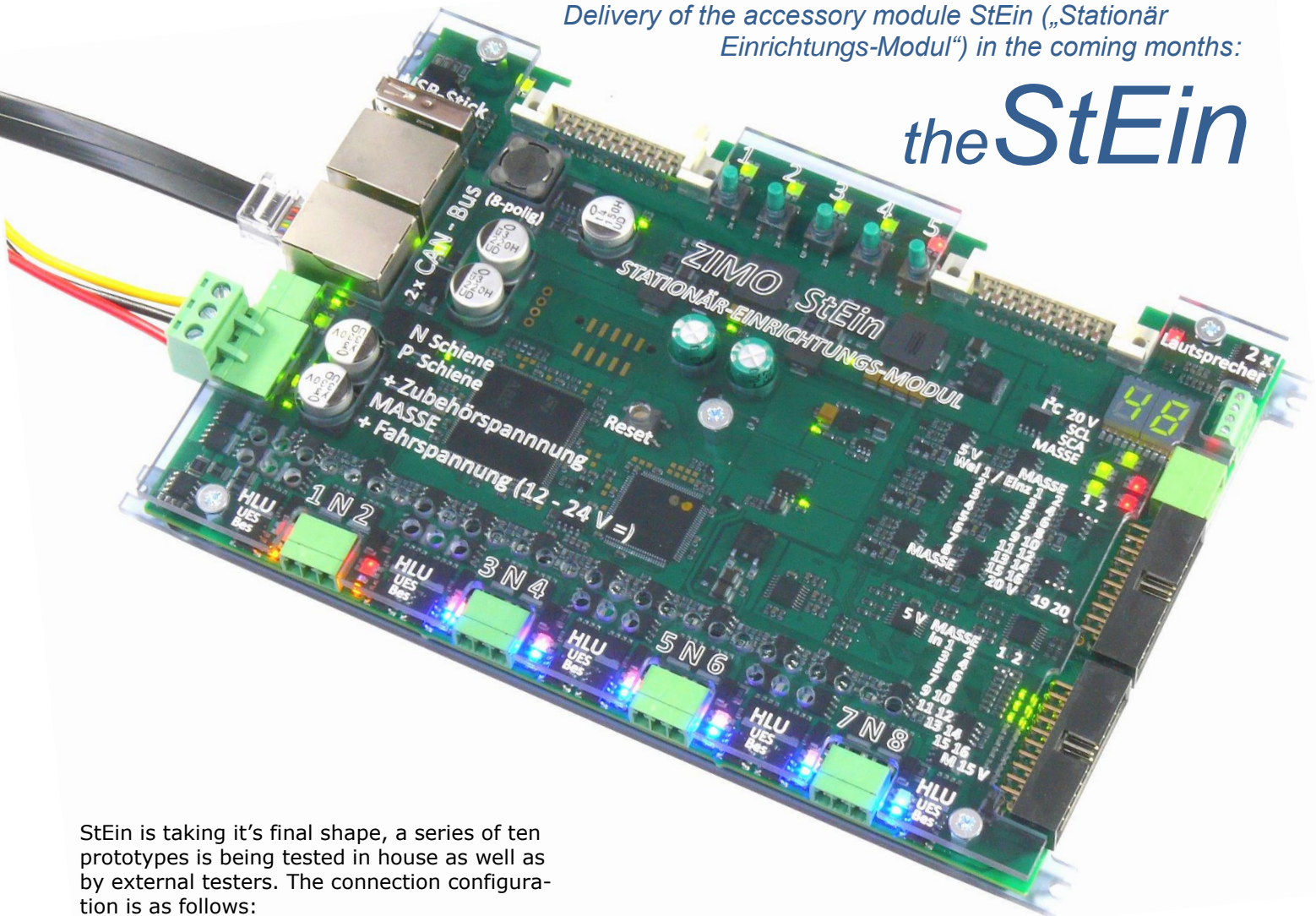


Delivery of the accessory module StEin („Stationär Einrichtungs-Modul“) in the coming months:

the StEin



StEin is taking its final shape, a series of ten prototypes is being tested in house as well as by external testers. The connection configuration is as follows:

- **8** connections for track sections (one sided insulation), up to 8A each, in summ up to 12A (suitable for large scale models); occupancy detection starting at 1mA (corr. with a resistor of 10 – 20kOhm on the axle); short-circuit detection and -shutdown, adjustable thresholds and times; local RailCom (for loco number recognition) and global RailCom (forward complete informations), ZIMO HLU speed limits with seven steps, ZIMO ACKs (for loco number recognition),
- **8** connections for point machines (twin-coil or motor) with comprehensive position- and cycle control, also to be used as 16 single connections for decouplers, lighting etc..
- **16** logic level inputs for sensors of all kind: track contact, light barrier, position indicator etc..
- **1** I²C bus connection for 16 signal boards (these boards being placed near the signals, for 16 LEDs at each board or two outputs for multiplex signals),
- **2** loudspeaker outputs for StEin's own sound generator (e.g. for station announcements),
- **2** plug connectors for expansion boards (even more turnouts, servo motors etc..).

The module is furthermore equipped with a display (showing the module number as well as support in case of manual settings) and numerous status LEDs for: occupancy, shorts, HLU of track sections, input, operation of the switch outputs, various internal voltage and operation.

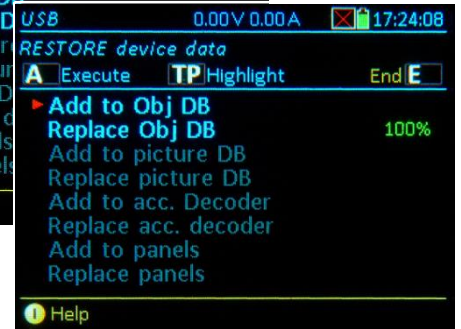
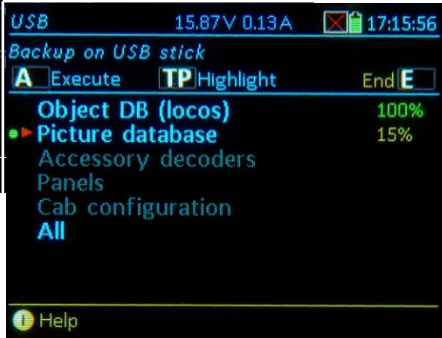
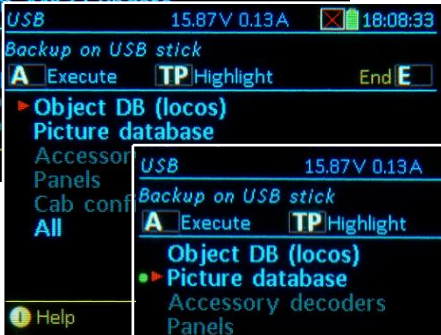
The five keys mainly serve the manual settings of the module when no computer is connected: e.g. fixed HLU states (slow or halt) of the track sections. Later softwares will also handle automatic dependencies (block operation or staging yards).

The USB port is used for updates, possibly new sound files, as well as for loading new configurations generated on external sheets (on the PC).

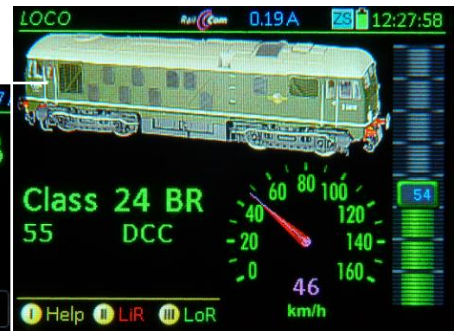
New features resulting of further development of MX10 and MX32 software (version 01.21.xxxx)
Backups, special mappings, LOCO display etc....



A lot of work is mostly put in the content (i.e. **Object Database**, pictures, panels etc... of the cab MX32) created by the user himself. A newly available **backup** now ensures, that this work is safe for use in other MX32's or in case of damage. A **reloading of the data** is possible either complementary or by replacing the original data.



A clear display in the **LOCO** mode: large/small picture, large/small text, large/small speed...

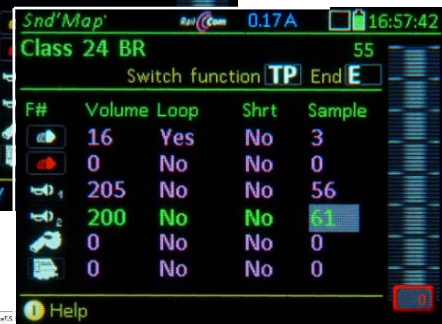
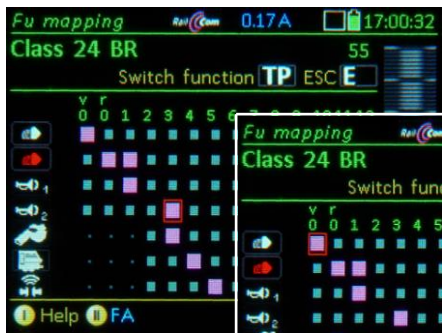


Example on the left (image 1): Locomotive „UP 2804“ was brought to the foreground (from the **LoR**, the **ObjDB** or input of the address). This loco is part of a consist on another cab, thus marked „FT(2)“ (external consist with two locos).

Image 2: after activating any key or the slider, a window appears out of which the consist may be taken over and driven (image 3).

Image 4: pushing the Soft key III opens the **LoR** with further information: the address 5799 is the second loco of the consist, important data and functions are displayed.





RailCom speedo match:
the speed display results from the RailCom feedback; this feedback only delivers an exact value, when the correction factor in CV # 136 (which sets the ratio between speed and distance) is properly adjusted. The software automatically programs CV # 136 when a requested speed shall be shown on the speedo.

Progress was made in the interaction of the TIMO system with interlocking programs; iTrain and Windigpet are currently in process.



The special displays for the different mapping modes simplify the writing of CVs: all these settings occur in the operational mode (OP PROG or POM), reading and acknowledging of CV values is done by RailCom. The following displays are new:

- NMRA function mapping (with or without left shift of higher function keys),
- ZIMO's special „Swiss mapping“,
- ZIMO's special input mapping (switching function keys) and
- ZIMO's sound mapping (assigning volume, loops, sound samples etc.. to the sound classes).

Software-Version 38.00 (partly in 37.xx)

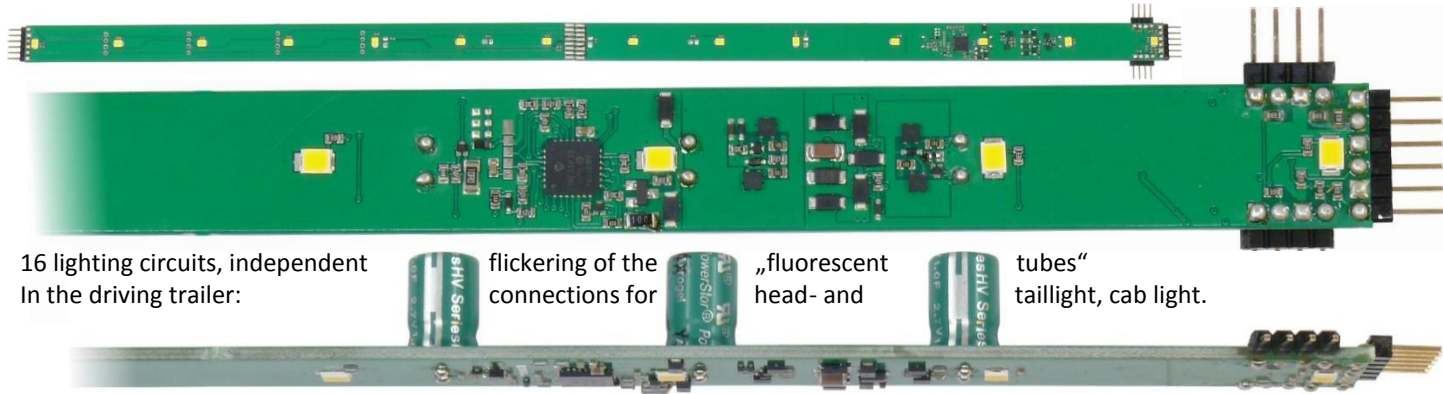
The update for all ZIMO decoders

A multitude of enhancements enabling even better sound effects are being implemented, to a large extent because of the inputs of sound providers and thus are already in use in new sound projects.

- Automatic shift between single and consist addresses when speed step > 0.
- Long consist addresses are shown in decimal notation in their hundred- and thousand digits in CV # 20.
- Switch between an unlimited number of sound sets (until now only 2 possible sets) to represent different load levels of the driving sound. CV # 345 defines the first of the „switching „ function keys, CV # 835 defines the total number of all „switching“ keys in a row.
- 20 diesel sound steps or 16 thyristor sound steps (e.g. ÖBB Taurus), so that almost all possible scales can be played, one step after the other until full throttle.
- „Swiss mapping“ (the „Swiss knife“ for light mapping): flash- and inverse functions added.
- Distance controlled halt (constant breaking distance) can now be adjusted more precisely and direction dependently.
- The CV # 348 („solo ride actions“) has more now: it not only reduces the acceleration and breaking, but also suppresses the brake squeal (in most cases, locos do not make any noise when breaking, wagons do).
- The „speedlock“ feature: using CV # 356 one can switch the function of the cab's slider between controlling speed or sound, as long as there are enough sound steps in the sound project (e.g. ÖBB Taurus).
- The brake light can be used as taillight, glowing constantly but fainter.
- An alternative chuff sound frequency for cogwheel locomotives (after entering the rack). This is part of a developing package of features for such a loco type.
- Large scale decoder MX699: the second independent smoke generator is now usable not only for simple articulated locos but also for diesel locos with two engines, e.g. in the project of the BR 118 DR from Mr. Henning.
- Large scale decoder MX699: „High current RailCom“ is sending its feedback at a higher (double) power (60 mA), which enables a higher range (greater distance between loco and entry point of the MX10 wiring).

Lighting boards for scale-0 passenger cars – DB Silberlinge

The technology of ZIMO accessory decoders working in lighting boards – coming soon in various versions.



3 goldcaps on the upper side of the board (in this case, place enough in the roof of the Kiss scale-0 wagons).!

Klein Reichenbach – a scale-0 layout built by Peer Lange

Presented recently in Gießen (Germany) and Baden (Austria)

„Klein Reichenbach“ comprises 12 modules in total, a small exhibition version counts only 4 modules. The layout shows an open engine shed which is connected to the station with a turntable. This sets the scene effectively for the locomotive models and enables a lot of shunting. Size: 5 x 2,3 m (16ft 5" x 7ft 6"). Seven turnouts in total, one being a three-way turnout, 4 Lenz-Peco and one Lenz turnout. All are powered by servos mounted underfloor. Rails come from Lenz resp. Lenz-Peco mostly using the radius 2 and 10.

Circuits for tracks, turnouts/signals and lighting are separated, ZIMO's Command Station MX10 and MX32FU cabs are in use to control the layout and the locos. A Roco Z21 is working together with MX10's CAN bus and a Roco WiFi-Multimaus can also be connected via the installed router. Signals and turnouts are controlled by the graphical track plan of ESU's ECOS.

All possible vehicles (mass product- or hand made models) are in use on the layout, as long as they have DCC sound decoders. The most exceptional loco is a Shay model made by MTH at a scale of 1:45. The prototype is a standard gauge Shay Class D, the largest loco of this type ever built.



Peer Lange at the exhibit in Baden (near Vienna, Austria).

