ZENIO-P1 Operating manual

Introduction

Dear customer,

You have purchased ZENIO-P1, a system for improving your putting. We wish you lots of fun and success in using the ZENIO-P1.

Your ZENIO SPORTS

Safety information for intended use

General information

- Only use the device together with a putter (no irons, hybrids or woods)!
- Avoid swings with turn rates over 50°/s (equivalent to putts up to max. 10m). You may otherwise damage the position sensor and exceed the specified measuring range!
- The device is not designed for mains connection, do not apply external voltages. Only use 5 Volt DC via the USB charging device or USB connections on a computer!
- The device must be kept away from children. It is not a toy.
- The device contains a Bluetooth transmission and reception unit. Mutual interferences may occur in the vicinity of other BT devices or WLAN devices in the frequency band 2.4GHz, which may affect the function of individual devices. In this case, try going further away and switch off all unnecessary devices.
- If you wish to store the device for more than two months, please ensure the following conditions are met:
 - o Position sensor or charging cable not connected
 - o Store in dry place at temperatures between 10° and max. 40°.

Ambient conditions

- Never immerse the device or the sensor in water.
- Only clean the sensor and the device with a dry or moistened soft cloth / tissue. Cleaning agents containing solvents can damage the surface.
- Never subject the device to high temperatures (over 60°C) and strong temperature fluctuations. Protect the device from direct sunshine and keep away from radiators for long times.
- Avoid subjecting the device to strong mechanical stresses. Do not drop it and protect against hard impacts.

Packaging materials

 Never leave packaging materials lying around. Plastic foil/bags, etc. can become a dangerous toy for children.

Environmentally-friendly disposal

• This device (electronic unit, position sensor and charging cable) is marked according to the European guideline 2002/96/EC for electric and electronic old devices). Use the collection points set up by your region for the return and recycling of electric and electronic old devices.

Device description

Electronic unit ZENIO-P1



Slot for inserting the bracket for mounting on the shaft

Mini USB plug for connecting the position sensor or charging cable

Support with silicone liner for the shaft

Type plate with certifications

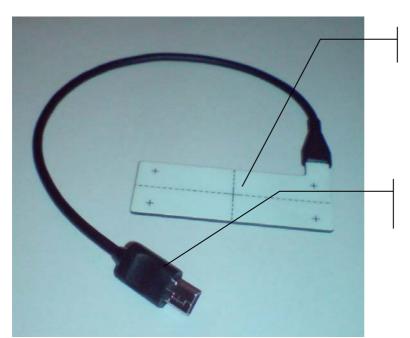


Snap-in bracket for simple clamping on the putting shaft

Type plate with serial number

LED for status display

Position sensor



Position sensor, front side

Mini-USB plug for connection to electronic unit ZENIO-P1

Charging cable

Produce and describe image

Adhesive strips

Produce and describe image

Case

Produce and describe image

ZENIO-P1 technical data

Electronic unit ZENIO-P1 in housing with bracket and silicone lining for non-slip attachment to putter shafts (between 8.9mm and 9.8mm), approx. 20cm above the clubhead with standard bracket. Exchangeable bracket for shafts up to 10.8mm

Weight Approx. 29 grams

Operating temperature 0° to 40° C

Moisture < 85%, non-condensing
Voltage supply Lithium polymer battery
Operating time > 10 hours after a full charge

Charging voltage 5V DC, max. 100mA charging current Charging temperature Between 0° C and 40° C is possible Maximum 4 hours, 1h for 80%

Standby duration 6 days, if fully charged

Interfaces: Charging socket Mini-USB for sensor and charging cable

Yellow LED for status display

Bluetooth v2.0 (without EDR), Class 2, max 2.5mW

Range outdoors approx. 20m

Position sensor

for removable application to clubhead

Size 19mm x 55mm

Active sensor area Approx. 15mm x 50mm

Connection to electronics Via integrated Mini-USB socket.

Weight Approx. 6 grams

Charging cable USB-A and Mini-USB socket, 50cm

Note: This cable is not designed for data transfer based on the USB standard. You can however use any certified USB cable with USB-A and Mini-USB socket instead of the ZENIO

charging cable.

Adhesive strips

Double-sided adhesive strip with clip on one side to hold in place while positioning/removing the position sensor on the clubhead surface.

Size 19mm x 62mm, clip on one side 7mm, non-adhesive

Material basis 3M 9195

Case

Standard Cordura design Optional design in buckskin:

Size, each approx. 17cm x 10cm x 2cm (LxWxH)

Declaration of Conformity

EC Declaration of Conformity



We, Manufacturer/Importer
HEITEC AG
Werner-von-Siemens-Str. 61
91052 Erlangen, Germany

declare that the product putting training aid ZENIO-P1 is in conformity with

- EN 301489-17 Electromagnetic compatibility and Radio spectrum Matters (ERM) - ElectroMagnetic Compatibility (EMC) standard for radio equipment - Part 17: specific conditions for 2,4 GHz wideband transmission systems, 5 GHz high performance RLAN equipment and 5,8 GHz Broadband Data Transmitting Systems.
- IEC 60950 Information technology equipment Safety

Contact person:

Horst Dietz

Tel. +49 (0)9131 877 0

Fax +49 (0)9131 877 199

Signature

horst.dietz@heitec.de

Erlangen, December 6th, 2009

Horst Dietz

Labels on device

A label (min. size 34mm x 8mm) will be located on the inside of the bracket with the following informations:



Certification according to FCC regulations for US and Canada are requested: Certification according to UL regulations are requested Certification according to Bluetooth SIG regulations are requested

Type plate (min. size 11mm x 4) with serial number like

SN 00:11:28

will be located at upper side of black body of device for tracking and traceability.

FCC statements:

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions:

- (1) This device may not cause harmful interference, and
- (2) this device must accept any interference received, including interference that may cause undesired operation.

Warning: Changes or modifications made to this equipment not expressly approved by APPLICANT may void the FCC authorization to operate this equipment.

FCC Radiation Exposure statement:

This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. End users must follow the specific operating instructions for satisfying RF exposure compliance.

This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.

Operation

1. First steps for starting up

Please fill out Warranty Card with serial number you see on type plate and date of purchase first.

Please ensure that the battery of the ZENIO-P1 is fully charged before using it for the first time. To do this, insert the Mini-USB plug of the accompanying charging cable into the Mini-USB socket of the ZENIO-P1. Connect the USB-A socket side into a USB power supply unit (5V DC) or into a USB slot of your computer. The ZENIO-P1 is charging when the LED is lit up. The LED lights up, depending on the charge state, immediately or up to 120 seconds later (battery completely discharged). As soon as the battery is fully charged up, the LED goes out. The charging process can take up to 4 hours, depending on the charge state of the battery.

The ZENIO-P1 is ready for operation after the charging cable has been disconnected (without switching off the USB power supply unit). If a connection with an operating unit (PDA, Smartphone) is not set up within 10 minutes, the ZENIO-P1 energy management system automatically switches off.

If you want to use ZENIO-P1 in combination with an operating unit for training, connect the accompanying position sensor to the Mini-USB socket.

Start the ZENIO software on the PDA/Smartphone



and enter the menu Setup.

Quick Tour is a picture story showing you how to attach ZENIO-P1 to your putter.



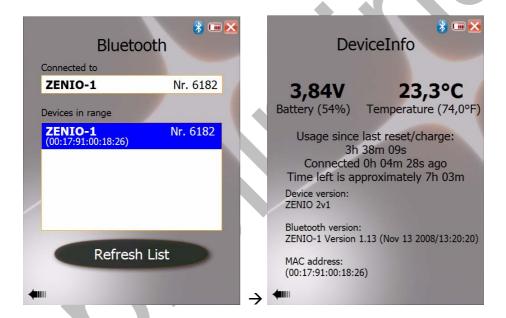
Enter the menu Bluetooth



Search for the activated ZENIO-P1 unit with the "Refresh" button if list is empty. After several seconds (up to 20s), all activated ZENIO-P1 units are displayed with their SN (serial number).



To connect, select your displayed unit (SN is located in the mounting bracket) by clicking on it. Connection set up is successful when the BT symbol color changes from gray to blue within 20s.



After clicking on the BT symbol, the DeviceInfo screen appears for information.

This displays the operating voltage, the interior housing temperature, calculated remaining run time, software versions and MAC address for Bluetooth (last three duets are also the serial number SN).

2. Switching the ZENIO-P1 activation on/off

If the position sensor is connected to the ZENIO-P1 and the battery still has at least 3.3 V operating voltage, the device can be activated by pressing the left side of the device sensor for at least 2 seconds, indicated by the LED lighting up once for a long and two short periods.

Pressing the right side of the sensor for at least 2 seconds deactivates the sensor, indicated by the LED lighting up for two short and one for a longer period.

ZENIO_PUTT remains switched on as long as it is connected with an operating unit via Bluetooth and the internal battery has enough charge for the energy supply. Otherwise, the ZENIO-P1 switches off automatically after 10 minutes. If the battery voltage drops below 3.3V, the ZENIO-P1 also switches off automatically to prolong the service life of the battery. A warning symbol above the battery display is shown for a short period approx. 10 minutes before the unit switches off.

3. Attaching the ZENIO-P1 to the putter

Please connect the position sensor to the ZENIO-P1 and attach the ZENIO-P1 approx. 20cm above the clubhead. Align the ZENIO-P1 with your legs (square to swing direction, between shaft and player) and clubhead. Then attach the sensor centrally (sweetspot) on the clubhead. Please remove dirt, water and grease before attaching the sensor.

4. Connecting the ZENIO-P1 with the operating unit

Please switch on the ZENIO-P1 as described. Then start the ZENIO software on your PDA or Smartphone. Depending on the operating unit, Bluetooth must be activated in the system menu before the ZENIO software is started. Press the Refresh button in the menu Setup/Bluetooth to search for your ZENIO-P1. Select the ZENIO-P1 displayed with your serial number to connect the operating unit. This procedure only has to be implemented once to connect both devices (pairing). In the future, the devices will connect automatically after being switched on.

5. Attaching a new adhesive pad on the position sensor

If the adhesive force between sensor and clubhead is weak, change the adhesive pad. Position the sensor on a flat area so that the clip of the adhesive pad points away from you. Hold the adhesive pad with the clip and pull it off towards you. Whilst doing so, hold the sensor flat on the surface by pressing on the area facing you.

After removing the adhesive pad, you can then apply a new pad. Place the sensor sideways in front of you on a flat surface (e.g. table). Pull the protective foil off from the side where the white clip is visible. Apply the adhesive pad so that the clip lies outside the back sensor area and does not lie on the clubhead when applied, preventing the position sensor from being mounted flush.

Software

ZENIO is more than just a training device to improve your putting. It is an innovative training concept.

ZENIO is an flexible, easy to use and helps you to find your ideal stance, your ideal grip, your ideal posture and your ideal putter.

With ZENIO you can reach your individual comfort zone easily and enjoyably, helping you to feel your best and achieve optimal results when putting.

With ZENIO you can create your personal statistics and compare your individual putting results on your smartphone or PDA as operating unit.

Try it out, ZENIO software is self-explanatory!

Install ZENIO software on your PDA or Smartphone

ZENIO software supports operating units running under Windows Mobile 6.x with touch screens and pixel-resolutions 480x640, 240x320 and 240x400.

Please copy current "Zenio Vx.yy.cab" file with ActiveSync in Directory "Programs" on your operating unit. After that install ZENIO software by clicking on "Zenio Vx.yy" in directory "Programs" using the File-Explorer locally on your operating unit. Follow the instructions of Microsoft Mobile operating system. We recommend to install ZENIO software directly on device memory (not on SD-card) due to performance reasons. Start ZENIO software first time via menu "Start" \rightarrow "Programs" \rightarrow "Zenio". Subsequently you can start ZENIO directly in your Start-menu.

How to train, how to fit and view your statistics

General advice

In order to get valid and best results in time measurements for Rhythm and angles we strongly recommend keeping putter in settled position for a while at addressing. This is important to get clear indications to determine point in time for backswing started.

Training and fitting are always organized in so called sessions. One session consists of 7 putts in sequence under comparable conditions, to achieve reasonable data sets for statistics.

Player Management

Please create player(s) first. You can create new players, edit players and delete players including their putting sessions. To enter PlayerManagement screen please click on Setup → Player buttons.





You can edit a player or create a new player. Please click on Save button when finished to store date. To select a player for training, fitting or editing or deletions please click on item in Playerlist first.



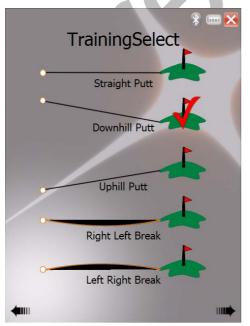


To delete a player including all sessions of him, please double-click on marked item. You will be asked if you are really sure deleting this player with all his sessions.

After selecting current player you are ready to start training or fitting sessions.

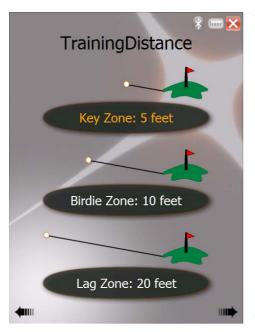
Training Sessions

To start training sessions please click on Start → Training buttons to enter TrainingSelect screen, showing typical putting situations.



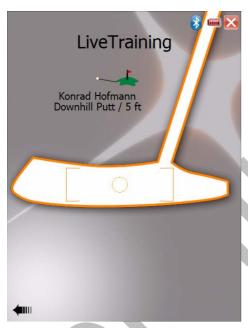
Please select appropriate situation by clicking on green.

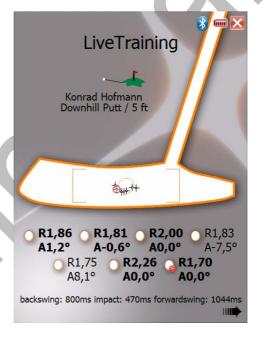
Click on right arrow to continue selecting your training distance.



Please select training distance by clicking on appropriate button.

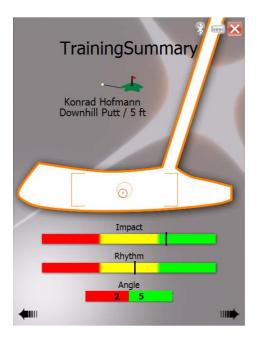


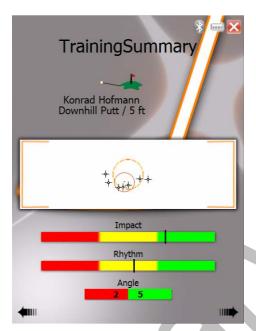




Now ZENIO is ready to record your training putts. Please putt seven balls in sequence . For each putt Rhythm R (as ratio backswing time to time to impact) and open/close angle A are displayed. Current putt position is marked by crossed circle. In order to display impact position of other putts please click once on golf ball left to R and A. Bold putts tell you that under consideration of training distance and correct adressing ball was probably pocketed. Accidently recorded putts can be deleted by clicking on marked golf ball.

Click on right arrow to see screen TrainingSummary.

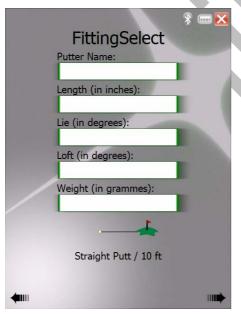




You can also zoom-in and out by clicking on pad (within brackets []). Easy understandable scorings and impact pattern show your training level and consistency in impact position, rhythm and open/close angle.

Fitting Sessions

To start training sessions please click on Start → Fitting buttons to enter FittingSelect screen, asking for informations about selected putter.



Please fill in information to be able to differentiate later which putter fits best to you.

Putter fitting is done always with straight putts in a distance of 10ft. You also should not vary stance, hands and posture while testing different putters.

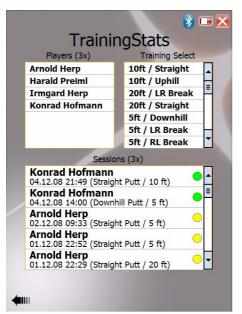
Click on right arrow to come to LiveFitting screen.

LiveFitting is similar to LiveTraining, also FittingSummary to TrainingSummary.

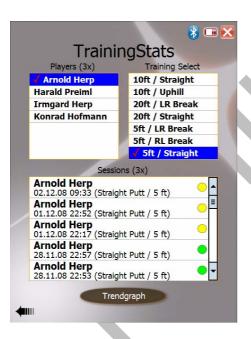
View your statistics

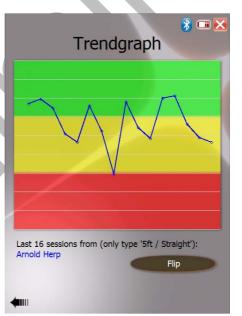
Choose menus Start → Stats to come to select either TrainingStats or FittingStats

TrainingStats



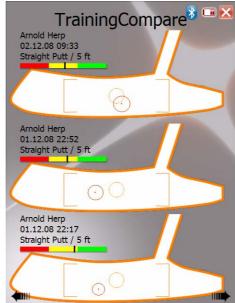
Please select Player then Training Select and then Session (max. 3) to confine information more and more by double-click on list entry.





Selecting only Player and/or Training Select allows you to display a Trendgraph of impact scores by clicking on TrendGraph button.





Please select up to three sessions to come with right arrow to TrainingCompare screen. In this screen you can compare impact patterns, also with zoom-out / zoom-in.

By clicking on session discription field you can analyse this session in detail comming back to TrainingSummary and LiveTraining(viewmode) screen again.

FittingStats

This works quite similar to TrainingStats except that you have to choose up to three putters instead of training situations. After selecting up to three sessions you can also analyse these sessions in detail.

Warranty conditions

- 1. The legal warranty conditions apply. The warranty period begins with the handover of the device. In a warranty claim the device must be returned together with proof of purchase (till receipt, invoice, etc.), the correctly completed device form and a precise description of the error. Without these documents, we are not obliged to meet the warranty.
- 2. During the warranty period, we will rectify all defects free of charge insofar as they are due to material or production errors. The manufacturer retains the right to replace or exchange defective parts/devices. Any other claims, irrespective of type, are excluded. Replaced parts are our property. We are not liable for any consequential damages.
- 3. Interventions regarding the device by companies/persons not authorized by us will render any warranty claims void.
- 4. The warranty does not cover any damages due to incorrect handling, non-compliance with the operating manual and operational wear.
- 5. The original warranty period is not extended by repairs or parts replacement.
- 6. The warranty conditions apply in the EU, USA and Canada.
- 7. Warranty on accessories

 The position sensor, adhesive pads for fastening the sensor on the clubhead of a putter, the leather case and the protective plate for the position sensor are accessories subject to operational wear and are therefore excluded from the regular warranty.

ZENIO-P1 * Warranty Card

HEITEC AG
Werner-von-Siemens-Str. 61
91052 Erlangen, Germany

www.zeniosports.com
warranty@heitec.de

Serial number:

Purchase date:

Please append copy of proof of purchase in the case of defect and return to:

HEITEC AG

Werner-von-Siemens-Str. 61 91052 Erlangen, Germany