Due to the appearance of many new products in the ZIMO System,

The new ZIMO Catalogue (2010) will appear the 2nd half of 2009!



Newsletter - MAY 2009

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The new ZIMO Production Plant goes into operation.

In last week of May, the new assembly machine and the new stencil printer was first used for training the operators, starting actual production in early June. The first product will be a series of sound decoder MX640 (500 pieces), probably followed by the large scale sound decoder MX690.

These two products have also been manufacture on previous machines (which, incidentally, are kept as a reserve and for simpler products). The move brings a much higher production rate due to the elimination of maintenance work which results in more efficient production, thus avoiding delays in delivery, and will allow ZIMO to optimize product quality.

With the new plant, up to 1000 decoder (or 500 sound decoder) per day (approximately 10 hours, so even without the multi-shift operation) may be created, which - if this indeed should be required - in practice, however, additional human resources for after the work (program loading, testing, packaging) would be needed.

For the second half of June, the production of the first series (4000 pieces) of the new decoder of the MX630 type (see below in this newsletter), and thus the capabilities of the new machines will be required (although not fully exploited).





(Ground floor Model railway Club, until 2008: Hardware dealer Büsch 2008: ZIMO House (Schönbrunner Straße 188) and around

New ZIMO Production room in former Büsch premises Construction Mai 2009: Schönbrunner Straße 188 und 186



Delivery of new machine





First training

- < The first assembled board (= 30 pieces of sound decoder MX640)
 - ...and ... the first night > Troubleshooting!



Future work kitchen"



MX63 sold out!

(Replacement by the MX630 in July))

A little earlier than planned - before the successor MX630 is available - the long-standing type MX63 has expired. Although quite a few (hundred, thousand?) copies were sold, a short interruption is inevitable, because it is not possible to produce (via outsourced manufacturing) less than 5000 units at reasonable prices. Such cases of product replacement by the new production facility are more controllable.

As a short-term replacement MX64 can be used (if the space allows, and the MX64 is not sold out or MX620 (when the power of the vehicle is not too great, i.e. not greater than 0.8 A).

The supply interruption anyway lasts only briefly, since July is likely to be the time when the new MX630 is in regular stock.

"Last call" MX64

(before the replacement by the MX630)

All users who are familiar with the MX64 type want to stay, for example, because only a few new installations will be made in the near future, have now (probably only a short time, a bit of June) the possibility of buying the MX64 decoder family, MX64 is available at the usual price until final expiration.

Still a little longer probably the MX64H and MX64V will be available, dependent on need and not predictable. Their successors MX630H and MX630V also need a little more time.



The new 00/H0-Decoder-Family MX630

THE MEMBERS of the new MX630-Family:

 MX630 (1,2 A, 20 x 11 x 3,5 mm)
 9 wires (120 mm)

 MX630R
 NEM 652 on 65 mm wires

 MX630F
 NEM 651 on 65 mm wires

 MX630P
 PluX-16 Socket (15-pin)

MX630E (Flat version 2,5 mm) Will on demand be developed

MX630H (High performance 1,8 A) 9 wires MX630V1, -V5 (Low voltage for functions) 10 wires

Towards the end of June 2009, the new ZIMO production facility will manufacture the MX630 family, which includes MX63, and MX64, MX64H and MX64V replacements. The dimensions of the MX630 (with the exception of the MX630E, MX630H and MX630V) is 20 x 11 x 3.5 mm (i.e. slightly lower than that of the MX63, but the capacity is (particularly the voltage strength to 60 V) is significantly higher than the previous decoder.

Technically, - notwithstanding in the meantime made some improvements - the MX630 as the "first PluX decoder" announced in October 2008 as the MX64P or MX64P16, has not yet gone into production, due to the lack of matching sockets in the locomotives,. This PluX decoder will therefore be "renamed"; from MX64Pto MX630P.

The decoders MX630 are part of a "large family", which the MX620 Miniature decoder, the 21-pin MX64D, and the sound decoder MX640, with all software identical. These ZIMO decoders are similar, when driving, CV's and functionality are concerned.

Prices: MX630 like MX64 (relative to the matching versions), so about EUR 30, - (MX630, MX630R, ..) to EUR 40, - (MX630H) at the dealer.

As previously available: Miniature Decoder MX620:

| MX620 (0,8 A, 13,5 x 8,8 x 2,5 mm) | 7 wires(120 mm) |
|------------------------------------|--------------------------|
| MX620N | .NEM651 direct on socket |
| MX630R | NEM 652 with 65 mm wires |
| MX630F | NEM 651 with 65 mm wires |

As previously available: 21-pin-Decoder MX64D:

MX64D (1,2 A, 20,5 x 15,5 x 4,5 mm) 21-pin MTC-Socket MX64DM Special drive for C-Sinus, Softdrive-Sinus

As previously available: Sound-Decoder MX640:



All ZIMO "N and 00/H0" Decoders (MX620, MX630, MX64D, and MX640) have the following common features:

- Motor- and Functions from 1,2 to 2 A (MX630 and others) for example 0,8 A (MX620) ,
- Current overload protection (with a tolerance for a short time to 2 or 3 A) and temperature protection,
- 6 function outputs (MX630 and others) or 4 function outputs (MX620), each up to 0.5 A load,
- depending on the type, 2 to 5 logic outputs (externally amplified) or LED outputs, in addition to the function outputs,
- depending on the type, 2 or 4 connections for servos in addition to the function outputs,
- suitable for all DC motors and wound-armature motors,
- ZIMO motor control with many optimization options,
- ZIMO acceleration settings ("in accordance with standards", according to NMRA extensions "adaptive," exponential ", ...),
- Shunting functions (half-speed, reduction or shutdown of the momentum and braking effects), alternatively by F3, F4, or MAN),
- time-limited coupling control and coupling dance (auto on/off buttons),
- full NMRA function mapping, as well as ZIMO extensions (directional assignments, Swiss lighting control etc.).
- Blinking, dimming, American and other lighting effects (including soft start, stop light, flickering, automatic Time-off, ...)
- SUSI-interface, depending on type, on solder pads, on PluX-Socket (MX630P) or on21-pin socket (MX64D, MX640D),
- Braking on DC, ABC, "Märklin",
- ZIMO signal influenced constant distance braking (HLU),
- ZIMO train number recognition,
- km/h-control (per speed step 1/2 km/h, 1 km/h or 2 km/h) as an alternative to conventional speed step control,
- constant braking distance in two variations,
- Analog operation either regulated or unregulated (MX630 also AC-analogue),
- Other features under development (for example CV-Sets, ..)
- RailCom: km / h feedback, CV "on-the-main" and then validated programming, address RailCom feedback
- **RailCom** many more applications are scheduled in future software versions.

- Updatable Software: New Software versions can be loaded without opening the loco, with the help of the ZIMO Decoder Update Device MXDECUP or the MX31ZL; from PC with Decoder Update Program or (real easy with MX331ZL) direct from USB-Stick.

"Last call" for MX31FU and MX31ZL

(before replacement by MX32, MX32FU, MX32 + MX10)

The MX31 controller family enjoy still high popularity, but they are lacking in modern technology – compared with the MX32. The fact that we do not have a replacement for some months, and no parallel production of two generations can be operated as many users want, is for reasons of material, only a certain number can be generated, which is about 2000 units.

In June 2009, however, there is again some more production of MX31ZL and MX31FU (if necessary together with MXFU), and those who are interested can now secure!





MX690VEX



The **ZIMO Sound Database** (www.zimo.at, (see link ZIMO Sound Database on the Home Page or under the UPDATE tab) does not have hundreds of entries ..., but it is growing. ZIMO Sound Projects come from various sources:

- ZIMO- (free) Sound Projects ... these are created by (or on behalf of) ZIMO and are in the ZIMO Sound Database for free Download or can be shipped (in a new sound decoder) for a small "loading fee". The offers are being gradually expanded. Otherwise, the European Steam Collection is the default loaded in new decoders. The "Sound Collection" is a special form of Sound Project, with Sound Samples from several different locos, for example several European steam locos, Using a CV setting, you can select the actual sound project to be active.

- External (extra charge) Projects ... come from partners who are bringing their specialized knowledge. The cost of creating and maintaining such sound projects cannot be covered by the decoder purchase. Although you can load them from the ZIMO database, they are specially encoded and cannot be used without a special "load code". Eventually it will be possible to buy these "load codes", download and use these projects with the "load code" (which is created specific for each decoder and bundle of projects). Currently (June 2009), the "load-codes" are not yet available for direct purchase, so these sound projects can only be purchase preloaded on a new sound decoder (with a surcharge).

- Dealer Sound Projects ..., these are created by dealers for their own customers. These sound projects can only be purchased already installed on new sound decoders (with a surcharge), or (possibly) installed on existing decoders for a "re-blow" fee. See the dealer's own website for full details.

New ZIMO Sound Projects, under development and soon to be released:

- Electric Loco E10 (for classes 110, 112 115),
- Hercules (German class BR253, Austrian 2016, also know as "Siemens ER20",
- VW Railbus (for the Brekina Models!),
- German class BR218 alternative engine sounds (versions with and without turbo fan).

As externally provided projects, there are more from Heinz Däppen:

Heinz Däppen has spent long days in Graubünden and over the Bernina to Posciavo making new recordings. From this rich "raw material" comes food for more sound projects in the RhB series, including from the Bernina lines. Also Heinz Däppen had a short holiday in Harz (Germany) and with recordings of the HSB, there are 2 more projects in development for models already on the market..

Already available (currently, only loaded on new sound or loaded onto existing decoders ("re-blow")by Mr. Däppen himself, by Digitoys (Heiner Bösch) or by ZIMO. The procedure to purchase a "load code" for existing decoders and then download and install the sound project by the user is not yet available)

- Ge 4/4 I
- Ge 4/4 II
- Ge 4/4 II
- Ge 6/6 II
- Driving Trailer Abt
- Steam loco G 4/5
- Heidi Steam loco G 3/4

In Summer 2009, 5 US-Projects will appear:

- Rio Grande C-16
- Geared steam loco Classes Climax und Heisler
- Logging Mallet
- A very special acoustic experience, the project for the newly re-announced the Uintah RR Articulated by LGB is a duplex steam locomotive with asynchronous dual exhaust stroke and the sound of the voluminous, unanimous freight whistle. In principle, the locomotive is similar to the BigBoy. Those who have heard the samples talk about goose bumps on the back (*Ed: sorry, hard to translate to English!*)
- Owners of US Locos from the Hartland Locomotive Works, will get optimized sound projects in the 2nd half of 2009.

ZMO Sound Projects are available in two formats for Download from the ZIMO Database (Sound Data Base on <u>www.zimo.at</u>), currently, only for ZIMO's own Sound-Projects! . . .

1) ... as **"Ready-to-Use"- Project:** This is a. ZPP File, which (after the download from the website) is loaded to the sound decoder, either via a USB stick on the MX31ZL, or using ZSP (later ZIRC) and the MXDECUP device or the MX31ZL. All assignments, parameters, and CV values in the project are loaded unchanged. After loading the "Ready-to-Use" project, many assignments and settings can be adjusted, using the normal CV setting procedures in the controller (see sound decoder manuals for details of CV settings that can be adjusted).

2) ... as **"Full-Featured" - Project:** This is a. ZIP file which is downloaded, but not directly loaded into the decoder, but can be extracted ("unzipped") and processed by ZSP (the ZIMO Sound Program). Within ZSP assignments and settings can be modified in a comfortable way, Sound Samples taken from the external sources can be substituted for existing sound samples and new projects from existing sound samples can be created, etc.



Load "Ready-to-Use" Sound Projects using MX31ZL and the USB-Stick.

Experimental CV's in Decoders MX620, MX640, MX69, MX690

from SW-Versions MX620: 9.12, MX640: 4.17, MX69, MX690: 20.17

The CV's # 147 to 149 (not described in the operating manuals) are for experimental purposes to see if some automatic settings (which are currently used in the decoder) may deteriorate the performance in certain special situations. These automatic settings are set off and replaced by manual Settings. The CV's # 147 to 149 will later be removed from the decoder-SW once it is established that the automatic settings have no negative impact, or as soon as they have been optimized.

CV # 147 Messlücke (Timeout)

Recommended initial Vlaue: 20

Too smal a value makes the loco jump. When setting is too high, driving slowly worse. 0 = automatic adjustment

CV # 148 D-Wert

Recommended Initial Vlaue: 20

Too small a setting, the operation will be worse (regulates too little / slow, jerky loco (moves rather slowly)); When values is too much ithe locomotive is restless / shivers. 0 = automatic adjustment

CV # 149 P-Wert

0 = automatisc adjustemtn 1 = P-Wert fixed according to CV# 56 (10 digits)

CV # 150

Normally, the compensation at full speed is always 0 This CV allows the compensation at full speed ito be set.

For exxample: CV # 58 = 200, CV # 10 = 100, CV # 113 = 80, CV # 150 = 40 Result: compensation for running 1 = 200 (of 255), compensation for running 100 (of 252) = 80 (of 255), compensation for running 252 (highest gear) = 200 (of 255).

We ask for your cooperation by please reporting to ZIMO your results of using these experimental CVs!