GL-ZIGBEE USER GUIDE

1: Description

This file is a User Guide on how to operate the Zigbee.
It's for *GL-X750 Spitz* and *GL-S1300 convexa S* which has built-in Zigbee module. Before read this PDF, make sure your router has a Zigbee module built in.

2: Installation and Start

You have to install a necessary package to use Zigbee.
For *GL-X750 Spitz* it's *gl-zigbee_1-2_mips_24kc.ipk*.
For *GL-S1300 convexa S* it's *gl-zigbee_1-2_ipq806x.ipk*.

Install the zigbee packages using commands like this in the SSH :

```
opkg update
opkg install gl-zigbee_1-2_mips_24kc.ipk
```

OR

```
opkg update
opkg install gl-zigbee_1-2_ipq806x.ipk
```

Note that you have to download the package for your router before installation. And make sure your router connect to the network when installing.

Start zigbee :

For GL-X750 Spitz

```
gl_zigbee -p /dev/ttyS0 -b 115200 -f x
```

For GL-S1300 convexa S

```
gl_zigbee
```

It start successfully when print like this

```
root@GL-X750:~# gl_zigbee -p /dev/ttyS0 -b 115200 -f x
Reset info: 11 (SOFTWARE)
ezsp ver 0x06 stack type 0x02 stack ver. [6.3.1 GA build 245]
Ezsp Config: set source route table size to 0x0064:Success: set
Ezsp Config: set security level to 0x0005:Success: set
Ezsp Config: set address table size to 0x0002:Success: set
Ezsp Config: set TC addr cache to 0x0002:Success: set
Ezsp Config: set stack profile to 0x0002:Success: set
Ezsp Config: set MAC indirect TX timeout to 0x1E00:Success: set
Ezsp Config: set max hops to 0x001E:Success: set
Ezsp Config: set tx power mode to 0x8000:Success: set
Ezsp Config: set supported networks to 0x0001:Success: set
Ezsp Policy: set binding modify to "allow for valid endpoints & clusters only":Success: set
Ezsp Policy: set message content in msgSent to "return":Success: set
Ezsp Value : set maximum incoming transfer size to 0x00005200:Success: set
Ezsp Value : set maximum outgoing transfer size to 0x00005200:Success: set
Ezsp Config: set binding table size to 0x0010:Success: set
Ezsp Config: set key table size to 0x0000:Success: set
Ezsp Config: set max end device children to 0x0020:Success: set
Ezsp Config: set aps unicast message count to 0x000A:Success: set
Ezsp Config: set broadcast table size to 0x000F:Success: set
Ezsp Config: set neighbor table size to 0x0010:Success: set
NCP supports maxing out packet buffers
Ezsp Config: set packet buffers to 255
Ezsp Config: set end device poll timeout to 0x0005:Success: set
Ezsp Config: set end device poll timeout shift to 0x0006:Success: set
Ezsp Config: set zll group addresses to 0x0000:Success: set
Ezsp Config: set zll rssi threshold to 0xFF80:Success: set
Ezsp Config: set transient key timeout to 0x00B4:Success: set
Ezsp Endpoint 1 added, profile 0x0104, in clusters: 8, out clusters 20
Ezsp Endpoint 242 added, profile 0xA1E0, in clusters: 0, out clusters 1
Found 0 files

GL_ZIGBEE>
GL_ZIGBEE>
```

3: Using Zigbee Commands

Now you can type commands to control the zigbee module.
There are various commands which could implement all zigbee functions.

For example:

Get the command list

```
help
```

Get current zigbee network info

```
info
```

Build a zigbee network

```
plugin network-creator form 1 0x1000 0x10 0x0b
```

Search and join a zigbee network

```
plugin network-steering start 0
```

Build a ZCL command

```
zcl on-off on
```

Send this ZCL command to remote device

```
send 0x2a2d 1 1
```

And so on ...

Detail commands and parameters descriptions on Zigbee Commands Descriptions