# Navigator - Wireless railroad pleasures



At this point we present to you our new Navigator system. This digital command station was developed for model railroaders who operate a small or a midsize layout and who do not want to abandon contemporary control techniques.

Thanks to its bi-directional infrared technique, the Navigator allows wireless control of your locos!

### Run locos

The Navigator controls up to 40 locomotives; locos speaking DCC are appropriate. Depending on the decoders' abilities, the Navigator switches up to 21 functions per locomotive and is able to handle up to 9999 addresses.

Of course every loco can be named and assigned individually with an adequate symbol.

### Multiple consists

You can also drive multiple consists with the Navigator; up to 6 locomotives can be moved at the same time. During consist operation access to the functions of each loco is granted - at any time; e.g. you are able to activate the horn of the leading loco.

### Switch magnetic accessories

As is expected of a modern digital command station, the Navigator also switches your magnetic accessories and turnouts. You may construct up to 100 magnetic accessories on your layout and switch them. The Navigator handles all DCC compatible accessory decoders.

# Locomotive settings

Sometimes you cannot avoid changing the settings of your decoders during digital analog operation. The Navigator supports you with the programming of the decoders via its clearly structured operation interface. All CVs of DCC decoders can be read and changed on the programming track. The Navigator is comfortably equipped to ensure you the most enjoyable control of your locomotives.

### Remote control unit

The Navigator remote control unit communicates via a wireless infrared technique with its receiver (the central unit). As long as you are within a radius of approximately 22 feet of the receiver you will be able to reliably control your layout. The wide-angle optic-infrared communication will take care that you only have to produce a visual contact; you do not need to target the receiver.

The advantageously shaped and well-balanced body with a centered back-lit (FSTN) display allows you direct access to the speed and the first ten functions of the selected locomotive. With the unique "joystick" you control the locomotive's speed with your thumb. The Navigator is operated with AAA batteries and can be worn around the neck using the provided strap.

### Central unit

The receiver unit includes a complete central unit together with a booster for the main track connection, a programming track output, and a computer interface. An ECoSlink connection is already provided for a subsequent connection of the ECoS command station.

On the main track output, the Navigator offers enough reserves for driving lighted trains, due to a 3.0A load output. A smooth operation of your layout is granted by an adjustable power supply, whose output current is stabilized and suitable for all gauges. If you wish to read or reprogram your decoders, just drive them onto the accessible programming track.

# The IR receiver

Usually, the infrared (IR) receiver will be plugged into the central unit. It establishes a connection to the remote control unit, and has to be placed in a reachable position so that a visual contact is provided. Thanks to its special wide-angle optics, it covers a distance of almost 180 degrees. If the IR receiver and the central unit are to be separated due to space limitations, it is possible to attach an extension cable. You can use all 5 IR receivers to enlarge the operation distance.

ESU P/N 52906

# Navigator - Features and operation

Power supply

Every Navigator system comes with an appropriate power supply. Thus we can assure you the best possible operation. The output current can be set between 15V - 21V via a potentiometer; suitable for the gauge of your layout. Beyond that, the output current is stabilized. "Blinking" headlights happening during change of load will be a thing of the past.

# Additional remote control units

If you wish to play at your club or with your children or grandchildren, the desire for additional remote control units will arise. You can use up to 4 devices in combination with your Navigator without any restrictions. Every player has access to all locomotives, multiple consists and switches. A dynamic transfer of locos from one remote control unit to another increases the fun to play.

### Additional IR receivers

If you want to use the Navigator on large layouts, or, if there's a "corner" that interrupts the visual contact between remote control unit and central unit, you can secure or improve the reception with the help of additional IR receivers: the connections for at least five IR receivers is provided.

#### **ECoS**

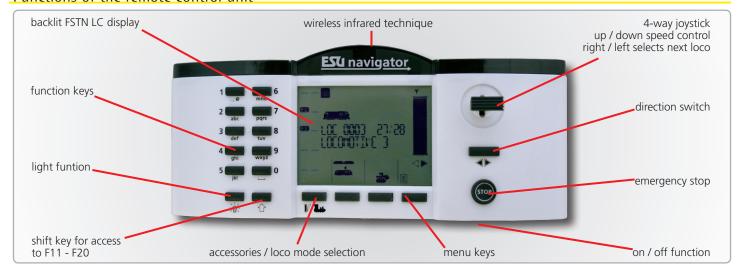
Should you intend to entrust your layout with our ECoS command station one day, you can naturally keep using your Navigator system: thanks to its pre-prepared ECoSlink system bus connection, the Navigator central unit can be connected with the ECoS.

After doing so, you'll have a further booster for the supply of a current line section available, which can also be wirelessly controlled by the remote control units.



Technical data	Navigator
Central unit	H4 booster with 3.0A continuous output-load
	H4 output programming track with 0.25A
	Connection for ECoSlink (slave jack, for ECoS connection)
	Possibility to connect 5 IR receivers
	DCC with 14, 28, 128 speed steps
	Up to 9999 addresses in DCC operation; up to 21 functions per loco
	DCC track formats to control magnetic accessories
	Up to 40 loco objects and 100 switching objects possible.
	All DCC service modes programming on programming track, POM
Remote control unit	Wireless bi-directional IR communication
	Backlit FSTN LC dispay (custom designed); displays name of loco, speed, driving direction, state of function keys
	11 function keys + shift key to activate 21 functions each per each
	4 menu keys
	Emergency stop and direction switch key
	4-way joystick for speed control and loco selection
	2 battery cases for rechargable batteries (current supply)
IR receiver	Wide range receiver including 5 IR transmitter diodes and 2 receivers
	Direct connection possible or extension via 8-pin plug cable
	Wall fastening possible
Included in delivery	IR receiver module, IR remote control unit, adjustable power supply 15V-21V (90VA), terminals for mail track and programming track connection, carrying strap for remote control unit, set of 4 batteries (Alkaline, "AAA"), manual

# Functions of the remote control unit



# **ESU** navigator

ESU LLC 815 60th Ave SE St Cloud MN 56304 USA Phone 1-320-202-0865 Fax 1-320-202-0867

www.loksound.com



# Ordering information

NEW 50302 Navigator IR digital system, DCC system, 3A, 15-21V, manual

**NEW** 50303 Navigator IR receiver, expansion set

NEW) 50304 Navigator IR digital system, single handheld remote control, DCC version, including accessories