x1814 - Change Host

Version 0

Change Host

Overview

In case of a device having several RF channels, this feature allows to select explicitly a particular channel / host.

Every channel is connectable to a different host whatever the RF protocol (Unifying, BLE, Bolt …)

Functions and Events

[0] getHostInfo() → nbHost, currHost, flags

Get info on the host implementation

Parameters

none

Returns

nbHost

The number of hosts / Rf channels

currHost

The current host index, starting from 0. If we have nbHost, the current host can be 0…nbHost - 1

flags

bit 0 - enhanced host switch on/off → Currently the default value of "flags" is "0" (i.e inactive)
FW tries to connect the specified host
If no success, it will try to connect any host having cookie != 0 and starting from the lowest host (the original host and the specified host are excluded - so for Cala / Talise remains one possibility)
If no success, FW reconnects the original host

Table 1. getHostInfo() response packet format

byte \ bit	7	6	5	4	3	2	1	0
0	nbHost							
1	currHost							
2	flags							
	reserved	reserved	reserved	reserved	reserved	reserved	reserved	ehs on/off
3..15	reserved							

Errors

none

[1] setCurrentHost(currHost)

Set the current host; no return, since, if successful, the device will most probably reset

Parameters

currHost

Index of the new host to select

Table 2. setCurrentHost() request packet format

byte \ bit	7	6	5	4	3	2	1	0
0	currHost							
1..15	reserved							

Returns

none

Errors

none

[2] getCookies() → cookie

Get the data byte for each host

Parameters

none

Returns

Cookie

For every host, the SW has the possibility to read / write a personal data byte ("Cookie"), that will be stored permanently in the device's non volatile memory.
It can be used for example to determine if a given host has a specific SW installed

NOTE	SW can write any value, however: 1) The cookies are all zero for an OOB device 2) When a new host is connected, **FW** clears (= 0) the corresponding cookie

Table 3. getCookies() response packet format

byte \ bit	7	6	5	4	3	2	1	0
0	cookie[0]							
1	cookie[1]							
…	…							
cookie[nbHost - 1]	cookie[nbHost - 1]							
nbHost..15	reserved							

Errors

none

[3] setCookie(host, cookie)

Write the specified cookie

Parameters

host

Channel / host index

cookie

The value to write

Table 4. setCookie() request packet format

byte \ bit	7	6	5	4	3	2	1	0
0	host							
1	cookie							
2..15	reserved							

Returns

none

Errors

InvalidArgument (2) Invalid host index

ChangeLog

- Version 0: Initial version