

digitalSTROM Programming Mode Functional State Machine

digitalSTROM

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Contents

| | | |
|----------|--------------------------------------|----------|
| 1 | Programming Mode | 4 |
| 1.1 | Room-Button: CLICK_1P | 4 |
| 1.2 | Area-Button: CLICK_1P | 5 |
| 1.3 | Programming Mode Operation | 5 |
| 1.3.1 | Initial Pushbutton | 5 |
| 1.3.2 | Room Pushbuttons | 6 |
| 1.3.3 | Other Pushbuttons | 6 |

Programming Mode

The Programming Mode enables the configuration of scene values using only pushbuttons (without a digitalSTROM-Server). The pushbutton used to start the Programming Mode defines the scene being altered. The Programming Mode is active in only one zone for one group. The following two tables show how the Programming Mode can be activated.

Room-Button: CLICK_1P

| Origin | | Destination | |
|--------------|--------------------|-------------|----------------------|
| Room | Area | Action | Room Area |
| OFF | OFF | OFF | OFF |
| OFF | ON | OFF | ON |
| OFF | ON (PRIO) | OFF | ON (PRIO) |
| OFF | PRIO ON | OFF | PRIO ON |
| OFF | RUNNING->ON PRIO | OFF | RUNNING->ON PRIO |
| OFF | RUNNING->OFF | OFF | RUNNING->OFF |
| OFF | RUNNING->ON | OFF | RUNNING->ON |
| OFF | RUNNING->ON (PRIO) | OFF | RUNNING->ON (PRIO) |
| ON | OFF | PROG_ON | ROOM_PROG |
| ON | ROOM_ON | PROG_ON | ROOM_PROG |
| ON | ON | PROG_ON | ROOM_PROG |
| ON | ON (PRIO) | PROG_ON | ROOM_PROG |
| ON | PRIO ON | PROG_ON | ROOM_PROG |
| ON | RUNNING->ON PRIO | PROG_ON | ROOM_PROG |
| ON | ROOM_ON | PROG_ON | ROOM_PROG |
| ON | RUNNING->OFF | PROG_ON | ROOM_PROG |
| ON | RUNNING->ON | PROG_ON | ROOM_PROG |
| ON | RUNNING->ON (PRIO) | PROG_ON | ROOM_PROG |
| RUNNING->OFF | OFF | | RUNNING->OFF OFF |
| RUNNING->OFF | PRIO ON | | RUNNING->OFF PRIO ON |
| RUNNING->ON | PRIO ON | PROG_ON | ROOM_PROG |
| RUNNING->ON | ROOM_ON | PROG_ON | ROOM_PROG |

Area-Button: CLICK_1P

| Origin | | Destination | |
|--------------|--------------------|--------------|--------------|
| Room | Area | Action | Room Area |
| OFF | OFF | OFF | OFF |
| OFF | ON | PROG_ON | AREA_PROG |
| OFF | ON (PRIO) | PROG_ON | AREA_PROG |
| OFF | PRIO ON | PROG_ON | AREA_PROG |
| OFF | RUNNING->ON PRIO | PROG_ON | AREA_PROG |
| OFF | RUNNING->OFF | OFF | RUNNING->OFF |
| OFF | RUNNING->ON | PROG_ON | AREA_PROG |
| OFF | RUNNING->ON (PRIO) | PROG_ON | AREA_PROG |
| ON | OFF | ON | OFF |
| ON | ROOM_ON | PROG_ON | ROOM_PROG |
| ON | ON | PROG_ON | AREA_PROG |
| ON | ON (PRIO) | PROG_ON | AREA_PROG |
| ON | PRIO ON | PROG_ON | AREA_PROG |
| ON | RUNNING->ON PRIO | PROG_ON | AREA_PROG |
| ON | ROOM_ON | PROG_ON | ROOM_PROG |
| ON | RUNNING->OFF | ON | RUNNING->OFF |
| ON | RUNNING->ON | PROG_ON | AREA_PROG |
| ON | RUNNING->ON (PRIO) | PROG_ON | AREA_PROG |
| RUNNING->OFF | OFF | RUNNING->OFF | OFF |
| RUNNING->OFF | PRIO ON | PROG_ON | AREA_PROG |
| RUNNING->ON | PRIO ON | PROG_ON | AREA_PROG |
| RUNNING->ON | ROOM_ON | PROG_ON | ROOM_PROG |

ROOM_PROG Start Programming Mode for a room scene

AREA_PROG Start Programming Mode for an area scene (including area membership)

ROOM_PROG Start Programming Mode for a room scene

After the Programming Mode activation the first digitalSTROM-Device is selected and prepared for programming with a PROG_ON.

Programming Mode Operation

In Programming Mode the event handling differs between three categories of pushbuttons:

1. The pushbutton that initiated the Programming Mode (Initial Pushbutton)
2. Pushbuttons that are part of the zone and group that is in Programming Mode (Room Pushbuttons)
3. Other pushbuttons in the other zones of the apartment

Initial Pushbutton

CLICK_1P: SAVE_SCENE and PROG_OFF Room and exit Programming Mode

Any other events are handled according to 1.3.2 below.

Room Pushbuttons

CLICK_1X/TIP_1X: STOP_DEVICE if it is running and toggle currently selected digitalSTROM-Device

CLICK_1X_UP/TIP_1X_UP: STOP_DEVICE if it is running and execute the MAX scene command

CLICK_1X_DOWN/TIP_1X_DOWN: STOP_DEVICE if it is running and execute the MIN scene command

CLICK_2X/TIP_2X/CLICK_2X_UP/TIP_2X_UP/CLICK_2X_DOWN/TIP_2X_DOWN: select the next digitalSTROM-Device in the zone and PROG_ON Device

CLICK_3X/TIP_3X/CLICK_3X_UP/TIP_3X_UP/CLICK_3X_DOWN/TIP_3X_DOWN: PROG_OFF Room and exit Programming Mode

TIP_4X/TIP_4X_UP/TIP_4X_DOWN: ignore

CLICK_1P: ignore

Other Pushbuttons

CLICK_1P: move the digitalSTROM-Device sending the event into the zone where the Programming Mode is active

Any other events are handled according to the functional state machine.