



Checkmate Data Collector

Operations Guide

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About This Guide

This guide provides operational instructions for the CHECKMATE Data Collector. The first part of the guide describes all non-administrative tasks a user can perform. The second part of the guide describes the administrative tasks an administrator can perform.

Document Conventions

Convention	Description
Bold	Identifies elements on a screen.
ThinFont	Identifies storage locations, like the location where to install the software.
UPPERCASE	Identifies keyboard keys.
Italic	Identifies variables for which you must enter a value.
Monospace font	Identifies messages displayed by the system.
{}	Indicates a set of choices from which you must choose one. Type only the information inside the curly braces. Do not type the {} symbols
I	Separates two mutually exclusive choices in a syntax line. Type one of these choices. Do not type the symbol.
[]	Indicates one or more options. Type only the information inside the square brackets. Do not type the [] symbols.
	Indicates that you can type multiple options pf the same type. Type only the information/ Do not type the ellipsis ().

General Overview CHECKMATE Data Collector

The CHECKMATE Data Collector is a server application that is able to receive Probill messages send by CHECKMATE, a mobile app for capturing the barcode, dimensions and optionally the weight of one or more parcels/pallets.

Figure 1 describes the complete message flow for a Probill message send by a handheld/PDA running the CHECKMATE app to the CHECKMATE Data Collector.

The handheld/PDA and the CHECKMATE Data Collector (CDC) are connected via a network. The handheld/PDA has a wireless connection via Wi-Fi and the CDC is either connected to the network using a cable connection or is via Wi-Fi.

The CHECKMATE Data Collector is installed on a (virtual)machine having a static IPaddress, see *CHECKMATE Data Collector – Installation Guide*. The static IP-address is used in the CHECKMATE app to specify the endpoint where Probill messages will be delivered.



Figure 1 Connectivity CHECKMATE components

The CHECKMATE app is configured to connect:

- 1. via Bluetooth with:
 - a. The Cubetape device for capturing the barcode and dimensions of a parcel/pallet; Before scanning
 - b. A (mobile) scale for capturing the weight of a parcel/pallet. (optional)

The Cubetape and the (mobile) scale (if used) must be paired with the Handheld/PDA running the CHECKMATE app.

2. via Wi-Fi with the CHECKMATE Data Collector to deliver and persist the captured Probill messages.



Figure 2 Process flow Probill message transmission

Process steps:

- 1. The barcode of a parcel/pallet is scanned by the Cubetape device.
- 2. The barcode is sent to the Checkmate app.
- 3. The dimensions of the parcel are captured by the Cubetape device
- 4. The dimensional data is sent to the Checkmate app.

If a (mobile) scale is configured, then an additional step is executed to capture the weight and send it to the CHECKMATE app.

- 5. A maximum of four photos can be taken and registered together with the other captured Probill data in the CHECKMATE app.
- 6. The captured data is confirmed and send together with the following meta data to the CHECKMATE Data Collector:
 - a. Timestamp of registration
 - b. ID of the Handheld/PDA
 - c. Operator ID
 - d. Alias of the Cubetape Device
 - e. Units of measurement and weight
- 7. The CHECKMATE Data Collector (CDC) persists the data and photo's in the message and service log, see *Message Log*.
- 8. The received probill message data is written to a CSV file.

NOTE: In the case that the message has been received and processed before (same barcode and same Handheld/PDA device id), the receipt of the message is confirmed to the CHECKMATE app but it's not written again to the CSV file.

The CDC may create multiple CSV files depending on its configuration, see *app.output.csv.probill.content*.

Operational Tasks

This section describes the following operational controls of the CHECKMATE Data Collector for a regular user:

- Dashboard
- □ Reporting
- □ Logging
- □ Help

Dashboard

The moment a user logs into the CDC web interface the Dashboard is shown, see Figure 3. The CDC Dashboard provides an overview of the status of the CHECKMATE Data Collector (CDC).



Figure 3 CDC Dashboard

The following status information is shown on the dashboard

Registration Information

- **Registration Total**, the total number of registered messages in the message log, see *Message Log;*
- Number of Registrations per Operator, a bar chart showing the total number of messages registered per operator of a Handheld/PDA device;
- Number of Registrations per Device, a bar chart showing the total number of messages registered per Handheld/PDA device.



Figure 4 Mouse over showing registration count.

Software License

• **Registered Licensed Devices**, a gauge meter showing the percentage of the total number of licensed devices that has been registered. With a mouse-over movement the absolute numbers are shown, see Figure 5 and Figure 6.







Figure 6 Mouse over showing the available device count

License Notifications

The CDC Dashboard displays every License notification that requires an action, for example Figure 7 indicates that the license will expire in 13 days. The *Administrator* of the CDC needs to enter an updated license key, see *License Management*.

и эосиветаре	DASHBOARD	REPORTING	LOGGING -	ADMINISTRATION -	1 Administrator -	0	۵
Checkmate Data Collect	or (CDC) -	Dashbo	bard				
ATTENTION! License will expire in 13 days at 31 augustus 2019 18:29:4	8, contact your local sales	representative to	renew your licen	se. (License Managemer	nt)		
Registration Information							
	Regist	ration Tota	I				

Figure 7 Dashboard with a License Notification

Message Log

The Message Log can be accessed via **LOGGING/Message Log.** It shows all messages received by the CHECKMATE Data Collector (CDC), see Figure 8.

III →)) CUBETAPE			DASHBOARD	REPORTING	LOGGING -	ADMINISTRATION -	1	Administrator +	0	۵
Message Lo	og									
Con Note ID Enter con note identifier	Date	m / dd / jjjj		Search						
« « <mark>1</mark> 2 3	4 5 >	0	0	B	Data					
Timestamp	Allas	Con Note Id	Operator Id	Registration	Data				Phot	.0'S
2019-08-18 18:25:18.0004	Warehouse_I	/1234567807	Axei	Pieces: 1, Dimen	sions: 54x67x75 0	m (LXBXH), Weight:568 kg				
2019-08-18 18:25:12.0332	37:3E:7A:C5:11:08_Allas	0000705405	John	Pieces: 1, Dimen	sions: 43x45x80 c	m (LXBXH), Weight:568 kg	J			
2019-08-18 18:25:07.0024	28:34:6B:5D:B3:12_Allas	7102456700	Sandra	Pieces: 1, Dimen	sions: / 5x46x/9 0	m (LXBXH), Weight:8566 k	g			
2019-08-18 18:22:02:0099	37:3E-7A-C5-11-08 Aliae	1234567806	John	Pieces: 1, Dimen	sions: 65x43x56 r	m (LXBXH), Weight-345 kg				,
2019-08-18 18:24:51 0754	28-34-88-5D-83-12 Alias	0098765404	Sandra	Pieces: 1 Dimen	eione: 98x37x34 (m (LxBxH), Weight:422 kg				
2019-08-18 18:24:45.0744	Warehouse I	7123456708	Axel	Pieces: 1, Dimen	isions: 76x56x80 (m (LxBxH), Weight:42 kg				,
2019-08-18 18:24:40.0369	37:3E:7A:C5:11:08 Alias	1234567805	John	Pieces: 1. Dimen	sions: 32x67x79 c	m (LxBxH). Weight:234 kg	ı. (alibi	number=457)	-	,
2019-08-18 18:24:35.0332	Warehouse_I	7123456707	Axel	Pieces: 1, Dimen	sions: 43x59x68 d	m (LxBxH), Weight:780 kg			~	,
2019-08-18 18:24:30.0571	Warehouse_I	7123456706	Axel	Pieces: 1, Dimen	sions: 78x59x56 d	m (LxBxH), Weight:65 kg			-	,
2019-08-18 18:24:25.0723	37:3E:7A:C5:11:08_Alias	1234567804	John	Pieces: 1, Dimen	sions: 76x37x23 d	m (LxBxH), Weight:67 kg,	(alibi r	number=547)	-	,
2019-08-18 18:24:20.0210	Warehouse_I	7123456705	Axel	Pieces: 1, Dimen	sions: 54x15x35 d	m (LxBxH), Weight:8756 k	g		-	
2019-08-18 18:24:14.0543	28:34:8B:5D:B3:12_Alias	0098765403	Sandra	Pieces: 1, Dimen	sions: 78x32x56 c	m (LxBxH), Weight:8589 k	g		-	•
2019-08-18 18:24:08.0600	Warehouse_I	7123456704	Axel	Pieces: 1, Dimen	isions: 23x45x89 c	m (LxBxH), Weight:65 kg			~	•
2019-08-18 18:24:02.0927	Warehouse_I	7123456703	Axel	Pieces: 1, Dimen	isions: 75x89x57 d	m (LxBxH), Weight:6453 k	g		-	•
2019-08-18 18:23:56.0458	37:3E:7A:C5:11:08_Alias	1234567803	John	Pieces: 1, Dimen	isions: 65x46x46 d	m (LxBxH), Weight:75 kg,	(alibi r	number=456)	~	•
2019-08-18 18:23:41.0616	Warehouse_I	7123456702	Axel	Pieces: 1, Dimen	sions: 134x75x65	cm (LxBxH), Weight:45 kg	Į.		~	•
2019-08-18 18:23:32.0684	28:34:8B:5D:B3:12_Alias	1234567802	John	Pieces: 1, Dimen	sions: 154x54x68	cm (LxBxH), Weight:57 kg	, (alibi	number=234)	~	
2019-08-18 18:10:17.0957	28:34:8B:5D:B3:12_Alias	0098765402	Sandra	Pieces: 1, Dimen	sions: 134x67x68	cm (LxBxH), Weight:456 k	g		~	•
2019-08-18 18:10:03.0488	Warehouse_I	7123456701	Axel	Pieces: 1, Dimen	sions: 123x57x86	cm (LxBxH), Weight:78 kg	1		~	•

Figure 8 Message Log

The following data is persisted in the message log on receipt of any message:

- **Timestamp**, the timestamp of the receipt of the message by the CDC. It's explicitly not the timestamp of the time the operator registered the dimensional data. The latter is written into the CSV file.
- Alias, the configured alias for the Handheld/PDA device registering the dimensional and weight data.
- **Con Note Id**, the unique identifier (barcode) of a pallet/parcel. The Con Note Id is a hyperlink to the *Message Detail Page*.
- **Operator Id**, the alias sent by the handheld/PDA representing the user of the device.
- Registration Data, an abbreviated representation of the data captured by the handheld/PDA
- Photos, a flag indicating if one or more photos were received.

Message Detail Page

The message detail page displays the data captured by the CHECKMATE app that is received by the CDC.

III WCUBETAPE		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	Ŧ	Administrator -	0	¢
Message Lo	g Detail								
Message Log / Message I	Log Detail								
Send Email Download a	as PDF								
Parcel/Pallet									
Date Registered	24-07-2019								
Time Registered	14:39								
Con Note ID	7123456710								
Barcode	7123456710								
Dimensions[/Weight]	Pieces: 1, Dimensions: 54x67x75 c	m (LxBxH), Weight	:568 kg						
Photos									
	10:0C:6E:D2:11:E6_7123456710_Pho	toOne							

Download as PDF

The data and photos shown on the page can be saved and downloaded as a PDF:

- Click DOWNLOAD AS PDF
- Specify required action on downloaded PDF (Open or Save)



Figure 9 Download as PDF

Send Email

The message detail information can be send using email to anyone to would like to inform about the receipt, see Figure 10

∭ "СИВЕТАРЕ		DASHBOARD	REPORTING	LOGGING-	1 john -	Ø
Email Registr	ration Details					
Message Log / Message Log	g Detail / Email Registration Details					
	CC BCC From					
То	info@parceltools.eu					
Subject	Damaged parcel received					
Hi, We have <u>received</u> a <u>damage</u> Kind <u>regards</u> , John	ed parcel from you today, see attchment, delivered by Speedy G.					
	Send Cancel	parce	I_registration.pdf			



IMPORTANT: this functionality requires the Email/SMTP server to be configured, see *Email/SMTP Settings*

Reporting

Reporting provides an overview of all created CSV files containing the dimensional data recordings of Cubetape devices. Each listed CSV file can be downloaded and deleted from here.

Download CSV-File

To download a CSV file perform the following steps:

- Click the **REPORTING** menu
- Click DOWNLOAD, see Figure 11

∭-«))CUBETAPE			DASHBOARD	REPORTING	LOGGING+	L john≁	0
Reporting							
Filename	Last Modified						
2019-08-18_probill.csv	18-08-2019 18:25:18	Ŧ					
2019-08-15_probill.csv	15-08-2019 06:50:34	Ŧ					
2019-07-26_probill.csv	26-07-2019 10:49:15	Ŧ					
2019-07-24_probill.csv	24-07-2019 08:59:18	Ŧ					

Figure 11 Reporting

• A popup window will appear asking if you will open or download the file. When choosing to open the file you can select the editor of your choice, like for example Microsoft Excel.

Delete CSV-File

To delete a CSV file the user should have administrator privileges, see *Update User* to change user privileges or see *Reporting – Delete CSV file* on how to delete a CSV file using the CDC web interface.

User Profile

To access CDC web interface, you need to login with a Username and Password.

The administrator Username is Administrator and the Password is manage.

Logout

Through the User menu a user can Logout when he is logged in.

Change Password

Every user, except for the Administrator user can change their password.



Help

The help menu provides access to several resources that provide information on how to use the CHECKMATE Data Collector.



Figure 14 Help menu

Operations Guide

This manual can be accessed through the **Operations Guide** menu item of the help menu.

Contact Us

Through the **Contact Us** menu item you can sent an email to the CHECKMATE Data Collector Support team.

About

The about page displays the version of the installed CHECKMATE Data Collector.

It also displays the IP-address(es) of the CDC. This information is useful when configuring the handheld/PDA device, see Figure 15.



Figure 15 CDC About page

Administrative Tasks

This section describes the following Administrative tasks for the CHECKMATE Data Collector:

- **User Management**
- License Management
- **Device Management**
- □ Settings
- □ Logging Configuration
- □ Logging Archive
- **Reporting Delete CSV**
- □ Restart/Stop Server

To perform an Administrative task, you need to be logged in to the CDC as **Administrator**.

User Management

As an Administrator you can create new users which can login to CDC web interface.

User Management provides the following functionality:

- Show Registered Users
- Add User
- Update User
- Delete User

The different functions are described in the following sections.

Show Registered Users

To see which users are registered, perform the following step:

• Click the ADMINISTRATION/User Management menu (Figure 16)

		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	ł	Administrator -	0	\$
User Man	agement								
Username	Enabled								
Administrator	\checkmark								
john	V 💉 🗙								
New									

Figure 16 User Management - Registered Users Overview

Add User

To add a new user, perform the following steps:

- Click the ADMINISTRATION/User Management menu (Figure 16)
- Click NEW, see Figure 17

Ш҄҄҈сиветаре		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	💄 Administrator 🗸	Ø	\$
New User								
Username	Enter a unique username for user							
Password	Enter password for user							
Enabled								
Administrator								
	Add Cancel							

Figure 17 New User

- Enter the required user data:
 - **Username**, the username has to be unique.
 - **Password**, there are no restrictions on the length and/or content of the password.
 - **Enabled**, should the user be enabled for logging in to the CDC web interface or not (yet). Checked is yes
 - Administrator, should the user have Administrator privileges. Checked is yes.
- Click ADD to add the user to the CDC.

Update User

The following attributes can be updated for any user except for the user Administrator.

It's not possible to update any attribute of or disable the **Administrator** user!

To update an existing user, perform the following steps:

- Click the ADMINISTRATION/User Management menu (Figure 16)
- Click UPDATE () for the user to update, see Figure 18

Ш Эсиветаре		DASHBOARD	REPORTING	LOGGING-	ADMINISTRATION -	1	Administrator -	Ø	¢
Update User									
Username	john								
Password									
Enabled									
Administrator									
	Update Cancel								

Figure 18 Update User

- Update user data:
 - **Password**, there are no restrictions on the length and/or content of the password.
 - Enabled, when the user be enabled for <u>logging in</u> to the CDC web interface or not (yet). Checked is yes
 - Administrator, when the user should have Administrator privileges. Checked is yes
- Click UPDATE

Delete User

It's not possible to delete the **Administrator** user!

To delete a user, perform the following steps:

- Click the ADMINISTRATION/User Management menu (Figure 16)
- Click DELETE (X) for the user you would like to delete, see Figure 19

Ш .)) сиветаре	DASHEOARD REPORTING LOGGING - ADMINISTRATION - Administrator -
User Managemer	You are about to delete a User, this procedure is irreversible. Do you want to proceed?
Username Enabled	Confirm Cancel
Administrator	
john 🕑	/ ×
New	

Figure 19 Delete User

• Click CONFIRM if you want to proceed with the delete or click CANCEL to return to the overview (Figure 16)

License Management

The CHECKMATE Data Collector requires a valid license for accepting messages from the CHECKMATE app. This license is sent to you by your Parceltools Sales Representative.

License Management consists of the following functionality:

- Show license information
- Activate license by CDC software over internet
- Manual license activation

Show License Information

To show information about the current activated license perform the following steps:

- Click ADMINISTRATION/License Management
- The License Management page is shown

∭. ЭСИВЕТАРЕ		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	Ŧ	Administrator -	θ	¢
License Mar	nagement								
Activate License Activate License Manua	ally								
License is valid.									
	Active License								
License ID	1564318070815								
Licensed Product	Checkmate Data Collector (CDC)								
Licensed Company	Transport XL								
E-Mail Licensee	g.johnson@transport-xl.com								
License Expiration Date	20 January 2020 14:47:40								
#Licensed devices	10								

Figure 20 Active License Information

Activate License through CDC software over Internet

The CDC license can be activated from the CHECKMATE Data Collector software if the PC/Server has access to the internet, by performing the following steps:

- Click ADMINISTRATION/License Management
- The License Management page is shown, see Figure 20
- Click Activate License
- The license activation page is shown

Ш, Эсиветаре		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	Ŧ	Administrator -	0	¢
Activate Lice	ense								
Licensed Company	Enter the name of the company to	which the license							
License Activation Key	Enter the activation key of your soft	tware license.							
	Activate Cancel								

Figure 21 License activation page

- Enter the following information:
 - o Licensed Company your company name
 - License Activation Key the activation key

This information is provided to you in the License Response document you have received from your Parceltools Sales representative.

- Click ACTIVATE
- The License Administration page is shown, see *Show License* Information

Manual License Activation

The CDC license can be activated manually from any PC/Server having internet access and a browser, by performing the following steps:

- Start Browser
- Type in the URL: <u>http://server-ip-address:9090/login</u> where server-ip-address is the IP address of the PC/Server having the CDC software installed.

- Click ADMINISTRATION/License Management
- The License Management page is shown, see Figure 20
- Click Manual License Activation

The manual license activation page is shown, see Figure 22

Ш .)) сиветаре		DASHBOARD	REPORTING	LOGGING -	ADMINISTRATION -	💄 Administrator -	0	¢
Manual Licer	nse Activation							
Retry automatic activation	n of license key							
Activation Request (copy this)	3128673ff6151eaa6b06bccba8c2 057eca25c0f5f70e82851447ffa40 d8a4692966eada02334501bef03 11fecabecf6c883ca43fc2cd7fdac 310dbab76df1227d9d4b3866554 e263d9ba2d2f3b39b63fa05c8d7a 92c27159420cad4d18f675b3	2b11bc76f541cac0 18796726d495ae2f3 4bb8714ffe998869) 520c512ab36f1491f 104cb971467a25df a0c7c4fd727f41e31 manual activating the	11582bee7d8a54b 356225a8af83f0b6 ba8195aa334d256 2fa77a62a55369f 3b07fd915cef2108 807a2719cb0744 e software license	db 1e6 07				
License Text	Copy the content of the received	license.14j file here.						
	Activate Cancel							

Figure 22 Manual license activation page

- Copy the content of Activation Request (copy this);
- Click CLICK HERE TO GO TO THE WEBSITE FOR MANUAL ACTIVATING THE CDC LICENSE, see Figure 23. On this website you must paste the copied data in the **License Activation Request Text:** field
- Click SUBMIT



Figure 23 Website for manual activation of CDC License

- A file is created License.14j
- The content of this file needs to be copied into the License Text field of the CDC Manual License Activation page, see Figure 22
- Click UPDATE
- The License Management page is shown, see *Show License* Information

Device Management

Device Management provides functionality for the maintenance of device aliases for the Handheld/PDA devices capturing the dimensional and weighing data from respectively a Cubetape and optional a (mobile) weighing scale. Device Aliases are used by the CDC web interface to refer to a Handheld/PDA through a logical name instead of an ID.

Device Management provides the following functionality:

- Show Registered Device Aliases
- Create Device Alias
- Update Device Alias
- Delete Device Alias

The different functions are described in the following sections.

Show Registered Device Aliases

To see all registered device aliases, perform the following steps:

• Click the ADMINISTRATION/Device Management menu

∭		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	1	Administrator -	0	¢
Device Aliases									
Device Alias	Device ID								
Warehouse_I	10:0C:6E:D2:11:E6	× ×							
37:3E:7A:C5:11:08_Alias	37:3E:7A:C5:11:08	× ×							
Add									

Figure 24 Overview registered devices

To register a new device alias, perform the following steps:

- Click the ADMINISTRATION/Device Management menu (Figure 24)
- Click ADD

Ш . Эсиветаре		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	1	Administrator -	θ	¢
Register Dev	vice								
Device Alias Device ID	Logical name to refer to device The identifier of device Add Cancel								

Figure 25 Register Scale

- Enter the following necessary data:
 - **Device Alias**, any logical name that refers to the Handheld/PDA device.
 - Device ID, the device id is the MAC Address / Hardware-ID of the Handheld/PDA. The ID is sent with every Probill message, see *General* Overview CHECKMATE Data Collector
- Click ADD.

Automatic Creation of a Device Alias

Whenever a Probill message is received by the CDC software, the device id of the Handheld/PDA is used to look up its device alias. If the device alias is not yet registered a

default alias is created having a name in the following format: *device-id_Alias*, where device-id is replaced by the actual id of the Handheld/PDA, e.g. 37:3E:7A:11:08_Alias.

Update Device Alias

To update a device alias, perform the following steps:

- Click the ADMINISTRATION/Device Management menu (Figure 24)
- Click UPDATE () for the device that needs to be updated

الاسرومي		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	1 Administrator -	0	¢
Update Devi	се							
Device ID Device Alias	37:3E:7A:C5:11:08 37:3E:7A:C5:11:08_Alias Update Cancel							

Figure 26 Update Scale

- Update the following data:
 - **Device Alias**, change the actual value for the device alias in any logical name that refers to the Handheld/PDA.
- Click UPDATE.

Delete Device Alias

To delete a device alias, perform the following steps:

- Click the ADMINISTRATION/Device Management menu (Figure 24)
- Click DELETE (X) for the device alias you would like to delete

∭-»)) сиветаре	DASHBOARD REPORTING LOGGING - ADMINISTRATION - & Administrator - • • *
Device Aliases	You are about to delete a device alias, this procedure is irreversible. Do you want to proceed?
Device Alias	Confirm Cancel
Warehouse_I	10.00.0E.D2.11.E0
37:3E:7A:C5:11:08_Alias	37:3E:7A:C5:11:08 🛛 🗡 🗙
Add	

Figure 27 Delete Device

• Click CONFIRM if you want to proceed with the delete, see Figure 27 or click CANCEL to return to the overview (Figure 24).

Settings

The behavior of the CDC server can be controlled through settings, which are defined in the file ./config/core.properties. The value of a setting can be changed through the CDC web interface **ADMINISTRATION/Settings** (Figure 28) by clicking on UPDATE (

	DASHBOARD REF	PORTING	LOGGING -	ADMINISTRATION -	1 Administrator +	0	¢
Settings							
Setting	Value						
app.output.csv.probill.content	all	1					
app.output.csv.probill.directory	output	1					
app.output.csv.probill.header	Date;Time;Device ID;Username;Con Note ID;Pieces;CTape ID;Measuring Unit;Length;Width;Height;Weight;Weighin Unit;Alibi Number;Photo's	e 🖍					
app.output.csv.separator	;	1					
core.archive.messagelog.days	60	1					
core.archive.messagelog.scheduler	0 0 6 * * MON-FRI	1					
core.archive.servicelog.days	14	1					
core.archive.servicelog.scheduler	0 0 6 * * MON-FRI	1					
core.email.from	bvanhooff@online.nl	1					
core.smtp.authenticate	true	1					
core.smtp.authentication.password	*******	1					
core.smtp.authentication.user	basvanhooff@gmail.com	1					
core.smtp.debug	false	1					
core.smtp.host	smtp.gmail.com	1					
core.smtp.port	587	1					
core.smtp.starttls	true	1					

Figure 28 CDC Parameters

CSV settings

In this section the settings are explained that control the CSV output.

app.output.csv.probill.content

The setting **app.output.csv.probill.content** specifies what the content of the CSV files will be. The following values are allowed:

• *all*, every day a new CSV file is created containing all probill messages send by the CHECKMATE app from any Handheld/PDA device to the CDC software;

Output filename format: *yyyy-MM-dd_*probill.csv

• *device*, every day new CSV file is created containing for each Handheld/PDA device that sends probill messages to the CDC software;

Output filename format: *yyyy-MM-dd_*probill_*device-alias_*probill.csv

• *user*, every day new CSV file is created containing for each Operator using the Handheld/PDA device that sends probill messages to the CDC software;

Output filename format: *yyyy-MM-dd_probill_user-name_probill.csv*

app.output.csv.probill.directory

The setting **app.output.csv.probill.directory** specifies the directory where the CSV files are being persisted. The directory specification can be a:

• relative file path, which is relative to the location where the CDC is installed,

e.g. ./output (default value)

• absolute file path

e.g. C:\CDC-CSV

• a UNC path (Universal Naming Convention), which is the naming system used in Microsoft Windows for accessing shared network folders

e.g. \\host-name\share-name\file_path

app.output.csv.probill.header

The setting **app.output.csv.probill.header** specifies the header thet will be written to the CSV file once it's being created (daily, when the first probill message is received)

app.output.csv.probill.separator

The setting **app.output.csv.separator** defines the CSV field delimiter that the CDC uses to format a Probill record to write to the CSV-file.

Logging Settings

core.archive.messagelog.days

The setting **core.archive.messagelog.days** specifies after how many days a message log record after it has been registered is archived. The service for archiving is scheduled automatically using the schedule as defined by parameter *core.archive.messagelog.scheduler*

core.archive.messagelog.scheduler

The setting **core.archive.messagelog.scheduler** specifies a *cron* configuration for the message log archive job. Cron is a time-based job scheduler software utility. The default **cron** configuration for the message log archive job is *0 0 6* * * *MON-FRI* which means that every Monday till Friday the job will run at 6:00 AM and zero seconds.

core.archive.servicelog.days

The setting **core.archive.servicelog.days** specifies after how many days a service log record after it has been created is archived. The service for archiving is scheduled automatically using the schedule as defined by parameter *core.archive.servicelog.scheduler*.

core.archive.servicelog.scheduler

The setting **core.archive.servicelog.scheduler** specifies a *cron* configuration for the service log archive job. Cron is a time-based job scheduler software utility. The default **cron** configuration for the service log archive job is *0 0 6* * * *MON-FRI* which means that every Monday till Friday the job will run at 6:00 AM and zero seconds.

Email/SMTP Settings

The CDC software is able to send emails to anyone willing to receive a PDF containing the details of a received message, like the dimensions of the parcel/pallet, the weight and photos. The CDC software may only send mail when it's properly configured. A proper configuration means that an SMTP server needs to be configured, contact your Mail Service Provider to get the required information.

IMPORTANT: changing the SMTP settings requires a restart of the CDC software, see *Restart/Stop Server*

core.email.from

The setting **core.email.from** specifies the email address of the sender of the email. Everyone using the email functionality for sending a PDF with the received probill message content will use by default this email address as the sender of the email. The default value can be overwritten the moment an email is sent.

core.smtp.authenticate

Does the configured SMTP server (*core.smtp.host*) require authentication. Possible values are:

- true, specify the required credentials, see *core.smtp.authentication.user* and *core.smtp.authentication.password*.
- *false*, leave user and password settings empty.

core.smtp.authentication.password

The setting **core.smtp.password** specified the password required for the authentication with the configured SMTP server. This is required when the SMTP server requires authentication(*core.smtp.authenticate*). Specify the password as provided to you by your Mail Service Provider.

core.smtp.authentication.user

The setting **core.smtp.user** specified the username required for the authentication with the configured SMTP server. This is required when the SMTP server requires authentication(*core.smtp.authenticate*). Specify the username as provided to you by your Mail Service Provider.

core.smtp.debug

The setting **core.smtp.debug** specifies if debug information should be logged in the server log whenever an email is send. Allowed values are *true* and *false*

core.smtp.host

The setting **core.smtp.host** is used to specify the IP-address or DNS name of the SMTP server. Specify the DNS name as provided to you by your Mail Service Provider.

core.smtp.port

The setting **core.smtp.port** is used to specify the port number of the SMTP server that will accept the email messages. Specify the port number as provided to you by your Mail Service Provider.

core.smtp.starttls

The setting **core.smtp.starttls** is used to specify that the connection with the specified SMTP server (*core.smtp.host*) will be secured using SSL or TLS. Allowed values are *true* or *false*. Specify the value that has been provided to you by your Mail Service Provider.

Logging Configuration

∭-»)CUBETAPE		DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	💄 Administrator 🗸	0	¢
Set Global Log Level Default 💌	Update							
Logger	Level							
nl.esense.app.config	WARN							
nl.esense.app.model	WARN							
nl.esense.app.rest	WARN	1						
nl.esense.app.security	WARN							
nl.esense.app.server	INFO	1						
nl.esense.app.service	WARN	1						
nl.esense.controller	WARN							
nl.esense.service	WARN	1						
nl.esense.core.config	WARN	1						
nl.esense.core.exceptionhandler	WARN	1						
nl.esense.core.internationalisation	WARN	1						
nl.esense.core.license	INFO	1						
nl.esense.core.security	WARN	1						
nl.esense.model	WARN	1						
nl.esense.repo	WARN	1						
nl.esense.rest	WARN	1						
nl.esense.util	WARN	1						
org.springframework.web	ERROR	1						

Figure 29 CDC Logging Levels

The amount of information logged in the server log (**LOGGING/Server Log**) is depending on the configured logging level of the CDC. The default configuration of the logging level for the CDC is suitable for regular use of the CDC.

In the case of problems regarding the operation of the CDC, the logging level can be adjusted to produce more detailed logging information. The following logging levels are supported:

- ERROR, only log errors that occur
- WARN, log warnings and error messages
- INFO, log informational, warning and error messages
- DEBUG, log more detailed, informational, warning and error messages
- TRACE, log all messages that the CDC can write to the log.

Logging Archive

The message log and the service log will grow overtime as a result of receiving and persisting messages. It's foreseen to automatically clean up these logs. Through settings, see *Logging Settings*, one can specify the number of days the registrations has to be kept in de database of the CDC software.

If needed an archive operation can be executed manually **ADMINISTRATION/Logging Archive**.



Figure 30 Logging Archive menu

To clean-up the message or the service log perform the following steps:

- Click the ADMINISTRATION/Logging Archive menu (Figure 30)
- Select a date via the calendar setting for deleting all records older than the specified date. The default date shown when activating the page is the date of the oldest registrations in the database.

∭		D	ASHB	OARD	R	EPORTING	Logging -	ADMINISTRATION -	1 Administrator -	0	¢
Logging Archive											
Archive Message Log All records up to and including date	08 / 15 / 2019 Archive) (2								
Archive Service Log All records up to and including date	08/15/201) (9								
	<	Augu	st 20	19 ~		>					
	Sun Mon 28 29	Tue 30	Wed 31	Thu 1	Fri 2	Sat 3					
	4 5	6	7	8	9	10					
	11 12	13	14	15	16	17					
	18 19 25 26	20	21	22	23 30	31					
	1 2	3	4	5	6	7					

Figure 31 Manual archive of message and service log

• Click ARCHIVE to execute the clean-up.

Restart/Stop Server

As an Administrator you can restart or stop the CHECKMATE Data Collector server from the CDC web interface.

A restart is typically done after a configuration change or after the activation of a new license key.



Figure 32 Restart/Stop CDC server

Before the server is stopped or restarted a confirmation of the requested operation is asked, see Figure 33.

ы∎ы)сиветаре	DASHBOARD	REPORTING	LOGGING -	ADMINISTRATION -	1 Administrator -	0	¢
	Confirm Server Restart	×					
Reporting	You are about to restart the server. Do you want to proceed?						
Filename			Confirm	Cancel			
2019-08-15_probill.csv	13-06-2019 00.30.34						
2019-07-26_probill.csv	26-07-2019 10:49:15	₹ ×					
2019-07-24_probill.csv	24-07-2019 08:59:18	₹ ×					

Figure 33 Confirm stop/restart server operation

Reporting - Delete CSV file

One can only delete CSV files if logged in as an Administrator.

Delete CSV-File

To delete a CSV file, perform the following steps:

- Click the **REPORTING** menu
- Click DELETE (X), see Figure 34.

Administrative Tasks

Ш ")сиветаре	DASHBOARD	REPORTING	LOGGING -	ADMINISTRATION +	Ŧ	Administrator -	Ð	٥
Reporting								
Filename	Last Modified							
2019-08-18_probill.csv	18-08-2019 18:25:18	± ×						
2019-08-15_probill.csv	15-08-2019 06:50:34	🛃 🗙						
2019-07-26_probill.csv	26-07-2019 10:49:15	± ×						
2019-07-24_probill.csv	24-07-2019 08:59:18	. ★ ×						

Figure 34 Delete CSV file

• Click CONFIRM if you want to proceed with the delete, see Figure 35 or click CANCEL to return to the overview (Figure 35)

сиветаре	DASHBOARD	Reporting Logging -	ADMINISTRATION -	1 Administrator -	0 ¢
Reporting	You are about to delete an output file, this pr Do you want to proceed?				
Filename		Confirm	Cancel		
2019-08-18_probill.csv	10-00-2019 10.20.10				
2019-08-15_probill.csv	15-08-2019 06:50:34	₹ ×			
2019-07-26_probill.csv	26-07-2019 10:49:15	<u>.</u>			
2019-07-24_probill.csv	24-07-2019 08:59:18	₹ ×			

Figure 35 Confirm delete of CSV file

Consult Logs

The CDC web interface has two logs for the Administrator, namely the server and the service log. Both logs can be consulted for problem solving. In a normal operation mode there is no need to consult these logs.

Consult Server Log

The server log contains all CDC system messages, both information and errors. If the CHECKMATE Data Collector is not behaving in the expected way, then consult the Server Log to see if there is any error or other information that may help you in solving the issue.

To consult the server log, perform the following steps:

• Click the LOGGING/Server Log

DASHBOARD	REPORTING	Logging -	ADMINISTRATION -	Ŧ	Administrator -	0	¢
		Message Log Service Log Server Log					

Figure 36 Server Log menu

• Click the pagination buttons to scroll through the server log.

III - S) CUBETAPE	DASHBOARD	REPORTING	LOGGING +	ADMINISTRATION -	1 Administrator -	0	۵
Server Log							
« < 2 3 4 5 6							
14-08-2019 20:26:37 DEBUG - Remaining number of licensed days: 9998	32						
14-08-2019 20:26:31 INFO - Started CheckmateDataCollector in 4.816 se	econds (JVM running) for 5.289)					
14-08-2019 20:26:31 INFO - Licensed product: Checkmate Data Collecto	r (CDC)						
14-08-2019 20:26:31 INFO - Software product license status [VALID], met	ssage: License is va	lid.					
14-08-2019 20:26:30 DEBUG - Loading product productLicenseService fr	rom store						
14-08-2019 20:26:30 INFO - Scheduled Archiving Service for [Message L	og] using cronjob sc	hedule [0 0 6 * * M	DN-FRI]				
14-08-2019 20:26:30 INFO - Scheduled Archiving Service for [Service Log	g] using cronjob sch	edule [0 0 6 * * MOI	I-FRI]				
14-08-2019 20:26:27 INFO - The following profiles are active: dev							
14-08-2019 20:26:27 INFO - Starting CheckmateDataCollector on MacBo Sense_Production/checkmate-data-collector/target/classes started by by collector)	ook-Pro-van-Bas.loc anhooff in /Users/by	al with PID 4512 (/L /anhooff/Document	lsers/bvanhooff/D s/dev/GitHub_Rep	ocuments/dev/GitHub_Rep positories/e-Sense/e-Sense	oositories/e-Sense/e- e_Production/checkmate-d	lata-	

Figure 37 Server Log

The server log resides in the *logs* folder in the folder where the CDC is installed (default: *C:**Program Files* (x86)\CHECKMATE Europe BV\Checkmate Data Collector).

Each day a new server log file is created. The log files are kept for five days, then they will be discarded.

Consult Service Log

The service log contains the service execution status of the services being executed by the CHECKMATE Data Collector.

To consult the service log, perform the following steps:

• Click the LOGGING/Service Log

DASHBOARD	REPORTING	LOGGING -	ADMINISTRATION -	1 Administrator +	0	¢
	₩ M ₩ S ₩ S	Message Log Service Log Server Log				

Figure 38 Service Log menu

• Click the pagination buttons to scroll through the service log.

ال المعالي الم		D	ASHBOARD	REPORTING	LOGGING -	ADMINISTRATION -	1	Administrator +	0	\$
Service Log	Ş									
ж. с. 1										
Timestamp	Endpoint	Alias	Status	Duration	Status Mess	age				
2019-08-18 18:10:17.0955	/rest/cdc/parcel	0 28:34:8B:5D:B3:12_Alias	ENDED	4 (msec)						
2019-08-18 18:10:07.0428	/rest/cdc/parcel	Warehouse_I	DUPLICATE A	2 (msec)	Duplicate messa	ge Device[10:0C:6E:D2:11:	:E6] fo	r parcel/pallet [71234	456701].	
2019-08-18 18:10:03.0486	/rest/cdc/parcel	Warehouse_I	ENDED	4 (msec)						
2019-08-18 18:09:55.0783	/rest/cdc/parcel	37:3E:7A:C5:11:08_Alias	ENDED	5 (msec)						
2019-08-18 18:09:48.0945	/rest/cdc/parcel	8:34:8B:5D:B3:12_Alias	ENDED	6 (msec)						
2019-08-18 18:09:39.0448	/rest/cdc/parcel	37:3E:7A:C5:11:08_Alias	ENDED	4 (msec)						
2019-08-18 18:09:27.0711	/rest/cdc/parcel	6 Warehouse_I	ENDED	34 (msec)						

Figure 39 Service Log

The Service Log resides in the database and grows when the CDC is accepting messages from CHECKMATE app.

The CHECKMATE Data Collector automatically executes a service log archive job according to the schedule specified by the parameter *core.archive.servicelog.scheduler*.