

# CASE STUDY

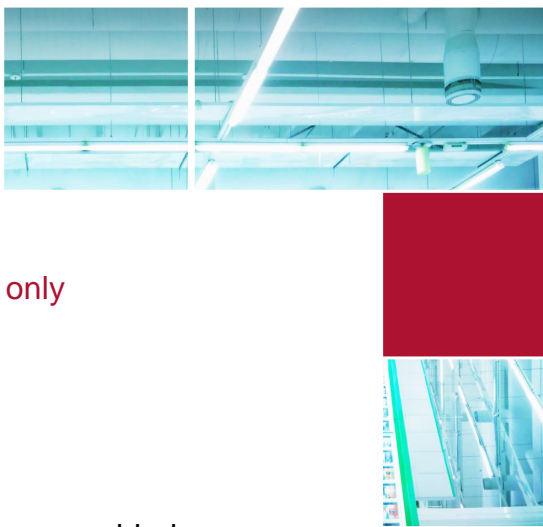
Supermarket group  
Commercial Refrigeration  
Food Retail



# Supermarket group

## Problem to solve

27,000 man hours are used to manually log the temperatures of refrigerated display cases and cold room stores. The information is only useful in the event of an inspection, but cannot be smartly managed for decision-making purposes.



### NEEDS

- Automate processes:
  - Time saving
  - No human resources
  - 24/7/365
- Quality
  - Automatic reports
  - APPCC alarms
- Operation and maintenance
  - Global vision
  - Intelligent alarm management
  - Anticipation
  - Scalability
- Branding
  - Promote internal and external branding

### GOAL

- Reliability of the communications and the readings provided.
- Implementation of the solution in 62 shops in 2020.

#### RESULTS

Hours Released Value



Massive actuation to adjust set points



#### AKO SOLUTION



**1**  
INTEGRAL ENGINEERING  
SERVICE INCLUDED IN  
THE COST OF THE  
PROJECT

**2**  
DESIGN, TRAINING, PEM,  
EVALUATION,  
IMPROVEMENT.  
CONTINUE, DIRECT  
CONTACT ....

# Supermarket group

## Solution:

At **AKO** we propose a solution to log the temperature and moisture of the installations remotely and continuously 24 h, 365 days a year, and monitor this data intelligently to be able to act preventively, to optimize maintenance costs and react quickly when faced with any incident, and to increase business profitability, productivity and cost reduction

### ■ SOLUTION



#### AKODATA NB-IoT

- Temperature and moisture logger
- 100% cable free.
- Multiple solutions.
- Antenna and probe (internal / external).
- Configurable data logging frequency.
- Built-in battery (autonomy 3 years).

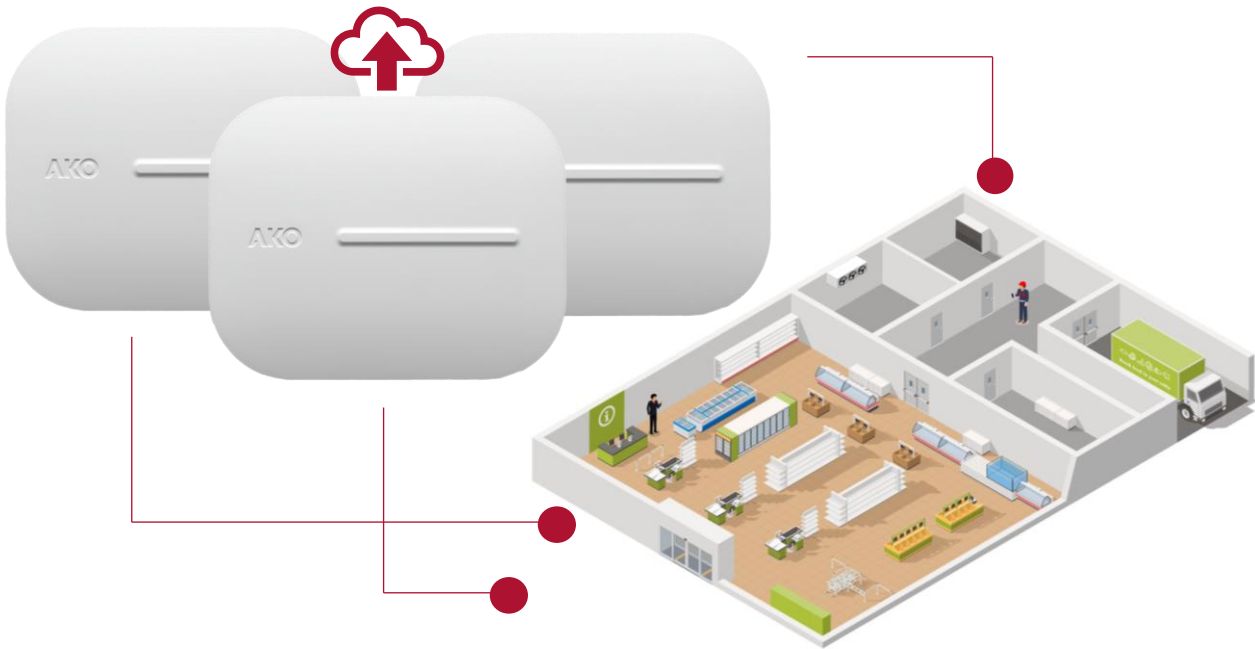
#### AKONET.Cloud

- Integrated NB-IoT connectivity.
- Monitoring with AKONET.Cloud or AKONET.App.
- 24/7 alarm system (email / push notifications).
- Multi-device access (PC / smartphone / tablet).

\*Not subjected to metrological control

### ■ RESULTS

Deploy an AKODATA system connected to AKONET.Cloud for the supermarket chain



# Supermarket group

TEMPERATURE / MOISTURE LOGGING SOLUTIONS AND DATA MONITORING  
FOR ITS PREVENTIVE AND INTELLIGENT MANAGEMENT

Monitoring the temperature and moisture of an installation is relevant in a number of fields; business profitability and productivity, cost reduction, preventive maintenance, immediate reactivity in case of emergencies, intelligent management of the data.  
Our mission is to cover all these needs in the same solution.

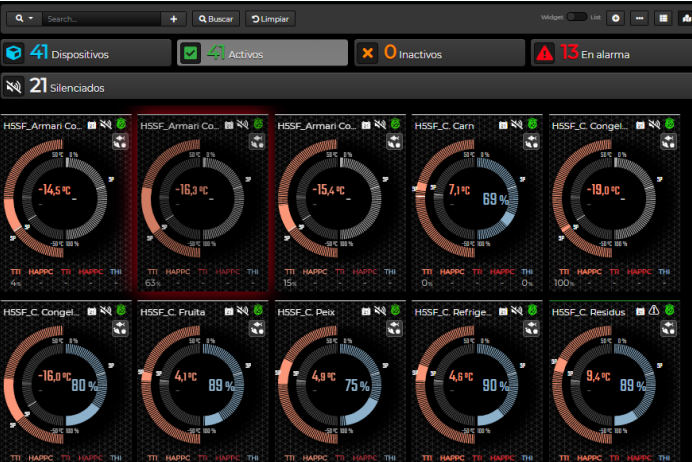
## BENEFITS

### 1 - Multisite display

- Access group visualization according to supermarket code, access equipment
- View group in detail
- Group according to supermarket
- Group according to storage temperature
- Label according to type of service

### 2 - View Akodata devices by list and map

See the equipment by full name, location (map), the group it belongs to and active alarms



AL	Ap.	Name	Description	ID	Reference	Status	Conn.	Signal
0		H2SV_Cambra Congelats CNI	Monitor de temperatura y hum...	D331	AKO-59821	ONLINE	NB-IoT	-112.6 dBm
0		H2SV_Cambra Congelats Fle...	Monitor de temperatura y hum...	D332	AKO-59821	ONLINE	NB-IoT	-90.9 dBm
1		H2SV_Cambra Deixalles CP6	Monitor de temperatura y hum...	D329	AKO-59820	ONLINE	NB-IoT	-98 dBm
1		H2SV_Cambra Fleca CP7	Monitor de temperatura y hum...	D330	AKO-59821	ONLINE	NB-IoT	-86.7 dBm
1		H2SV_Cambra Fruita CP1	Monitor de temperatura y hum...	D324	AKO-59821	ONLINE	NB-IoT	-103.9 dBm
0		H2SV_Cambra Peix CP5	Monitor de temperatura y hum...	D327	AKO-59821	ONLINE	NB-IoT	-100.6 dBm
0		H2SV_Cambra Xarcuteria CP4	Monitor de temperatura y hum...	D325	AKO-59821	ONLINE	NB-IoT	-122.5 dBm
0		H2SV_Mural Begudes LP2	Monitor de temperatura y hum...	D333	AKO-59820	ONLINE	NB-IoT	-111.5 dBm
0		H2SV_Mural Derivats Làctics ...	Monitor de temperatura y hum...	D334	AKO-59820	ONLINE	NB-IoT	-103.4 dBm
0		H2SV_Mural Fruita LP1	Monitor de temperatura y hum...	D335	AKO-59820	ONLINE	NB-IoT	-117.1 dBm
1		H2SV_Mural Làctics LP4	Monitor de temperatura y hum...	D337	AKO-59820	ONLINE	NB-IoT	-100.1 dBm
0		H2SV_Mural Pesca Salada LP7	Monitor de temperatura y hum...	D336	AKO-59820	ONLINE	NB-IoT	-115.8 dBm
1		H2SV_Obrador Carn CP2	Monitor de temperatura y hum...	D328	AKO-59821	ONLINE	NB-IoT	-96.8 dBm

The map view shows the geographical distribution of the monitored locations. Red pins indicate specific device locations, with labels for cities like Barcelona, Tarragona, Lleida, and others. The map also shows major roads and geographical features.

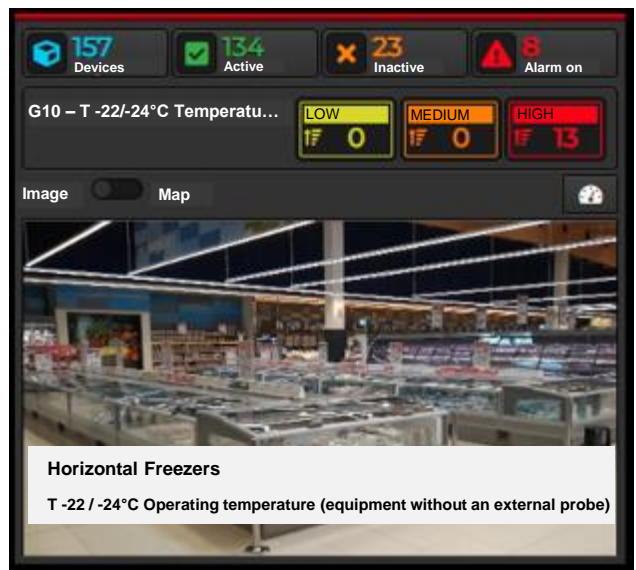


# Supermarket group

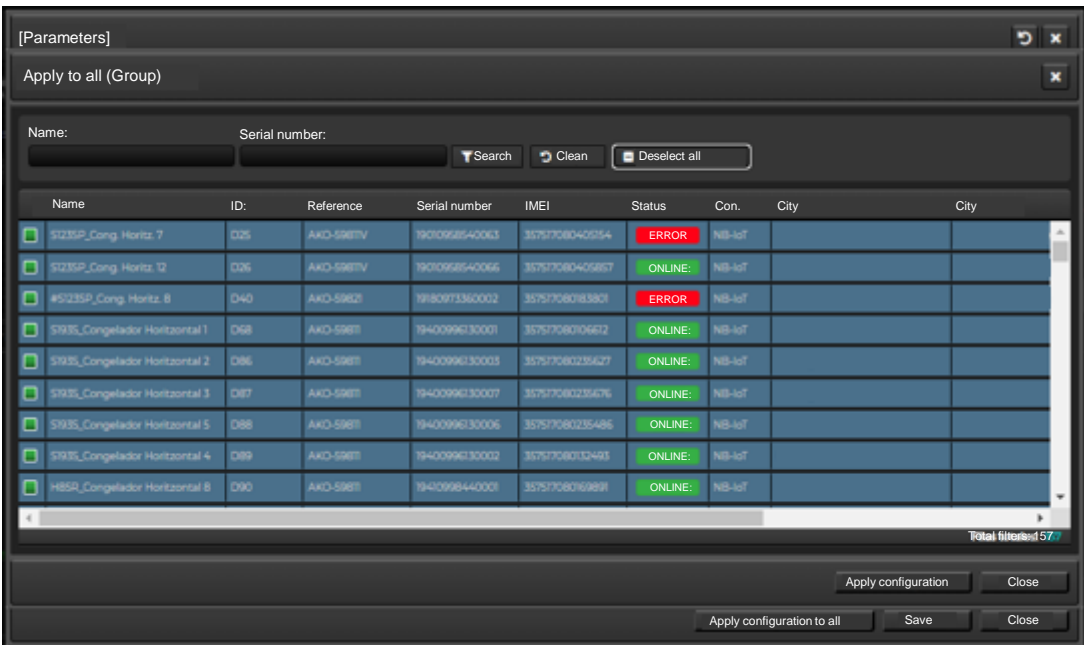
TEMPERATURE / MOISTURE LOGGING SOLUTIONS AND DATA MONITORING  
FOR ITS PREVENTIVE AND INTELLIGENT MANAGEMENT

## BENEFITS

- 3- Multi-side visualization (by store / by type of services / by storage temperature)
- Access the group according to service temperature



- 4 - Apply configurations en masse (change of setpoint and / or alarm levels)



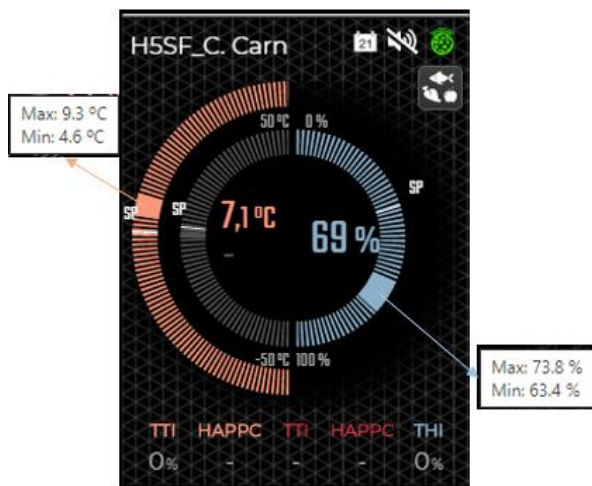
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TEMPERATURE / MOISTURE LOGGING SOLUTIONS AND DATA MONITORING  
FOR ITS PREVENTIVE AND INTELLIGENT MANAGEMENT

## BENEFITS

### 5- Storage temperature control

- Access the service to view the storage temperature and apply corrective actions, if applicable.
- Quickly view the maximum and minimum service intervals.
- Analysis of the temperature continuum to detect anomalies and Time in Temperature Index.



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TEMPERATURE / MOISTURE LOGGING SOLUTIONS AND DATA MONITORING  
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## BENEFITS

### 6 - Generation of immediate and periodic reports

Management report

Instant

Family: AKODATA

Report type: [AKODATA] HACCP report

Goal:

Report for: By group  
By label  
By device

Language: (ES) Español

From: 20/07/2020 To: 21/07/2020

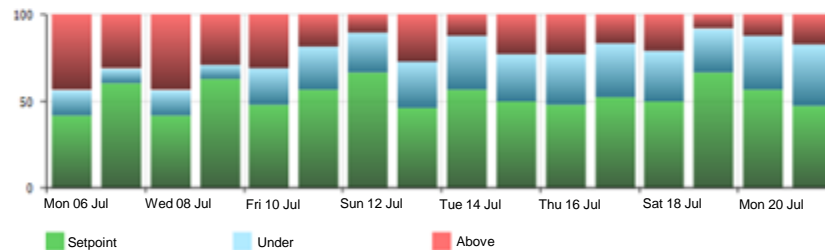
### [AKODATA] Advanced temperature report

Company  
Report Date: 2020-07-21 13:06:26 GMT+00  
Report Interval: 2020-07-06 / 2020-07-21

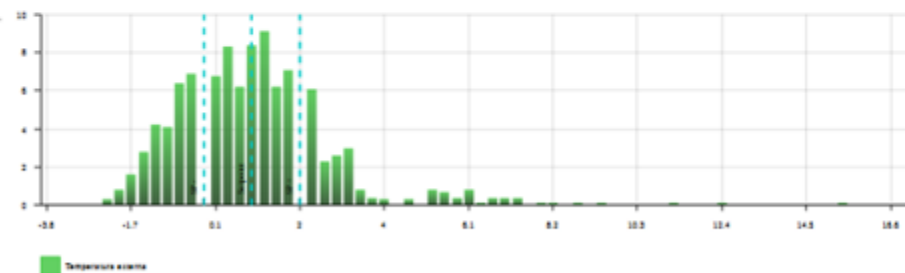
### Device information

Name: S173V\_Semimural Cam  
Description: Temperature and moisture monitor, 3m external NTC probe, IP68. -40T50. battery 6.5 Ah, NB-IoT Band 20  
Address:  
Groups:  
Tags: #Semimural cam  
Reference: AKO-59820  
Serial number: 19451002640012  
ID: D139  
GMT: GMT+02:00

### Time at Set point (External temperature)



### Time and temperature index (External temperature)



Parameter	Value
Setpoint	1°C
Hysteresis	1°C

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TEMPERATURE / MOISTURE LOGGING SOLUTIONS AND DATA MONITORING  
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## BENEFITS

7 - User creation and assignment of supermarkets for each installer by geographical area

Email	Nombre	Apellidos	Activo	Adminis...	Rol	Última conexión	Creado en
			✓	✓		21-07-2020 14:09	21-01-2019 12:41
			✓	✗	Permisos instalador	19-11-2019 16:38	22-01-2019 09:44
			✗	✗	Permisos instalador	04-06-2020 13:01	22-01-2019 20:48
			✓	✓	Administrador del Sistema	21-07-2020 10:28	22-01-2019 20:52
			✓	✓	Administrador del Sistema	17-07-2020 16:50	06-08-2019 16:11
			✓	✗	Permisos instalador	19-07-2020 19:16	04-11-2019 16:22



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