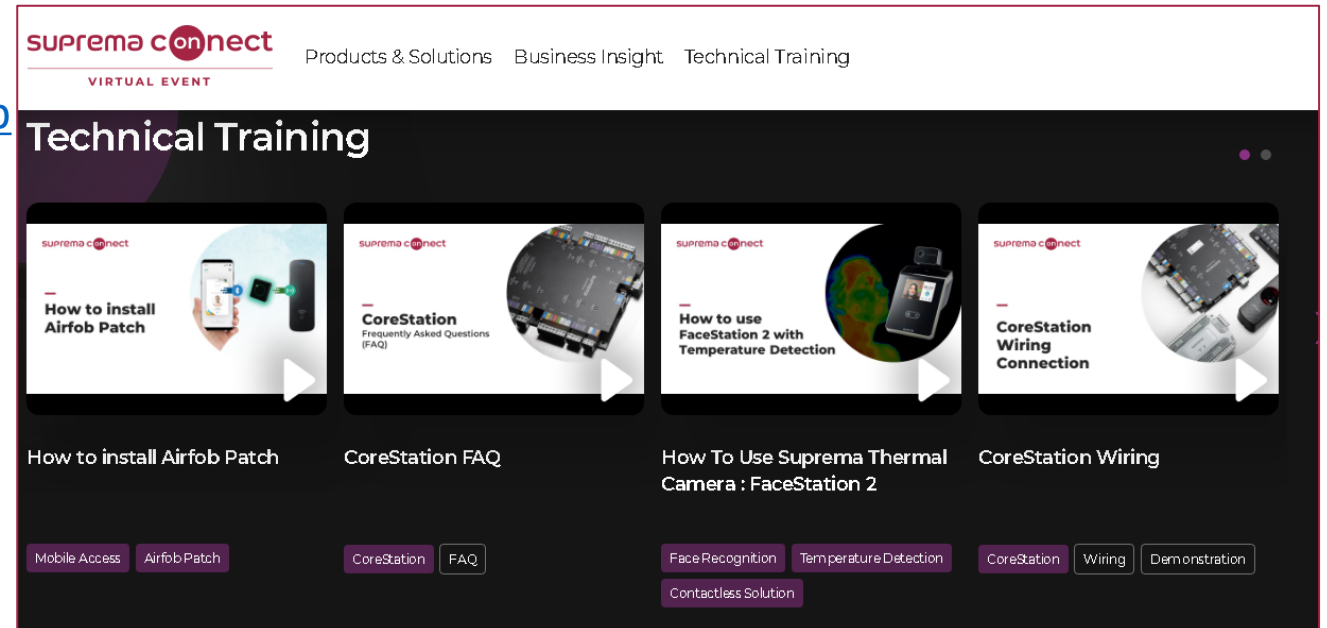
Speaker

Laney Lee
Technical Consulting Engineer | Suprema

How can you find Webinar Contents?

1) Suprema Connect Website

- ✓ We will post the recorded video to the site.
- ✓ <https://www.supremainc.com/connect/index.asp>
- ✓ Please google **Suprema Connect**.



2) Suprema Technical Support Site

- ✓ You can find the information with Q&A list on the website below.
- ✓ Please search **Suprema Webinar** in the support page, or simply google it.
- ✓ <https://support.supremainc.com>

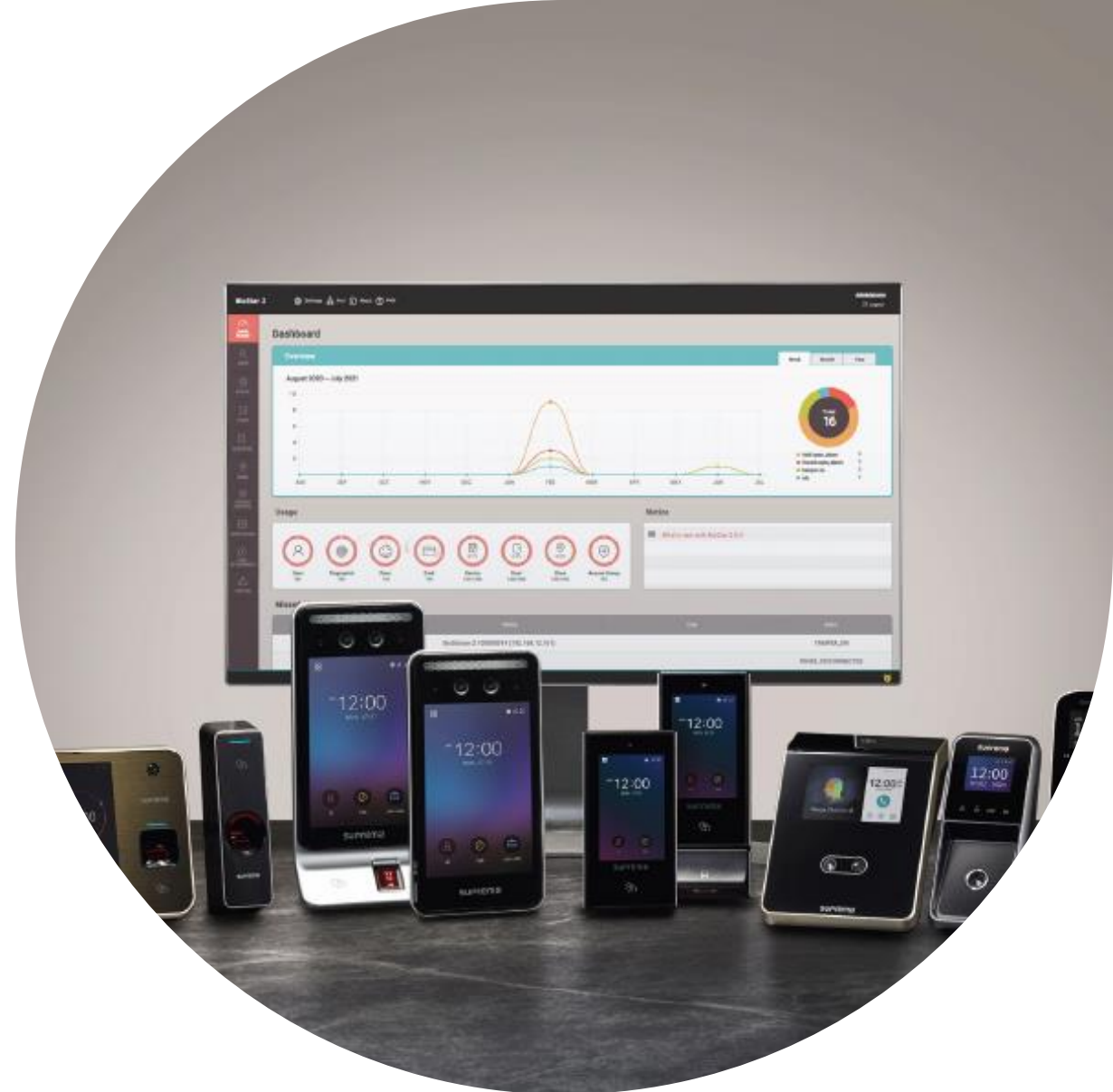
Contents

- 01 | BioStar 2.8.15
- 02 | BioStar 2.8.16
- 03 | BioStar 2.8.17
- 04 | Major Bug Fixes
- 05 | Q&A

01

BioStar 2.8.15

Log4j2 v2.17.1



suprema connect

Improved security vulnerabilities

- Applied Log4j 2 v2.17.1

Improved Automatic User Synchronization performance

- Improved the synchronization speed when adding or modifying doors while using 'Specific Devices' Automatic User Synchronization.
- Improved 'Delete Data & Sync Device' performance when using 'Specific Devices' Automatic User Synchronization.
 - Fixed the problem that the synchronization performance deteriorated by retrieving all user data from all connected devices when 'Delete Data & Sync Device' was performed.

Adjusted the number of threads for Thrift communication between C server and Java server

- Improved API request processing performance by reducing the number of threads used in 'Specific Devices' Automatic User Synchronization.
- Improved to change to 10 if it was less than the minimum value (10) by checking the number of BioStar 2 Thrift threads when running the server.

02

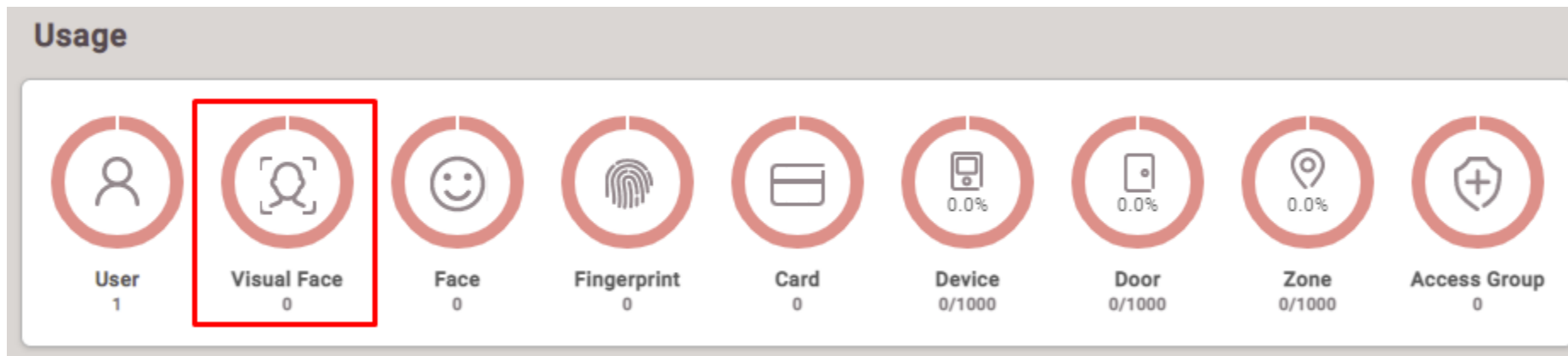
BioStar 2.8.16

BioStar 2 Access Control Improvements



suprema connect

Added visual face to the dashboard



VISUAL FACE

FaceStation F2



FACE

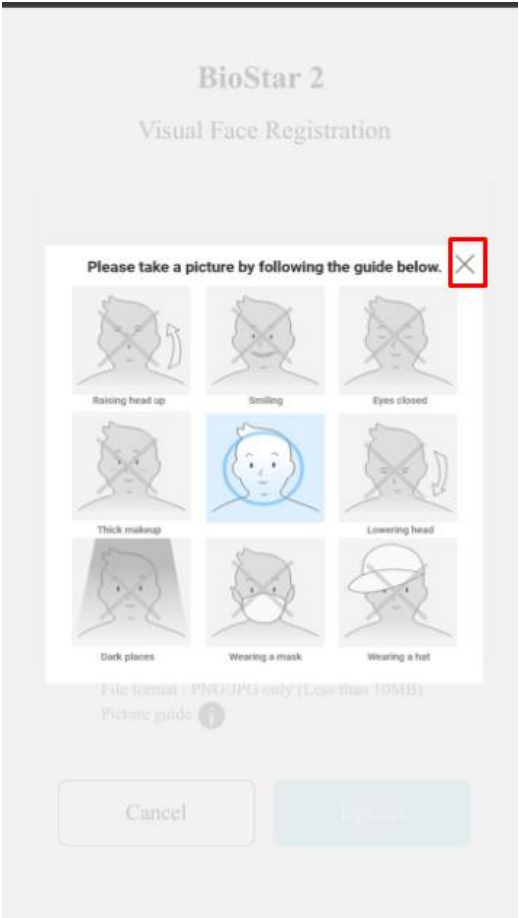
FaceStation 2 & FaceLite



Improved the user interface of Visual Face Mobile Enrollment page

Improved (V2.8.16 -)

Previous (- V2.8.15)



Added footer to email sending the visual face mobile enrollment link

Visual Face Mobile Enrollment

• Visual Face Mobile Enrollment

Use

• Email Title

Email Title is required.

• Company Name

Company Name is required.

• Company Logo

Upload Logo Image

Contact is required.

• Contact

• Footer

Footer

Deleted the option to use user ID as card ID from Enroll QR/Barcode page

Improved (V2.8.16 -)

Previous (- V2.8.15)

Enroll Card

• QR/Barcode Type BioStar 2 QR

Information

• Card ID 164931011863350

• Input Type ☐ Use random card ID

* BioStar 2 QR includes a PIN which is encrypted.

Enroll Cancel

Enroll Card

• QR/Barcode Type BioStar 2 QR

Information

• Card ID 162346636437750645 Use User ID

• Input Type ☐ Use random card ID

* BioStar 2 QR includes a PIN which is encrypted.

Enroll Cancel

Fixed constraint that Wiegand card ID cannot start with 0 (1)

- Allowed 0 to be entered in the first field.
- Imposed restriction that all four data fields cannot consist only of zeros.

The screenshot shows the 'Enroll Card' dialog box in BioStar 2.8.16. The 'Card Type' is set to 'Wiegand', 'Card Data Format' is '26 bit SIA Standard-H10301', and 'Registration Option' is 'Enter Manually'. Under the 'Information' section, the 'Facility Code' is '0' and 'Card ID 1' is '1234'. A red box highlights these two fields. To the right of the fields, a red text label reads 'Wiegand card: 0-1234'. At the bottom are 'Enroll' and 'Cancel' buttons.

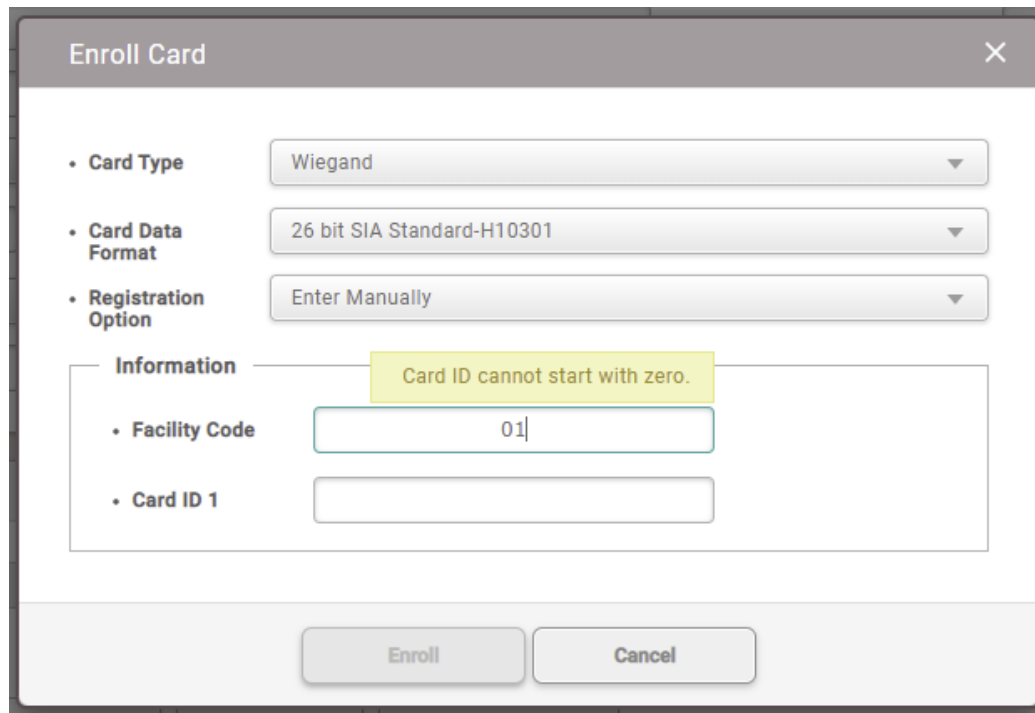
Fixed constraint that Wiegand card ID cannot start with 0 (2)

NOTICE

- This improvement does **NOT** refer to the following cases.

Case 1 - Facility Code is 0XXXX

Case 2 - Card ID is 0XXXX



Enroll Card

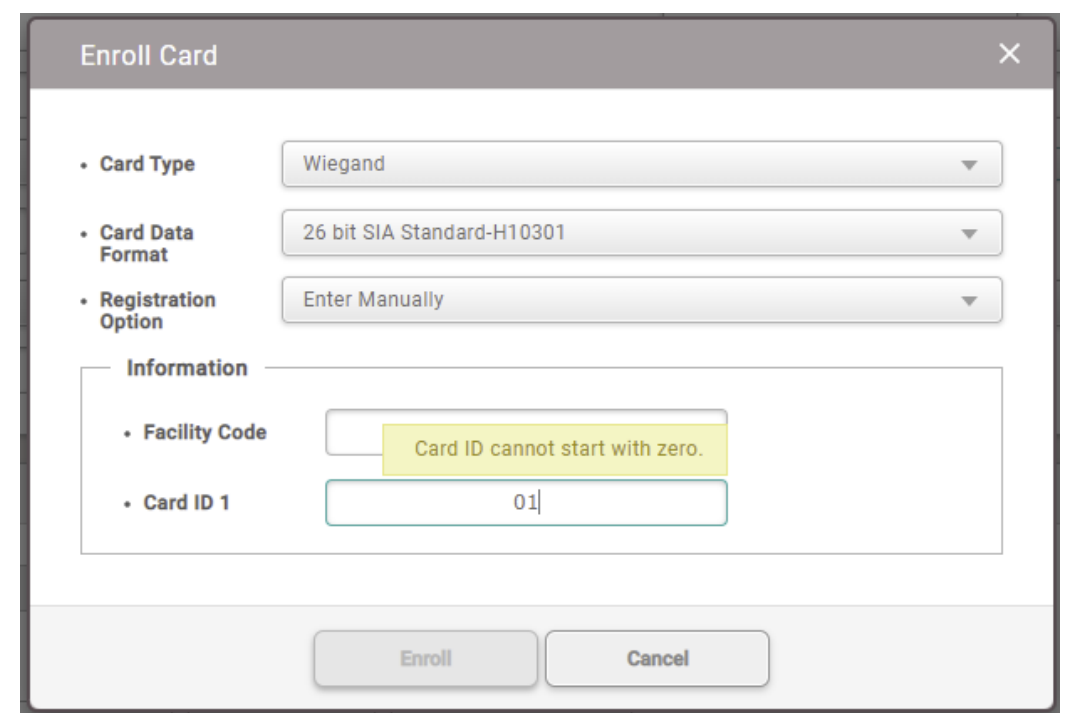
- Card Type: Wiegand
- Card Data Format: 26 bit SIA Standard-H10301
- Registration Option: Enter Manually

Information

- Facility Code: 01
- Card ID 1:

Card ID cannot start with zero.

Enroll Cancel



Enroll Card

- Card Type: Wiegand
- Card Data Format: 26 bit SIA Standard-H10301
- Registration Option: Enter Manually

Information

- Facility Code:
- Card ID 1: 01

Card ID cannot start with zero.

Enroll Cancel

Added Error_Description column to user list file (User_Import_Error) that failed CSV import

- Sample Case - User's expired date exceeds BioStar 2 specification

```
User_20220418T152240.csv
1 user_id,name,department,user_title,phone,email,user_group,start_datetime,expiry_datetime
2 3,CSV Import Test,,,,,All Users,2001-01-01 00:00:00,2050-12-31 23:59:00
3
```

Warning

CSV import completed with some errors. To check CSV data field where the errors occurred, click Download.

Download

Ok

Specification
2030-12-31
23:59:59

user_id	name	departme	user_title	phone	email	user_grou	start_datetime	expiry_datetime	Error_Description
3	CSV Import Test					All Users	1/1/2001 0:00	12/31/2050 23:59	Date/time does not match format.

Added logic to check that AC, TA, VE services do not use the same DB name during custom installation

NOTICE

- If you used the same name for AC, TA, and VE DB in BioStar 2 earlier, you **CANNOT** upgrade to version 2.8.16 or later.

CAN

CANNOT

Database Server Configuration

DB Type: MSSQL

Host: 192.168.X.X\MSSQL12 Port: 1433

	Database Name	Database User	Database Password
AC	BioStar2 ACDB		
TA	BioStar2 TADB		
Video	BioStar2 VEDB		

Test Connection Save

DIFFERENT → OK

Database Server Configuration

DB Type: MSSQL

Host: 192.168.X.X\MSSQL12 Port: 1433

	Database Name	Database User	Database Password
AC	BioStar2 Database		
TA	BioStar2 Database		
Video	BioStar2 Database		

Test Connection Save

SAME → NOK

Added option to delete unassigned card

Card

Unassigned Card

Assigned Card

Blacklist Card

← Unassigned Card

1 / 1

50 rows

Go

🗑️ Delete Card

⋮

<input checked="" type="checkbox"/>	Card Type	Card Data Format	Card ID	User ID	User Name
<input checked="" type="checkbox"/>	CSN		123456	-	-

Added 'Both Devices' option to dual authentication setting to door

Dual Authentication

• Device

No device

No device

Anti-Tailgating

• Sensor

Entry device only


Exit device only

Both devices

Allows connecting X-Station 2 as a slave device of CoreStation (1)

1) Supported models of X-Station 2

- All models; Card only, Card + QR, Card + Fingerprint

		CoreStation 40 542071458 (192.168.12.225)
		XS2-APB 2 547836730
		XS2-ODPB 2 547837559
		XS2-QAPB 547837152

BioStar 2
CoreStation

V2.8.16 or above

V1.5.2 or above

Allows connecting X-Station 2 as a slave device of CoreStation (2)

BioStar 2

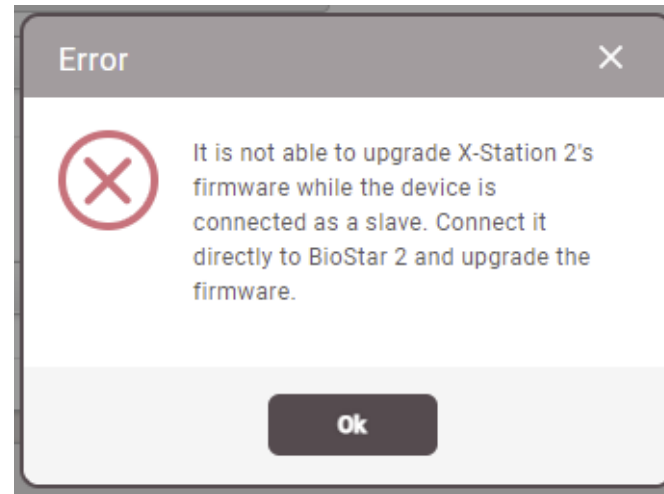
V2.8.16 or above

CoreStation

V1.5.2 or above

2) You **CANNOT** upgrade X-Station 2 firmware during the device is in Slave mode.

- To upgrade X-Station 2 Slave device's firmware, you need to connect the device BioStar 2 directly via Ethernet.



3) You can use 'Secure Tamper' on X-Station 2 Slave device.

• Secure Tamper



* All the users, logs, and encryption key in the device will be removed at the secure tamper event.

4) Image Log setting is **NOT** available during X-Station 2 is in Slave mode.

- Suprema will improve this part in the further releases.

Added Hide Face Credential Preview Image option (1)

- Supports hiding the face preview screen of users registered on the server for privacy protection.

1) How to apply the 'Hide Face Credential Preview Image' function

a. Login BioStar 2 server and go to [Settings > Server > User/Device Management] part.

b. Active 'Hide Face Credential Preview Image' by toggle.

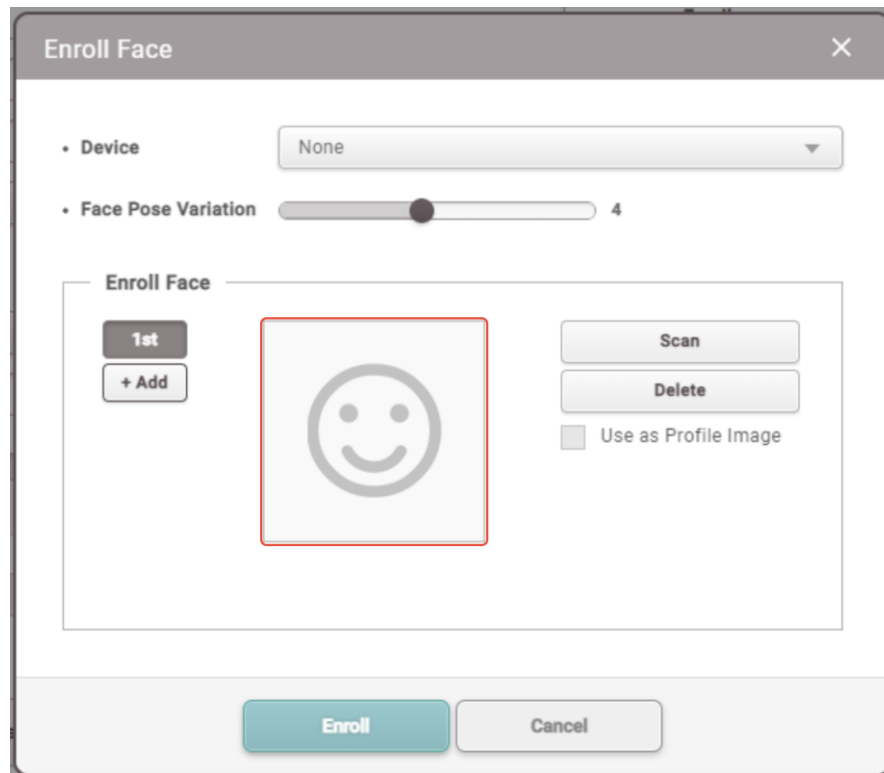
The screenshot shows the 'User/Device Management' settings page. On the left, there is a list of settings: 'Automatic User Synchronization', 'Fingerprint Template Format', 'Enrollment Device', 'Custom User Field', 'Delete personal & credential data when issuing an AoC', 'AC event log storage duration', and 'Hide Face Credential Preview Image'. The 'Hide Face Credential Preview Image' setting is highlighted with a red rectangular box. To the right of this setting is a toggle switch that is currently turned on, labeled 'Active'. Other settings include 'All Devices' for Automatic User Synchronization, 'Suprema' for Fingerprint Template Format, and a table for Enrollment Device with columns 'Device ID' and 'Name'. The 'Custom User Field' section also has a table with columns 'Order' and 'Name'. The 'Delete personal & credential data when issuing an AoC' and 'AC event log storage duration' settings are currently set to 'Inactive'.

Added Hide Face Credential Preview Image option (2)

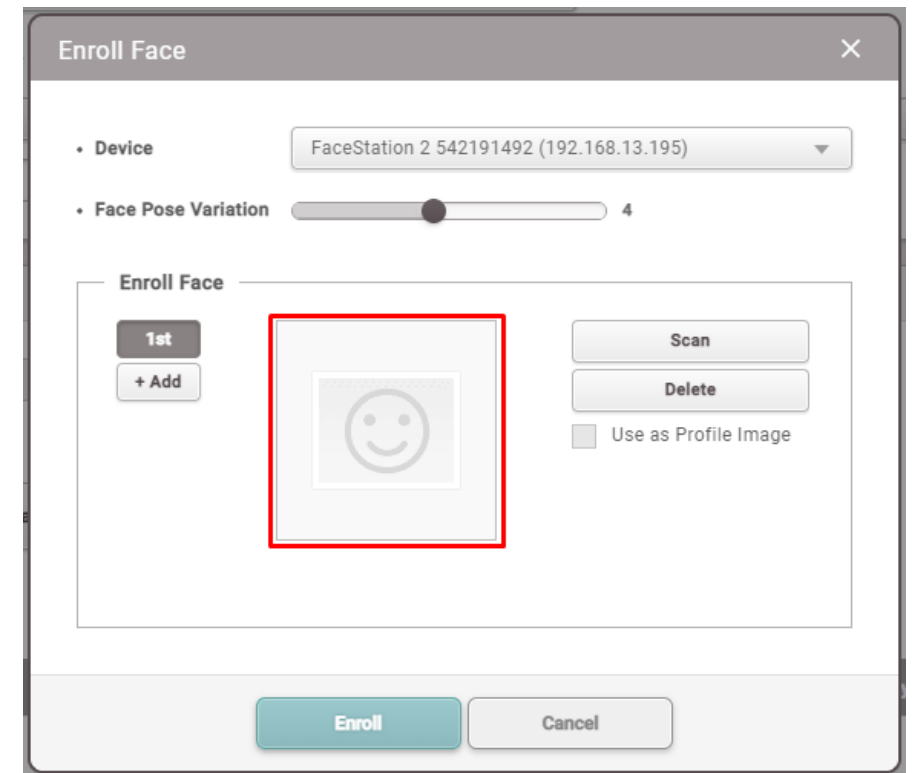
2) How it shows after applying 'Hide Face Credential Preview Image'

a. Face credential: FaceStation 2, FaceLite

Before enrolling face



After enrolling face



Added Hide Face Credential Preview Image option (3)

2) How it shows after applying 'Hide Face Credential Preview Image'

b. Visual Face credential: FaceStation F2

Before enrolling face

Enroll Visual Face

• Device: None

Enroll Visual Face

1st
+ Add

Drop image here

Scan
Upload Image
Delete

☐ Use as Profile Image

Enroll Cancel

After enrolling face

Enroll Visual Face

• Device: None

Enroll Visual Face

1st
+ Add

Drop image here

Scan
Upload Image
Delete

☐ Use as Profile Image

Enroll Cancel

Added Hide Face Credential Preview Image option (4)

2) How it shows after applying 'Hide Face Credential Preview Image'

c. Smart card with Visual Face credential: FaceStation F2

Card Type

Smart Card

Device

FaceStation F2 547835928 (192...

Card Layout Format

test

Smart Card Type

Access On Card

Information

Card ID

3

PIN

Access Group

Period

2001-01-01 00:00~20...

Face Template

☒ Use

Visual Face

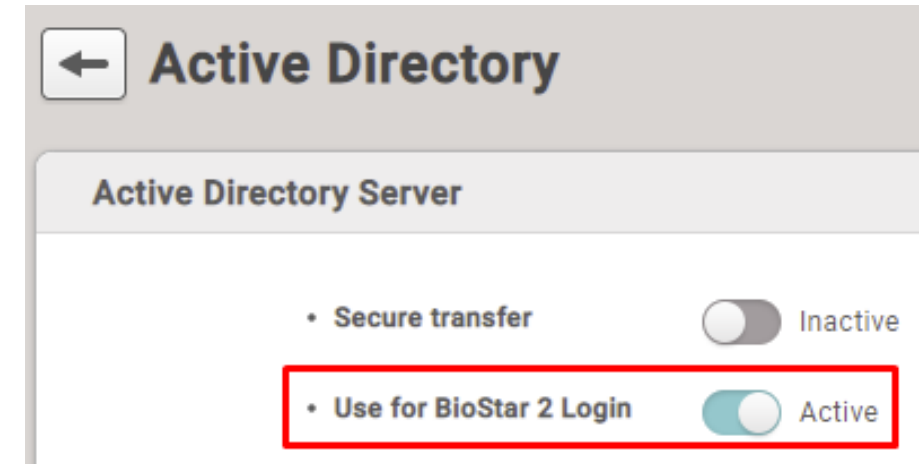
1st

1st Visual Face

Support to log in to BioStar 2 with Active Directory account

1) How to enable the 'Use for BioStar 2 Login'

- Go to [Settings > Active Directory > Active Directory Server].



2) Precautions

- Only Active Directory users synced to BioStar 2 can log in, and you must set operator Level for this user.
- When syncing with Active Directory, Active Directory users who **have the same login ID as the Login ID used in BioStar 2 or whose ID is '1' will be excluded.**
- User ID '1 (Administrator)' can log in to use BioStar 2 if there is an issue such as a system failure in the Active Directory server.

Added relay deactivation option for exit button input

BioStar 2
Device & Firmware

V2.8.16 or above
Check the table

- Added the option to set the door open request log to occur but the relay not to operate when the exit button is pressed.

← Add New Door

Information

• Name

New Test Door

• Group

All Doors

• Description

Configuration

• Entry Device

BioStation 2 546832586 (192.168.13.196)

• Door Relay(•)

Relay 0 of BioStation 2 546832586 (192.168.13.196) Device

• Exit Button

Input Port 0 of BioStation 2 546832586 (192.168.13.196) Device

• Door Sensor

Input Port 1 of BioStation 2 546832586 (192.168.13.196) Device

• Switch

Normally Open

• Does not activate relay

OFF

• Switch

Normally Open

• Use sensor when Entry Confirmed APB enabled

OFF

Device Model	Firmware Version	Device Model	Firmware Version
BioLite N2	v1.5.0 or above	TBD	TBD

Separated the log related to door unlock

- Door Unlocked (Exit Button)
- Door Unlocked (By Operator)

BioStar 2

Device & Firmware

V2.8.16 or above
Check the table

Event

door unlocked

☐

Door unlocked

☐

Door Unlocked (By Operator)☐

Add Condition

Cancel

Device Model	Firmware Version	Device Model	Firmware Version
BioLite N2	v1.5.0 or above	TBD	TBD

Supports setting the byte order for smart cards (1)

- Supports setting the byte order of data to be output to Wiegand or OSDP.

BioStar 2

Device & Firmware

V2.8.16 or above
Check the table

• Smart Card

Enabled

• MIFARE

Classic/Plus

DesFire/DesFire EV1

• iCLASS

SR/SE

SEOS

• Layout

None

• Smart Card Output Byte Order

MSB

MSB

LSB

• Mobile

Enabled

Device Model	Firmware Version	Device Model	Firmware Version
XPass 2	v1.3.1 or above	BioLite N2	v1.5.0 or above
TBD	TBD		

Supports setting the byte order for smart cards (2)

BioStar 2
Device & Firmware

V2.8.16 or above
Check the table

1) This function is supported only when the Suprema device is directly connected to BioStar 2 via Ethernet.

- RS-485 Mode: Default, Master, Slave (but connected via Ethernet)
- You **CANNOT** set when the Suprema device is connected as a slave device of the Suprema device.

2) Options are only applicable for Wiegand output and OSDP output.

- Write Smart Card and Read Card are not affected.

3) Operation according to RS-485 Mode

- Default, Master, Slave (but connected via Ethernet): Operates according to the device's 'Smart Card Output Byte Order' setting.
- When connected to the Slave device of the Suprema device: The Slave transmits the Card ID to the Master device and operates according to the 'Smart Card Output Byte Order' setting in the Master device.

Supports setting the byte order for smart cards (3)

BioStar 2

Device & Firmware

V2.8.16 or above

Check the table

4)Operation according to Wiegand Output

- When Output info is Card ID: Operates according to the setting.
- When Output info is User ID: Not influenced.

5)Actions according to the card type

- MIFARE, DESFire: Operates according to the 'Smart Card Output Byte Order' setting.
- iClass: Not influenced. Output PAC data as it is.
- BioStar 2 QR: Not influenced.

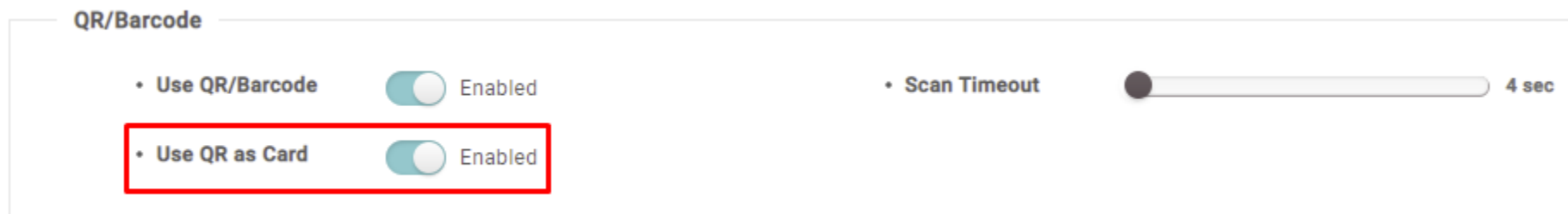
Added the Use QR as card option (1)

BioStar 2	V2.8.16 or above
Device & Firmware	X-Station 2

- Supports selecting whether to allow authentication when the QR data scanned by the device is the same as the card data issued to the user.

1. Feature notice

- 'Use QR as Card' is available only when 'Use QR/Barcode' is Enabled.
- This function is not supported for **BioStar 2 QR**.
- This function is not supported for **Smart Card**.



Added the Use QR as card option (2)


BioStar 2

Device & Firmware

V2.8.16 or above
X-Station 2

2. Sample user scenario

1) A user (user ID 2. Tom) has been assigned a CSN card.

Type	Card Data Format	Summary	
CSN	-	ID: 1251686652985216	<div>Block</div> 

2) Prepare the X-Station 2 QR model device.

**** For comparison, we prepared one device supported by the [Use QR as Card] function and one not supported.**

<input type="checkbox"/>	547837141	X-Station 2 547837141 (192.168.13.117)	All Devices	[Use QR as Card] not supported	X-Station 2
<input type="checkbox"/>	547837219	X-Station 2 547837219 (192.168.13.187)	All Devices	[Use QR as Card] supported	X-Station 2

3) User Tom taps the CSN card (RF card) he has on the X-Station 2. At this time, both X-Station 2 return 'Access Granted' for user Tom.

Date	Door	Elevator	Device ID	Device	User	Zone	Event
2022/04/23 11:42:48			547837219	X-Station 2 547...	2(Tom)		1:1 authentication succeeded (Card)
2022/04/23 11:42:47			547837141	X-Station 2 547...	2(Tom)		1:1 authentication succeeded (Card)

Added the Use QR as card option (3)

BioStar 2

Device & Firmware

V2.8.16 or above
X-Station 2

2. Sample user scenario

4) Generates a QR code with the same value as the CSN that Tom has.

QR type	QR value	QR sample
Free Text	1251686652985216	

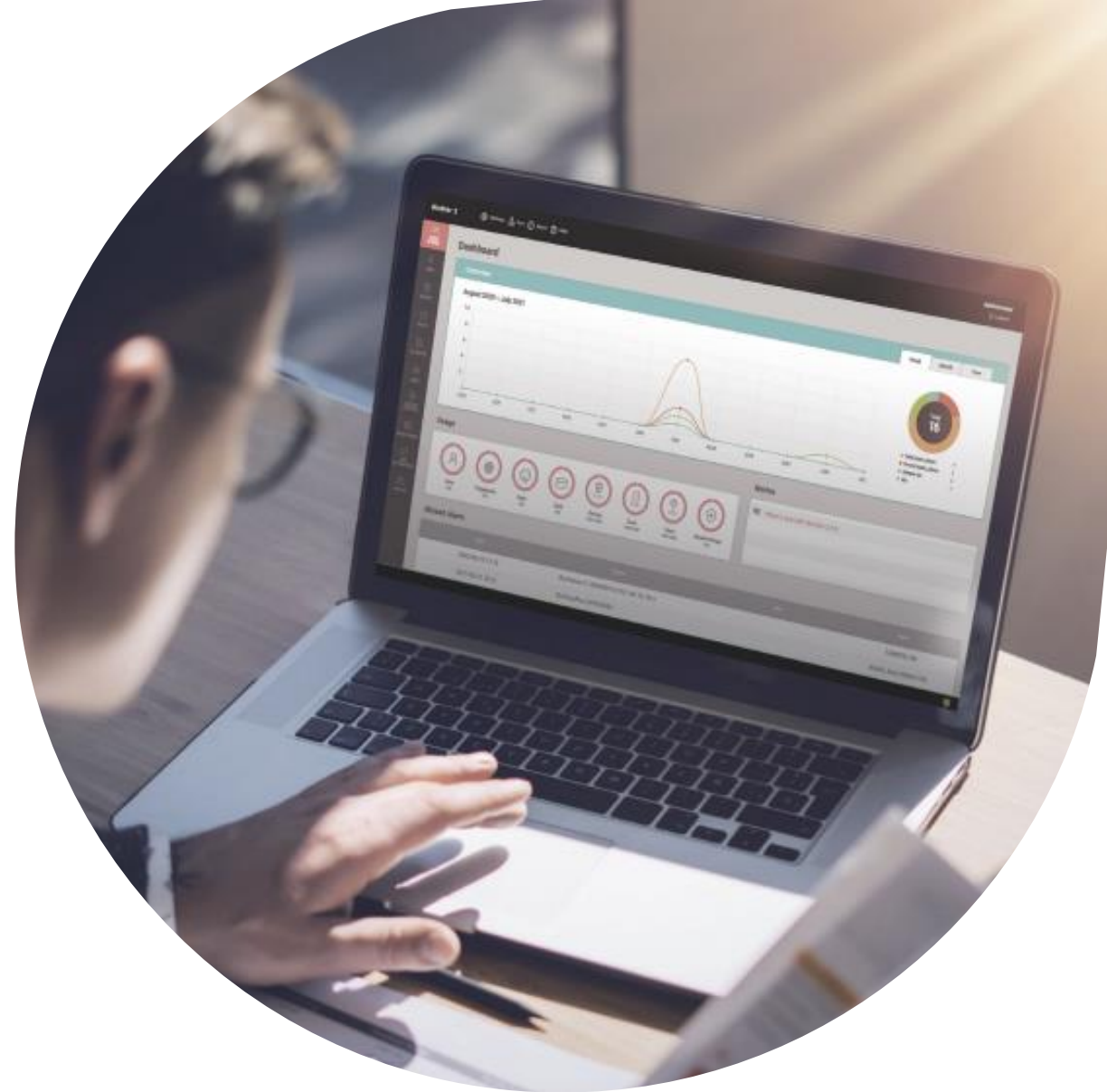
5) User Tom tries to authenticate on X-Station 2 with the above QR code. Only enabled devices with the [Use QR as Card] function will return 'Access Granted.'

Date	Door	Elevator	Device ID	Device	User	Zone	Event
2022/04/23 11:48:35	[Use QR as Card] supported	→	547837219	X-Station 2 547...	2(Tom)		1:1 authentication succeeded (Card)
2022/04/23 11:48:05	[Use QR as Card] not supported	→	547837141	X-Station 2 547...	1251686652985216(-)		1:1 authentication failed (Card)

03

BioStar 2.8.17

BioStar 2 Time Attendance Improvements



suprema connect

Improved Time & Attendance security vulnerabilities

- Restricted unsupported cipher suites from server settings
- Updated DB driver to the latest version
- Updated jQuery to the latest version
- Added security check while using Time & Attendance API through websocket

Supports deleting Time & Attendance punch logs after a certain period

1. When the function is activated, the **ENTIRE** T&A records that have exceeded the storage deadline as shown below:
 - Synchronized punch logs from the AC DB (records authenticated by the device)
 - Modified punch logs manually modified by administrators, etc.
 - Leave records manually set by administrators, etc.
2. It is **HIGHLY** recommended to back up the BioStar 2 DB before using this function.
 - Once applied, all the already deleted attendance and leave records cannot be restored.
 - Ex) If you previously set it to 30 days and then changed it to 60 days, the 30-day record corresponding to the difference between the two settings is not stored in the DB and cannot be restored.

Punchlogs

✓ Apply

• Punchlogs storage duration

Active

60

day(s)

Improved the API creating modified punch logs to have custom device names (1)

POST

/punch_logs

Implementation Notes

Create New Punch Log

Data Type

Model | Model Schema

```
{
  "device_date_time": "string",
  "device_id": "string",
  "device_name": "string",
  "type": "string"
}
```

1

SELECT * FROM biostar_tna.punchlog;

Result Grid

Filter Rows:

Edit:

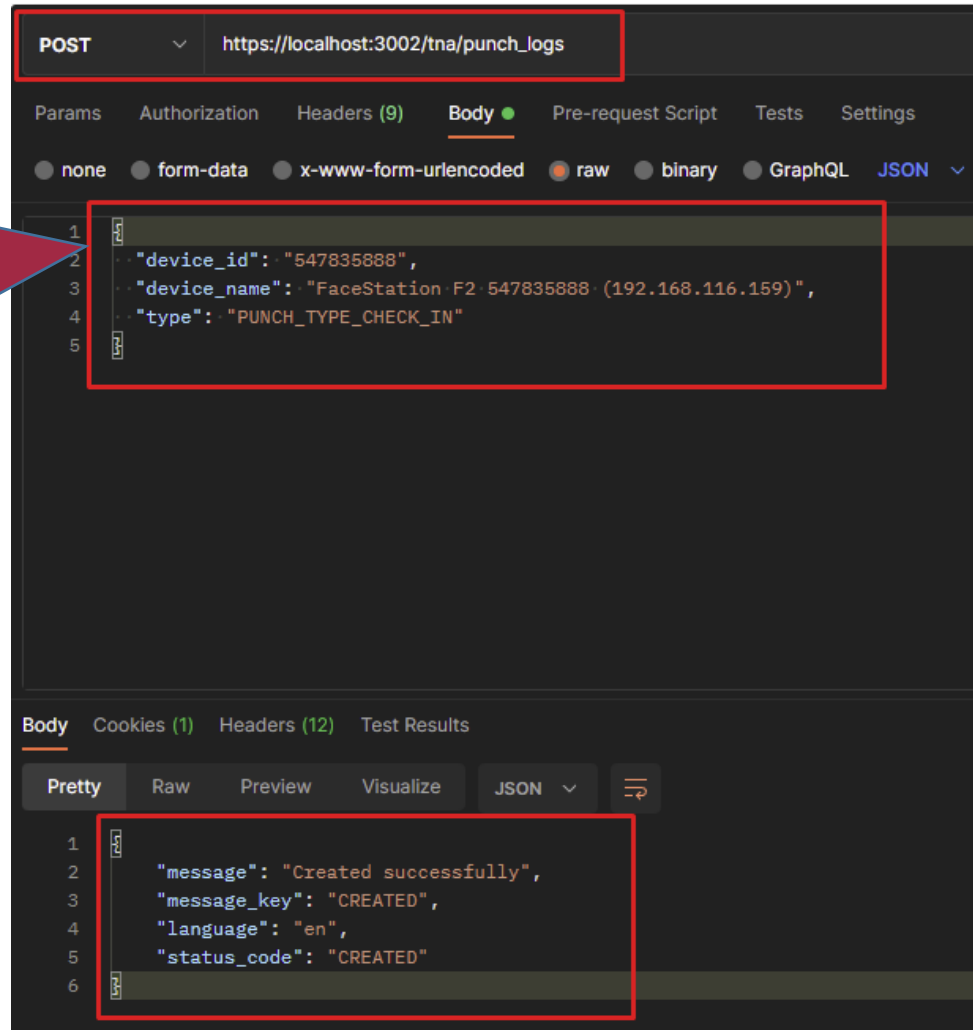
Export/Import:

Wr

id	devdt	devid	devnm	user_name
59	2022-08-01 17:22:22	808	testdevice	Administrator

Improved the API creating modified punch logs to have custom device names (2)

If you do not put "device_date_time" value, the punch log will be created with the CURRENT DATETIME.



Improved the API creating modified punch logs to have custom device names (3)

Before

Edit Punch Logs

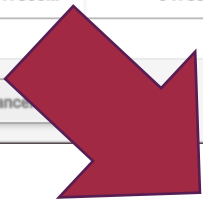
2022/08/18(Thu)

Add

Punch Time	Punch Type	Device	Device ID	
2022/08/18 14:22:56	Check In	FaceStation F2 547835...	547835888	

Ok

Cancel



After

Edit Punch Logs

2022/08/18(Thu)

Add

Punch Time	Punch Type	Device	Device ID	
2022/08/18 14:22:56	Check In	FaceStation F2 547835...	547835888	
2022/08/18 14:43:54	Check In	FaceStation F2 547835...	547835888	

Ok

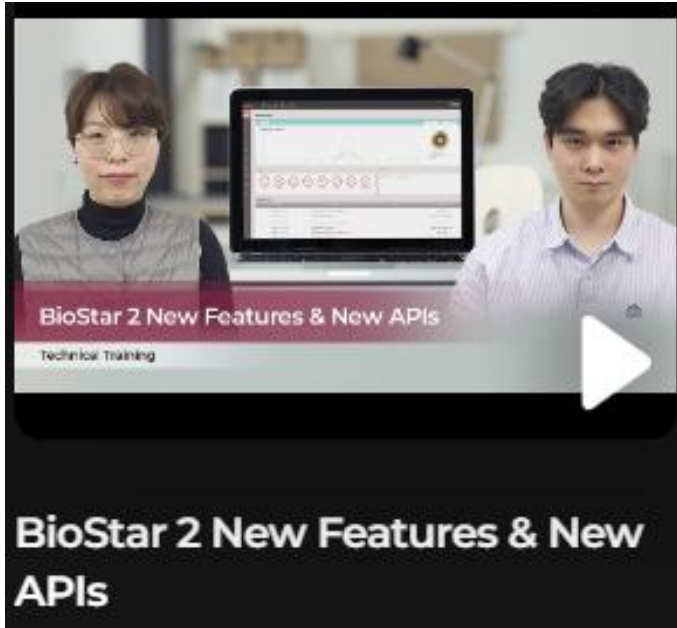
Cancel

Improved the API creating modified punch logs to have custom device names (4)

How to use BioStar 2 TA API?

Visit Suprema Connect






- <https://www.supremainc.com/connect/index.asp>
- Check out from 16:37



Visit Suprema Technical Support

- <https://support.supremainc.com/en/support/solutions/folders/24000012938>

BioStar 2 TA API (20)

-  [\[BioStar 2 TA API\] How to use and start BioSt...](#)
-  [\[BioStar 2 TA API\] How to retrieve REPORT in...](#)
-  [\[BioStar 2 TA API\] Create Time Codes](#)
-  [\[BioStar 2 TA API\] Search Time Codes](#)
-  [\[BioStar 2 TA API\] Modify Time Codes](#)
- [» See all 20 articles](#)

04

Major Bug Fixes



suprema connect

BioStar 2.8.15

1. DB Lock occurred when user data changes frequently, such as adding, deleting, or editing, were made in a short period of time during Automatic User Synchronization (Affects version: v2.7.14).
2. In the MS SQL Server database environment, BioStar 2 did not operate normally if more than 526 user groups or users were set in the access group when using 'Specific Devices' Automatic User Synchronization (Affects version: v2.8.14).
3. The data of the already deleted devices were logged in the user synchronization fail table when using 'Specific Devices' Automatic User Synchronization (Affects version: v2.7.11).

Major Bug Fixes

BioStar 2.8.16 (1)

** Please check the Revision Note document for details.*

1. The screen displayed abnormally when entering the details page of the disconnected slave device (Affects version: v2.8.6).
2. Description of the photo value of POST/api/users was incorrectly written as binaryDatas (Affects version: v2.7.12).
3. CSN card, smart card, and mobile card activation settings of BioEntry W2 (BEW2-OHP) device were not saved (Affects version: v2.7.6).
4. In an environment using MS SQL Server database, If the Output Module (OM-120), a slave device of CoreStation, was deleted, the device list was not queried (Affects version: v2.8.12).
5. Encryption migration failed in the decryption environment (Affects version: v2.8.0).
6. Visual Face data intermittently not syncing to other devices (Affects version: v2.8.6).
7. When a user is deleted from Manage Users in Device, other information in the synchronization table was also deleted and synchronization failed (Affects version: v2.4.0).
8. Users using custom user field were not updated during 'All Devices (including user update from device)' automatic user synchronization (Affects version: v2.8.0).
9. Target of the audit trail was output in the format of 'eventType.number' when alert setting changed (Affects version: v2.8.9).
10. Airfob Portal connection failed with unknown error message (Affects version: v2.7.12).
11. Access level could be assigned on a device with full access enabled (Affects version: v2.4.0).
12. If the relay was not set, user could not create a door, but the previously added door was saved without setting the relay (Affects version: v2.5.0).

Major Bug Fixes

BioStar 2.8.16 (2)

** Please check the Revision Note document for details.*

13. The log recorded in the real-time log could not be queried in the event log (Affects version: v2.8.4).

14. Temperature measurement error pop-up messages showed only the user ID but not the name (Affects version: v2.8.11).

15. Daylight Saving Time (DST) setting not reflected in image log time (Affects version: v2.0.0).

16. VIDEO menu not accessible when using subdomain (Affects version: v2.6.0).

17. When using Personal Information DB Encryption, if user information was edited in Active Directory and then synchronized, the changes were not synchronized (Affects version: v2.8.0).

18. When updating user information using the API, an 'E-mail already exists' message was returned if the same email was maintained (Affects version: v2.0.1).

19. 'Visual Face Extraction Failed' event not searchable through the event log filter (Affects version: v2.8.10).

20. Symbols could be entered through API even though it does not support the use of symbols when entering department and title in user information (Affects version: v2.8.9).

21. Certain symbols (-) could not be entered in the name of a user who issued the QR/Barcode (Affects version: v2.8.11).

22. Error message displayed when the 'Connect' button on the mobile access setting screen was clicked while the mobile access is set (Affects version: v2.8.14).

23. Fingerprint scan request runs twice when enrolling a fingerprint with the USB enrollment device (BioMini) in an environment using the latest version of Chrome (Chrome 98) (Affects version: v2.0.0).

24. Failure to function properly when exporting some T&A reports more than two pages PDF (Affects version: v2.8.14).

Major Bug Fixes

BioStar 2.8.17

1. 'Floating shift' not being able to set 'Punch in granted time range' to start from 00:00 (Affects version: v2.7.2).
2. 'Floating shift' not being able to set the time segment from 00:00 to before the 'Day start time' (Affects version: v2.7.0).
3. Not able to access the Time & Attendance menu when changing the server protocol to HTTP from HTTPS (Affects version: v2.8.10).
4. Searching users in a specific language doesn't work in an environment using MS SQL Server database (Affects version: v2.2.1).
5. Work time not calculated correctly when using 'First check-in & Last check-out' and 'Meal deduction' configured as 'Fixed' at the same time (Affects version: v2.7.0).
6. 'T&A Required' option could not be changed to No from Yes when device's 'T&A Mode' is set as 'By User' from the Time & Attendance Setting menu (Affects version: v2.8.5).
7. Users get deleted intermittently from Time & Attendance menu when moving users to another user group and deleting the previous group itself (Affects version: v2.8.9).
8. Reports not being generated when operators logged in concurrently (Affects version: v2.2.1).
9. Custom fields get applied only after 2 attempts from the column settings of the reports' 'Filter Conditions' (Affects version: v2.7.9).
10. Filter conditions not showing the full result of user group search once the search result gets deleted and followed by another user group (Affects version: v2.2.1).
11. Deleted users from BioStar 2 still appears in the Time & Attendance menu (Affects version: v2.8.16).
12. When the Device Setting is changed after the T&A service is started, the "Login Required" Alert pop-up continuously occurs (Affects version: v2.8.9).

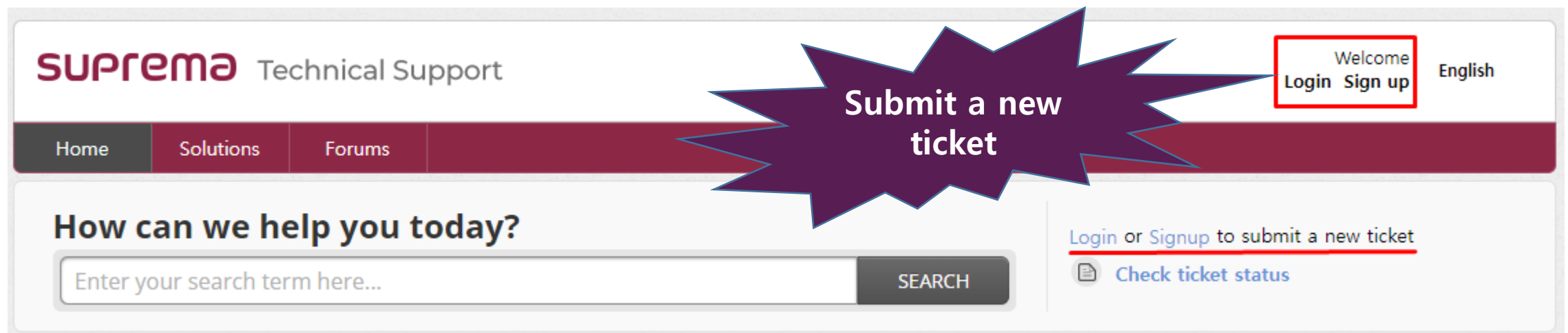
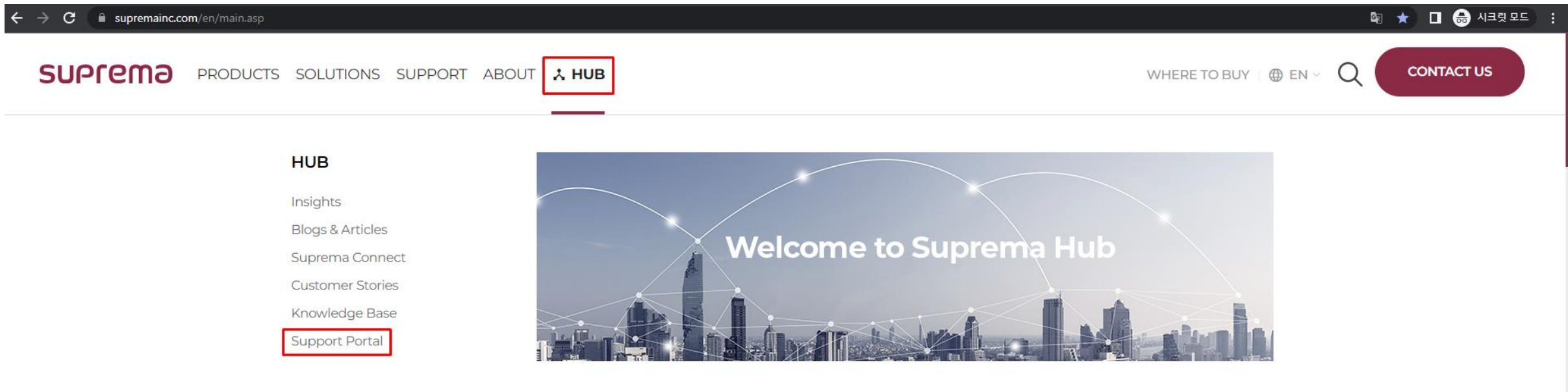
05

Q&A



suprema connect

How can you ask questions on on-demand webinar?



Thank you.