

API Documentation

For FootfallCam 3D Plus

F100327-04



 **FootfallCam™**

Revision History

Revision Number	Description of Revision	Date of Revision
1	Initial Draft	November, 14 2016
2	Revision	August, 01 2017
3	Updated Protocol for Counting Data Retrieval	September, 06 2017
4	Updated Minimum Server Requirement	November, 15 2017

Information Classification

C1	C2	C3	C4	← This document is classified as Public Information .
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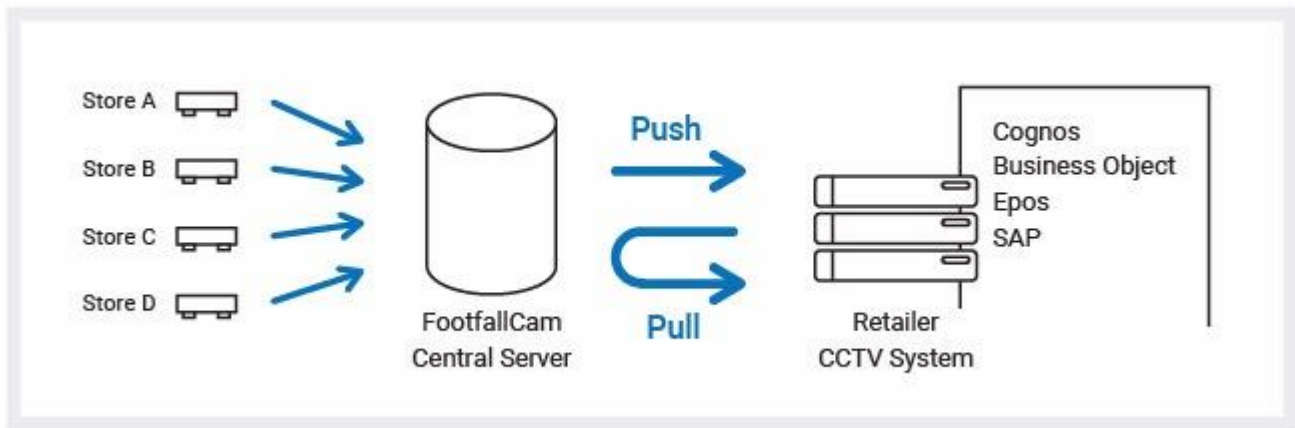


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1.0 Overview



FootfallCam is a fully embedded software module, intended for any environment where store footfall counting is required. Business intelligence (BI) system extracts and analyses footfall data (from FootfallCam central server) together with ePOS data or staff labour hours (from retailer's ePOS system or staff management system) to produce management report for corporate strategic planning.

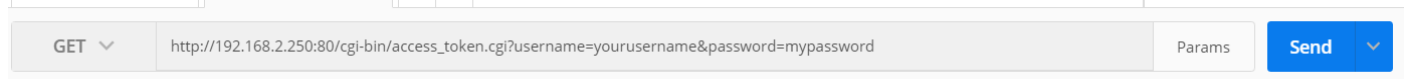
There are several ways of integrating footfall data with the ePOS data or staff labour hours:

- Export footfall data to retailer system
- Import ePOS data or staff labour hours to FootfallCam central server

2.0 Authentication API

Generate new API access token by username and password

Sample Call: http://<ip>:<port>/cgi-bin/access_token.cgi?username=yourusername&password=yourpassword



Sample Respond:

```
1 {
2   "status": "OK",
3   "data": {
4     "username": "yourusername",
5     "token": "eyJhbGciOiJIUzI1NiIsInR5cCI6IkpXVCJ9.eyJ1c2VybmFtZSI6InBhc3N3b3JkIjoibXlwYXNzd29yZCJ9.TSA0D-IgR33EPHajxwPwngEYnQxYEqrBCxgX3_E-Df4",
6     "created_date": "2017-11-29 05:51:50"
7   }
8 }
```

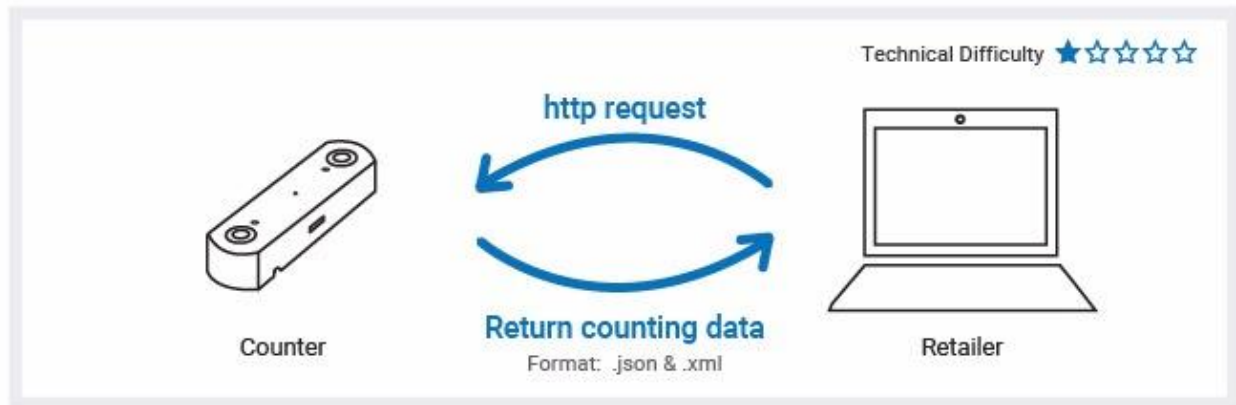
The username and password that the user should be entered when filling in the will be based on the username and password of the FootfallCam people counter and not the FootfallCam Analytic Manager. By default, the username and password are as follow:

Username (case sensitive)	Admin
Password	123456

Note: The access token does not have any expiry date, its vary from username and password. Kindly re-obtain the access token once username and password changed.

3.0 Export Footfall Data to Retailer System

3.1 Pull Data via API from counter



The camera automatically collects the traffic data and builds them into a convenient JSON/XML data file that can be retrieved easily via a web service API call, hence allowing seamless integration of the camera into any existing solution. Through an API call, the data file will be extracted from FootfallCam portal to the business intelligence system for further data processing in order to generate the management report.

3.1.1 Counter API Terminology and Parameters

For counter data we use following terminology and parameters:

Parameter	Default	Description	Value	Sample
data_type	json	Type of the data	json, xml	data_type=xml
data_format	Hour	Format of the data	hour, minute, second	data_format=second
date_start	Yesterday's date	Start Date of the data	YYYYMMDD	date_start=20181231
date_end	-	End Date of the data	YYYYMMDD	date_end=20190228
resolution_min	1	The minutes data's resolution (Minutes data only)	1, 5, 10, 15, 30, 60	resolution_min=15
resolution_sec	10	The second data's resolution (Only available for counter running firmware version 3.2.0)	1, 5, 10, 15, 30, 60	resolution_sec=1
time_start	1 day [0:00]	To set the start time range of the API	HHmmss	time_start=103000
time_end	1 day [23:59]	To set the end time range of the API	HHmmss	time_end=223300



Note:

The maximum amount of data you can get from time range is 24 hours. Both time range start and end should be set.

- time_start is set, but time_end is not = default time_end will be 1 hour after time_start
- time_end is set, but time_start is not = default time_start will be "000000"

3.1.2 Get Counting Data in second for selected date and time range

Description																					
Title	<p>Get Counting Data in second for selected date and time range</p> <p>Description: API Function to receive counting data. Counting data includes Timestamp, number of In count, number of Out count</p>																				
URL (Json)	<a href="http://<ip>:<port>/cgi-bin/apiCount.cgi?date_start=20180612&time_start=083000&time_end=183000&data_type=json&data_format=second&resolution_sec=30&access_token=token">http://<ip>:<port>/cgi-bin/apiCount.cgi?date_start=20180612&time_start=083000&time_end=183000&data_type=json&data_format=second&resolution_sec=30&access_token=token																				
Method	GET																				
URL Parameters	Optional: -																				
	<table border="1"> <thead> <tr> <th>Name</th> <th>Value</th> <th>Descriptions</th> </tr> </thead> <tbody> <tr> <td>Date</td> <td>Omit</td> <td>omit – The current day data</td> </tr> <tr> <td></td> <td>Single day - <YYYYMMDD></td> <td>Single day – Data on the specified day</td> </tr> <tr> <td></td> <td>Omit</td> <td>omit – The start date – The end date</td> </tr> <tr> <td></td> <td>Date range - <YYYYMMDD></td> <td>omit – The start time – The end time</td> </tr> <tr> <td></td> <td>Omit</td> <td></td> </tr> <tr> <td></td> <td>Time range - <HHmmss></td> <td></td> </tr> </tbody> </table>	Name	Value	Descriptions	Date	Omit	omit – The current day data		Single day - <YYYYMMDD>	Single day – Data on the specified day		Omit	omit – The start date – The end date		Date range - <YYYYMMDD>	omit – The start time – The end time		Omit			Time range - <HHmmss>
Name	Value	Descriptions																			
Date	Omit	omit – The current day data																			
	Single day - <YYYYMMDD>	Single day – Data on the specified day																			
	Omit	omit – The start date – The end date																			
	Date range - <YYYYMMDD>	omit – The start time – The end time																			
	Omit																				
	Time range - <HHmmss>																				
Success Response (Json)	<pre> 1 { 2 "data": { 3 "date_requested": "2018-06-13 10:00:08", 4 "offset": "GMT +0", 5 "output": [6 { 7 "datetime": "2018-06-12 08:30:00", 8 "invalue": 0, 9 "outvalue": 0, 10 "timestamp": 1528792200 11 }, 12 { 13 "datetime": "2018-06-12 08:30:30", 14 "invalue": 1, 15 "outvalue": 0, 16 "timestamp": 1528792230 17 }, 18 { 19 "datetime": "2018-06-12 08:31:00", 20 "invalue": 0, 21 "outvalue": 1, 22 "timestamp": 1528792260 23 }, 24 { 25 "datetime": "2018-06-12 08:31:30", 26 "invalue": 0, 27 "outvalue": 0, 28 "timestamp": 1528792290 29 }, 30 { 31 "datetime": "2018-06-12 08:32:00", 32 "invalue": 0, 33 "outvalue": 0, 34 "timestamp": 1528792320 35 }] } } </pre>																				
URL(xml)	<a href="http://<ip>:<port>/cgi-bin/apiCount.cgi?date_start=20171120&date_end=20171129&data_type=xml&data_format=hour&access_token=token">http://<ip>:<port>/cgi-bin/apiCount.cgi?date_start=20171120&date_end=20171129&data_type=xml&data_format=hour&access_token=token																				

Success
Response
(xml)

```
1  <?xml version="1.0" ?>
2  <xml>
3    <data>
4      <date_requested>2018-06-13 10:07:51</date_requested>
5      <output>
6        <count>
7          <datetime>2018-06-12 08:30:00</datetime>
8          <timestamp>1528792200.0</timestamp>
9          <invalue>0</invalue>
10         <outvalue>0</outvalue>
11        </count>
12        <count>
13          <datetime>2018-06-12 08:30:30</datetime>
14          <timestamp>1528792230</timestamp>
15          <invalue>1</invalue>
16          <outvalue>0</outvalue>
17        </count>
18        <count>
19          <datetime>2018-06-12 08:31:00</datetime>
20          <timestamp>1528792260</timestamp>
21          <invalue>0</invalue>
22          <outvalue>1</outvalue>
23        </count>
24        <count>
25          <datetime>2018-06-12 08:31:30</datetime>
26          <timestamp>1528792290</timestamp>
27          <invalue>0</invalue>
28          <outvalue>0</outvalue>
29        </count>
30        <count>
31          <datetime>2018-06-12 08:32:00</datetime>
32          <timestamp>1528792320</timestamp>
33          <invalue>0</invalue>
34          <outvalue>0</outvalue>
35        </count>
36        <count>
37          <datetime>2018-06-12 08:32:30</datetime>
38          <timestamp>1528792350</timestamp>
39          <invalue>1</invalue>
40          <outvalue>0</outvalue>
41        </count>
42        <count>
43          <datetime>2018-06-12 08:33:00</datetime>
44          <timestamp>1528792380</timestamp>
45          <invalue>0</invalue>
46          <outvalue>0</outvalue>
47        </count>
48        <count>
49          <datetime>2018-06-12 08:33:30</datetime>
50          <timestamp>1528792410</timestamp>
51          <invalue>0</invalue>
52          <outvalue>0</outvalue>
53        </count>
54        <count>
55          <datetime>2018-06-12 08:34:00</datetime>
56          <timestamp>1528792440</timestamp>
57          <invalue>0</invalue>
58          <outvalue>0</outvalue>
59        </count>
60        <count>
```

Note If time range is selected, you can maximumly select one day data per request



Note:

Retrieving data in seconds resolution from the FootfallCam counter level is only usable by counters on firmware v.3.2.0 and later.

3.1.3 Get Counting Data in minute for selected date

Description						
Title	Get Counting Data in minute for selected date Description: API Function to receive counting data. Counting data includes Timestamp, number of In count, number of Out count					
URL (Json)	<a href="http://<ip>:<port>/cgi-bin/apiCount.cgi?data_type=json&resolution_min=1&data_format=minute&access_token=token">http://<ip>:<port>/cgi-bin/apiCount.cgi?data_type=json&resolution_min=1&data_format=minute&access_token=token					
Method	GET					
URL Parameters	Optional: -					
	<table border="1"> <thead> <tr> <th>Name</th> <th>Value</th> <th>Descriptions</th> </tr> </thead> <tbody> <tr> <td>Date</td> <td>omit Single day - <YYYYMMDD></td> <td>omit – The current day data Single day – Data on the specified day</td> </tr> </tbody> </table>	Name	Value	Descriptions	Date	omit Single day - <YYYYMMDD>
Name	Value	Descriptions				
Date	omit Single day - <YYYYMMDD>	omit – The current day data Single day – Data on the specified day				
Success Response (Json)	<pre> 1 { 2 "data":{ 3 "date_requested":"2017-11-29 06:25:31", 4 "offset":"GMT +0", 5 "output":[6 { 7 "datetime":"2017-11-28 00:00:00", 8 "invalue":5, 9 "outvalue":6, 10 "timestamp":1511827200 11 }, 12 { 13 "datetime":"2017-11-28 00:01:00", 14 "invalue":12, 15 "outvalue":11, 16 "timestamp":1511827260 17 }, 18 { 19 "datetime":"2017-11-28 00:02:00", 20 "invalue":0, 21 "outvalue":0, 22 "timestamp":1511827320 23 }, 24 { 25 "datetime":"2017-11-28 00:03:00", 26 "invalue":5, 27 "outvalue":6, 28 "timestamp":1511827380 29 } 30], 31 "token":"token" 32 }, 33 "status":"OK" 34 } </pre>					
URL(xml)	<a href="http://<ip>:<port>/cgi-bin/apiCount.cgi?date_start=20171118&data_type=xml&resolution_min=30&data_format=minute&access_token=token">http://<ip>:<port>/cgi-bin/apiCount.cgi?date_start=20171118&data_type=xml&resolution_min=30&data_format=minute&access_token=token					

Success Response (xml)

```
▼<xml>
  ▼<data>
    <date_requested>2017-11-29 06:42:33</date_requested>
    ▼<output>
      ▼<count>
        <datetime>2017-11-18 00:00:00</datetime>
        <timestamp>1510963200</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-18 00:30:00</datetime>
        <timestamp>1510965000</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-18 01:00:00</datetime>
        <timestamp>1510966800</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-18 01:30:00</datetime>
        <timestamp>1510968600</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-18 02:00:00</datetime>
        <timestamp>1510970400</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-18 02:30:00</datetime>
        <timestamp>1510972200</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-18 03:00:00</datetime>
        <timestamp>1510974000</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
    </output>
  </data>
</xml>
```

Note You can only obtain one-day minute data per request

3.1.4 Get Counting Data in hour for selected date

	Description														
Title	Get Counting Data in hour for selected date Description: API Function to receive counting data. Counting data includes Timestamp, number of In count, number of Out count														
URL (Json)	<a href="http://<ip>:<port>/cgi-bin/apiCount.cgi?data_type=json&&data_format=hour&access_token=token">http://<ip>:<port>/cgi-bin/apiCount.cgi?data_type=json&&data_format=hour&access_token=token														
Method	GET														
URL Parameters	Optional: -														
	<table border="1"> <thead> <tr> <th>Name</th> <th>Value</th> <th>Descriptions</th> </tr> </thead> <tbody> <tr> <td>Date</td> <td>omit</td> <td>omit – The current day data</td> </tr> <tr> <td></td> <td>Single day - <YYYYMMDD></td> <td>Single day – Data on the specified day</td> </tr> <tr> <td></td> <td>Omit</td> <td>omit – The start date – The end date</td> </tr> <tr> <td></td> <td>Date range - <YYYYMMDD></td> <td></td> </tr> </tbody> </table>	Name	Value	Descriptions	Date	omit	omit – The current day data		Single day - <YYYYMMDD>	Single day – Data on the specified day		Omit	omit – The start date – The end date		Date range - <YYYYMMDD>
Name	Value	Descriptions													
Date	omit	omit – The current day data													
	Single day - <YYYYMMDD>	Single day – Data on the specified day													
	Omit	omit – The start date – The end date													
	Date range - <YYYYMMDD>														
Success Response (Json)	<pre> 1 { 2 "data":{ 3 "date_requested":"2017-11-29 07:34:24", 4 "offset":"GMT +0", 5 "output":[6 { 7 "datetime":"2017-11-28 00:00:00", 8 "invalue":0, 9 "outvalue":0, 10 "timestamp":1511827200 11 }, 12 { 13 "datetime":"2017-11-28 01:00:00", 14 "invalue":0, 15 "outvalue":0, 16 "timestamp":1511830800 17 }, 18 { 19 "datetime":"2017-11-28 02:00:00", 20 "invalue":0, 21 "outvalue":0, 22 "timestamp":1511834400 23 }, 24 { 25 "datetime":"2017-11-28 03:00:00", 26 "invalue":0, 27 "outvalue":0, 28 "timestamp":1511838000 29 } 30], 31 "token":"token" 32 }, 33 "status":"OK" 34 } </pre>														
URL(xml)	<a href="http://<ip>:<port>/cgi-bin/apiCount.cgi?date_start=20171120&date_end=20171129&data_type=xml&&data_format=hour&access_token=token">http://<ip>:<port>/cgi-bin/apiCount.cgi?date_start=20171120&date_end=20171129&data_type=xml&&data_format=hour&access_token=token														

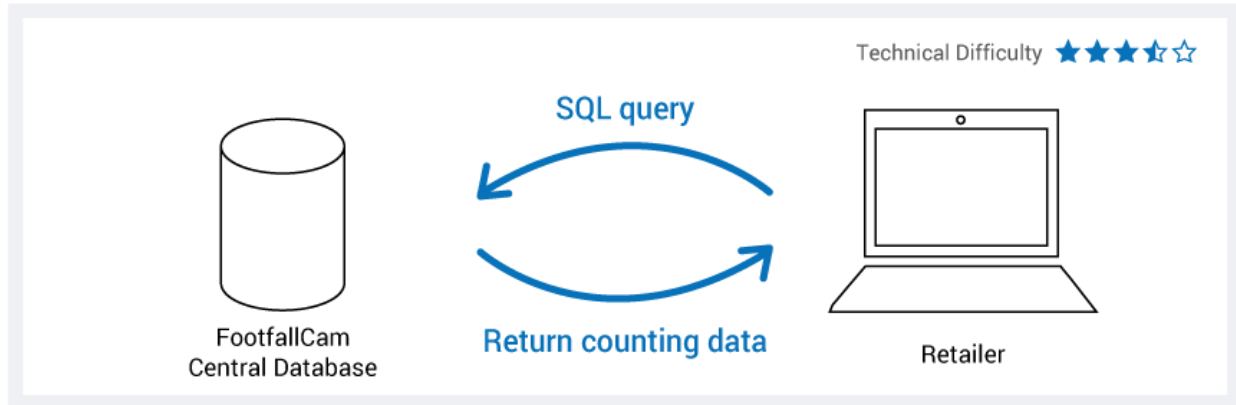
Success Response (xml)

```
▼<xml>
  ▼<data>
    <date_requested>2017-11-29 07:39:22</date_requested>
    ▼<output>
      ▼<count>
        <datetime>2017-11-20 00:00:00</datetime>
        <timestamp>1511136000</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-20 01:00:00</datetime>
        <timestamp>1511139600</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-20 02:00:00</datetime>
        <timestamp>1511143200</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-20 03:00:00</datetime>
        <timestamp>1511146800</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-20 04:00:00</datetime>
        <timestamp>1511150400</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-20 05:00:00</datetime>
        <timestamp>1511154000</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
      </count>
      ▼<count>
        <datetime>2017-11-20 06:00:00</datetime>
        <timestamp>1511157600</timestamp>
        <invalue>0</invalue>
        <outvalue>0</outvalue>
    </output>
  </data>
</xml>
```

Note

You can choose to obtain single day or date range

3.2 Pull Data from SQL in Central Database



Instead of using API, users may choose to extract the footfall data directly from FootfallCam Central Database. This involves establishing a remote connection directly to the database to extract the data from the relevant table to the business intelligence system.



Note

This option requires the program **Microsoft SQL Server Management Studio** or equivalent.

3.2.1 Creating an SQL account

To begin, the user will be required to create an SQL account via the FootfallCam Analytic Manager.

- 1) Access the **Company Settings** page from the menu on the left.
- 2) Scroll down to the section **Grab Data from SQL Table**.
- 3) Input the preferred **Username** and **Password** and click **Create**.



Note

Once an account has been created, users should use **51.255.82.36** (or their own server address) as the server name in the SQL software.

3.2.2 How to Get Branch List

Title	Get Branch List Description: SQL Function to retrieve branch list. Branch data include Branch Id, Name, Region, City, Country, StoreType, Latitude, Longitude and Floor Size																																																																																																																														
Function Name	GetBranchList																																																																																																																														
Method	SQL																																																																																																																														
Data Params	Username [nvarchar] Password [nvarchar]																																																																																																																														
Success Response	<table border="1"> <thead> <tr> <th>ID</th> <th>BranchCode</th> <th>BranchName</th> <th>Region</th> <th>RegionAbbr</th> <th>City</th> <th>CityAbbr</th> <th>Country</th> <th>CountryAbbr</th> <th>Timezone</th> <th>StoreType</th> <th>Latitude</th> <th>Longitude</th> <th>FloorSize</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>001</td> <td>Stanger</td> <td>WELL</td> <td>WELL</td> <td>Dublin</td> <td>WELL</td> <td>Ireland</td> <td>IE</td> <td>0</td> <td>WELL</td> <td>0</td> <td>0</td> <td>0</td> </tr> <tr> <td>2</td> <td>002</td> <td>Woods Street</td> <td>WELL</td> <td>WELL</td> <td>Dublin</td> <td>WELL</td> <td>Ireland</td> <td>IE</td> <td>0</td> <td>WELL</td> <td>0</td> <td>0</td> <td>0</td> </tr> <tr> <td>3</td> <td>003</td> <td>Ton</td> <td>WELL</td> <td>WELL</td> <td>Wexham</td> <td>WELL</td> <td>Ireland</td> <td>IE</td> <td>0</td> <td>WELL</td> <td>0</td> <td>0</td> <td>0</td> </tr> <tr> <td>4</td> <td>004</td> <td>Carroll</td> <td>WELL</td> <td>WELL</td> <td>Tipperary</td> <td>WELL</td> <td>Ireland</td> <td>IE</td> <td>0</td> <td>WELL</td> <td>0</td> <td>0</td> <td>0</td> </tr> <tr> <td>5</td> <td>005</td> <td>Cook</td> <td>WELL</td> <td>WELL</td> <td>Cork</td> <td>WELL</td> <td>Ireland</td> <td>IE</td> <td>0</td> <td>WELL</td> <td>0</td> <td>0</td> <td>0</td> </tr> <tr> <td>6</td> <td>006</td> <td>Thougen</td> <td>WELL</td> <td>WELL</td> <td>Cork</td> <td>WELL</td> <td>Ireland</td> <td>IE</td> <td>0</td> <td>WELL</td> <td>0</td> <td>0</td> <td>0</td> </tr> <tr> <td>7</td> <td>007</td> <td>Shanahan</td> <td>WELL</td> <td>WELL</td> <td>Cork</td> <td>WELL</td> <td>Ireland</td> <td>IE</td> <td>0</td> <td>WELL</td> <td>0</td> <td>0</td> <td>0</td> </tr> <tr> <td>8</td> <td>008</td> <td>Cook</td> <td>WELL</td> <td>WELL</td> <td>Cork</td> <td>WELL</td> <td>Ireland</td> <td>IE</td> <td>0</td> <td>WELL</td> <td>0</td> <td>0</td> <td>0</td> </tr> </tbody> </table>	ID	BranchCode	BranchName	Region	RegionAbbr	City	CityAbbr	Country	CountryAbbr	Timezone	StoreType	Latitude	Longitude	FloorSize	1	001	Stanger	WELL	WELL	Dublin	WELL	Ireland	IE	0	WELL	0	0	0	2	002	Woods Street	WELL	WELL	Dublin	WELL	Ireland	IE	0	WELL	0	0	0	3	003	Ton	WELL	WELL	Wexham	WELL	Ireland	IE	0	WELL	0	0	0	4	004	Carroll	WELL	WELL	Tipperary	WELL	Ireland	IE	0	WELL	0	0	0	5	005	Cook	WELL	WELL	Cork	WELL	Ireland	IE	0	WELL	0	0	0	6	006	Thougen	WELL	WELL	Cork	WELL	Ireland	IE	0	WELL	0	0	0	7	007	Shanahan	WELL	WELL	Cork	WELL	Ireland	IE	0	WELL	0	0	0	8	008	Cook	WELL	WELL	Cork	WELL	Ireland	IE	0	WELL	0	0	0
ID	BranchCode	BranchName	Region	RegionAbbr	City	CityAbbr	Country	CountryAbbr	Timezone	StoreType	Latitude	Longitude	FloorSize																																																																																																																		
1	001	Stanger	WELL	WELL	Dublin	WELL	Ireland	IE	0	WELL	0	0	0																																																																																																																		
2	002	Woods Street	WELL	WELL	Dublin	WELL	Ireland	IE	0	WELL	0	0	0																																																																																																																		
3	003	Ton	WELL	WELL	Wexham	WELL	Ireland	IE	0	WELL	0	0	0																																																																																																																		
4	004	Carroll	WELL	WELL	Tipperary	WELL	Ireland	IE	0	WELL	0	0	0																																																																																																																		
5	005	Cook	WELL	WELL	Cork	WELL	Ireland	IE	0	WELL	0	0	0																																																																																																																		
6	006	Thougen	WELL	WELL	Cork	WELL	Ireland	IE	0	WELL	0	0	0																																																																																																																		
7	007	Shanahan	WELL	WELL	Cork	WELL	Ireland	IE	0	WELL	0	0	0																																																																																																																		
8	008	Cook	WELL	WELL	Cork	WELL	Ireland	IE	0	WELL	0	0	0																																																																																																																		
Sample Call	<code>SELECT * FROM GetBranchList('username','password');</code>																																																																																																																														
Notes	None																																																																																																																														

3.2.2 How to Get Counter List

Title	Get Counter by Branch Description: SQL Function to retrieve counters filtered by branch. Counter data include Counter Id, Name, IP, Port, Serial																								
Function Name	GetCounterByBranch																								
Method	SQL																								
Data Params	Username [nvarchar] Password [nvarchar] BranchId [bigint]																								
Success Response	<table border="1"> <thead> <tr> <th></th> <th>ID</th> <th>CameraName</th> <th>IP</th> <th>Port</th> <th>Serial</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>36</td> <td>Cam1</td> <td>NULL</td> <td>NULL</td> <td>XXXXXXXXXX-7642</td> </tr> <tr> <td>2</td> <td>37</td> <td>Cam2</td> <td>NULL</td> <td>NULL</td> <td>XXXXXXXXXX-8566</td> </tr> <tr> <td>3</td> <td>38</td> <td>Cam2</td> <td>NULL</td> <td>NULL</td> <td>XXXXXXXXXX-7642</td> </tr> </tbody> </table>		ID	CameraName	IP	Port	Serial	1	36	Cam1	NULL	NULL	XXXXXXXXXX-7642	2	37	Cam2	NULL	NULL	XXXXXXXXXX-8566	3	38	Cam2	NULL	NULL	XXXXXXXXXX-7642
	ID	CameraName	IP	Port	Serial																				
1	36	Cam1	NULL	NULL	XXXXXXXXXX-7642																				
2	37	Cam2	NULL	NULL	XXXXXXXXXX-8566																				
3	38	Cam2	NULL	NULL	XXXXXXXXXX-7642																				
Sample Call	<code>SELECT * FROM GetCounterByBranch('username', 'password', 37);</code>																								

3.2.4 How to Get Hourly Counting Data by Branch

Title	Get branch hourly counting data Description: SQL Function to retrieve counting filtered by counter. Counting data include Counter (in hourly interval), ValueDateTime, ValueIn, ValueOut, OutsideTraffic, Day, CounterId																																																																						
Function Name	GetCounterCounting																																																																						
Method	SQL																																																																						
Data Params	Username [nvarchar] Password [nvarchar] BranchCode [bigint] / "-1" for whole branch in company StartDate [datetime] EndDate [datetime]																																																																						
Success Response	<table border="1"> <thead> <tr> <th>Counter</th> <th>ValueDate Time</th> <th>ValueIn</th> <th>ValueOut</th> <th>OutsideTraffic</th> <th>Day</th> <th>CameraId</th> </tr> </thead> <tbody> <tr> <td>36</td> <td>2015-03-20 09:00:00.000</td> <td>39</td> <td>19</td> <td>44</td> <td>5</td> <td>410</td> </tr> <tr> <td>37</td> <td>2015-03-20 09:15:00.000</td> <td>34</td> <td>25</td> <td>31</td> <td>5</td> <td>410</td> </tr> <tr> <td>38</td> <td>2015-03-20 09:30:00.000</td> <td>43</td> <td>33</td> <td>32</td> <td>5</td> <td>410</td> </tr> <tr> <td>39</td> <td>2015-03-20 09:45:00.000</td> <td>82</td> <td>42</td> <td>41</td> <td>5</td> <td>410</td> </tr> <tr> <td>40</td> <td>2015-03-20 10:00:00.000</td> <td>50</td> <td>36</td> <td>24</td> <td>5</td> <td>410</td> </tr> <tr> <td>41</td> <td>2015-03-20 10:15:00.000</td> <td>56</td> <td>51</td> <td>37</td> <td>5</td> <td>410</td> </tr> <tr> <td>42</td> <td>2015-03-20 10:30:00.000</td> <td>75</td> <td>68</td> <td>34</td> <td>5</td> <td>410</td> </tr> <tr> <td>43</td> <td>2015-03-20 10:45:00.000</td> <td>55</td> <td>58</td> <td>37</td> <td>5</td> <td>410</td> </tr> <tr> <td>44</td> <td>2015-03-20 11:00:00.000</td> <td>52</td> <td>82</td> <td>31</td> <td>5</td> <td>410</td> </tr> </tbody> </table>	Counter	ValueDate Time	ValueIn	ValueOut	OutsideTraffic	Day	CameraId	36	2015-03-20 09:00:00.000	39	19	44	5	410	37	2015-03-20 09:15:00.000	34	25	31	5	410	38	2015-03-20 09:30:00.000	43	33	32	5	410	39	2015-03-20 09:45:00.000	82	42	41	5	410	40	2015-03-20 10:00:00.000	50	36	24	5	410	41	2015-03-20 10:15:00.000	56	51	37	5	410	42	2015-03-20 10:30:00.000	75	68	34	5	410	43	2015-03-20 10:45:00.000	55	58	37	5	410	44	2015-03-20 11:00:00.000	52	82	31	5	410
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44	2015-03-20 11:00:00.000	52	82	31	5	410																																																																	
Sample Call	<code>SELECT * FROM GetBranchHourly('username', 'password', -1, '20150320', '20150321');</code>																																																																						
Notes	-1 refer to the all branches in the company																																																																						

3.2.5 How to Get Daily Counting Data by Branch

Title	<p>Get Branch Daily Counting Data</p> <p>Description: SQL Function to retrieve daily summary filtered by counter</p> <p>Counting data include Date (POSIX Timestamp), CameraName, ValueIn, ValueOut, OutsideTraffic, TurnInRate, LessThanFifteen, LessThanThirty, OverThirty, NewCustomer, ReturnInWeek, ReturnInMonth, AggregationStatus, VerificationStatus</p>																																										
Function Name	GetBranchDailySummary																																										
Method	SQL																																										
Data Params	<p>Username [nvarchar]</p> <p>Password [nvarchar]</p> <p>Branchcode [bigint] "-1" for whole branch in company</p> <p>StartDate [datetime]</p> <p>EndDate [datetime]</p>																																										
Success Response	<table border="1"> <thead> <tr> <th></th> <th>Date</th> <th>CameraName</th> <th>ValueIn</th> <th>ValueOut</th> <th>OutsideTraffic</th> <th>TurnInRate</th> <th>LessThanFifteen</th> <th>LessThanThirty</th> <th>OverThirty</th> <th>NewCustomer</th> <th>ReturnInWeek</th> <th>ReturnInMonth</th> <th>CameraId</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>1426809600</td> <td>NassauStreet</td> <td>2496</td> <td>2549</td> <td>2763</td> <td>73.73</td> <td>11</td> <td>0</td> <td>0</td> <td>30</td> <td>3</td> <td>1</td> <td>410</td> </tr> <tr> <td>2</td> <td>1426896000</td> <td>NassauStreet</td> <td>2410</td> <td>2307</td> <td>2452</td> <td>77.59</td> <td>7</td> <td>1</td> <td>2</td> <td>28</td> <td>3</td> <td>0</td> <td>410</td> </tr> </tbody> </table>		Date	CameraName	ValueIn	ValueOut	OutsideTraffic	TurnInRate	LessThanFifteen	LessThanThirty	OverThirty	NewCustomer	ReturnInWeek	ReturnInMonth	CameraId	1	1426809600	NassauStreet	2496	2549	2763	73.73	11	0	0	30	3	1	410	2	1426896000	NassauStreet	2410	2307	2452	77.59	7	1	2	28	3	0	410
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2	1426896000	NassauStreet	2410	2307	2452	77.59	7	1	2	28	3	0	410																														
Sample Call	<code>SELECT * FROM GetBranchDailySummary('username', 'password', 410, '20140120', '20140121');</code>																																										
Notes	-1 refer to the all branches in the company																																										