

InBody970s

User's Manual

1. Intended Use

The InBody is mainly used for healthy and acutely or chronically ill populations in hospitals, medical practices, and inpatient care facilities in accordance with national regulations. It can be used to assist in the assessment of nutritional status, obesity, and muscle balance. Body composition analysis is important in preventive medicine since it provides the basis of appropriate physical activity and dietary habits for improving personal daily routines. It can also be usefully applied to follow-up studies of patients treated for various diseases.

2. Medical Indication

- **Medical Check-up:** Four body composition analysis can be identified for the risk of developing diseases that are highly related to body composition imbalance, like obesity, malnutrition, fluid imbalance, and osteoporosis for medical check-up.
- **Obesity:** Percent Body Fat has been recommended rather than BMI to ensure proper weight loss and improvements in long-term health, tracking changes for adjusting/developing customized treatments.
- **Pediatric Obesity:** Body composition measurement is an essential part of health assessments for children and adolescents. Percent Body Fat is better than the indicators of weight status to identify children and adolescents with unfavorable lipid profiles.
- **Sarcopenia:** InBody provides a quick, easy-to-perform test that calculates the Skeletal Muscle Index (SMI), the sum of the lean mass in the arms and legs normalized for height. This marker is useful in identifying low muscle in the appendages, which increases frailty risk.
- **Diabetes & Endocrinology:** Diabetes is often associated with excess fat; however, having insufficient muscle mass is just as detrimental and increases diabetes risk. Also, visceral fat plays a key role in the development of metabolic and cardiovascular disease.
- **Edema:** Over-hydration as assessed by ECW Ratio (ECW/TBW) is prevalent in dialysis patients and is associated with loss of residual renal function, inflammation, malnutrition, and hypertension. Monitoring the ECW Ratio (ECW/TBW) provides an assessment of fluid accumulation in the extracellular space resulting from compromised cardiovascular function. The patients who did not have ascites originally but had higher ECW/TBW had a higher incidence of ascites in liver cirrhosis.
- **Segmental Fluid Retention:** InBody objectively measures each region of the body separately and provides segmental ECW Ratio measures each of the arms, legs, and the trunk and these measures can be used to detect fluid imbalances resulting from the development or progression of lymphedema.
- **Nutrition:** The four primary components of the nutritional assessment are summarized by the mnemonic ABCD, with A standing for anthropometric measurements, including stature, body weight, BMI, and body composition. Body composition analysis can reveal changes in body composition (body water, protein, minerals, and body fat) that cannot be known by changes in body weight.
- **Fitness:** Strength training greatly stimulates muscle growth, exercise burns the calories and strengthens cardiorespiratory capacity, which reduces the risk of diabetes, heart disease, and other health concerns and result in the various changes in body composition. Body composition analysis shows skeletal muscle mass and lean in each segment of the body, which helps focusing on building more muscle or correcting imbalances.
- The InBody device is not a diagnostic device. To make an accurate diagnosis, the physician needs to commission thorough examinations and take their results into account in addition to the results of the InBody.
- The InBody device is not used in home healthcare environment.

3. Contraindication

Individuals with medical implant devices, such as pacemakers, or essential support devices, such as patient monitoring systems, must not use this device. Safe, micro alternative currents will flow through the body during the test, which may cause malfunctioning of the device or endanger lives. Individuals with known metal allergies against stainless steel materials shall not use the device.

4. Intended User Profile

1. **Education:**
 - At least, the user needs to be able to understand the explanation of words on screen.
2. **Knowledge:**
 - At least, the user needs to be able to understand the explanations of words on the screen.
3. **Language Understanding:**
 - Basic language: English
 - Languages are supported as specified in the marketing need.
4. **Experience:**
 - None required.

5. Intended Patient Population and User Profile

1. **Age:** 3+ years
2. **Weight:** 2 - 300 kg (4.4 - 661.4 lb)
3. **Health:** The examinee needs to be able to stand for 1 - 2 minutes.
4. **Condition:** Individuals with medical implant devices such as pacemakers, or essential support devices such as patient monitoring systems, must not use this device. The currents will flow through the body during the test, which may cause malfunctioning of the device or endanger lives.
5. **Nationality:** Multiple
6. **Patient state:** Woken up, mentally healthy
7. **Height:** 95 - 220 cm (3 ft 1.4 in - 7 ft 2.6 in)

InBody User's Manual for Measurement Guide and Setup

Thank you for purchasing the InBody.
This user's manual describes all the features of the InBody.
Please read before use and keep it in a safe place.
By following the instructions in the manual, you will be able to use the InBody more safely and effectively.

Headquarters Information InBody

(주)인바디 본사 [대한민국]
06106 서울시 강남구 언주로625 인바디빌딩
TEL: 02-501-3939 FAX: 02-6919-2417 고객센터: 1899-5841
Website: inbody.com E-mail: info@inbody.com

InBody Co., Ltd. [H.Q.]

InBody Bldg., 625, Eonju-ro, Gangnam-gu, Seoul 06106 KOREA
TEL: +82-2-501-3939 FAX: +82-2-6919-2417
Website: inbody.com E-mail: info@inbody.com

(주)인바디

31025 충청남도 천안시 서북구 입장면 흑암길 15
TEL: 041-581-3003 FAX: 041-581-3103
Website: inbody.com E-mail: info@inbody.com

InBody Co., Ltd. [MANUFACTURER]

15, Heugam-gil, Ipjang-myeon, Seobuk-gu, Cheonan-si,
Chungcheongnam-do 31025 KOREA
TEL: +82-41-581-3003 FAX: +82-41-581-3103
Website: inbody.com E-mail: info@inbody.com

Representative & Sponsor Information

InBody Europe B.V. [NETHERLANDS]

Gyroscoopweg 122, 1042 AZ, Amsterdam, The Netherlands
TEL: +31-20-238-6080 FAX: +31-6-5734-1858
Website: nl.inbody.com E-mail: info.eu@inbody.com
Website (CS): csinbody.eu E-mail (CS): support@inbody.com

InBody Europe B.V. Niederlassung Deutschland [GERMANY]

Mergenthalerallee 15-21, 65760 Eschborn, Germany
TEL: +49-6196-76-916-62 FAX: +49-6196-76-916-11
Website: de.inbody.com E-mail: erfolg@inbody.com

InBody UK [UNITED KINGDOM]

11 Phoenix Park, Telford Way, Stephenson Industrial Estate,
Coalville LE67 3HB, United Kingdom
TEL: +44-1530-569620
Website: uk.inbody.com E-mail: uk@inbody.com

InBody Oceania [AUSTRALIA]

Main office: Level 8, 1 York Street, SYDNEY, NSW 2000, Australia
Showroom: U2/82-86 Minnie Street, Southport, Queensland
TEL: +61-7-5681-1900
Website: au.inbody.com Email: oceania@inbody.com

InBody USA [USA]

13850 Cerritos Corporate Dr. Unit C Cerritos, CA 90703 USA
TEL: +1-323-932-6503 FAX: +1-323-952-5009
Website: inbodyusa.com E-mail: info.us@inbody.com

InBody BWA Inc. [USA]

2550 Eisenhower Avenue, Suite C 209, Audubon, PA 19403
TEL: +1-610-348-7745
Website: inbodybwa.com E-mail: bwainquiries@inbody.com

株式会社インボディ・ジャパン [JAPAN]

〒136-0071 東京都江東区亀戸1-28-6 タニビル
TEL: 03-5875-5780 FAX: 03-5875-5781
Website: inbody.co.jp E-mail: inbody@inbody.co.jp

拜斯倍斯医疗器械贸易（上海）有限公司 [代理人及售后服务] [CHINA]

代理人地址：上海市闵行区宜山路1698号903、904室
电话：+86-21-6443-9705 传真：+86-21-6443-9706
网站：inbodychina.com 电子邮箱：info@inbodychina.com

InBody Asia [MALAYSIA & SINGAPORE]

Unit 3A-11, Oval Damansara, 685 Jalan Damansara Kuala Lumpur,
WP KL 60000 Malaysia
TEL: +60-3-7732-0790 FAX: +60-3-7733-0790
Website: inbodyasia.com E-mail: info@inbodyasia.com

Biospace Latin America [MEXICO]

Insurgentes Sur 1457, Piso 15 Int.2. Col. Insurgentes Mixcoac,
Alcaldia Benito Juarez, C.P. 03920, Ciudad de Mexico, Mexico
TEL: +52-55-5025-0147
Website: inbodymexico.com E-mail: info.mx@inbody.com

InBody India [INDIA]

57/57 A, 1st Floor, Raj Industrial Complex, Military Road, Marol,
Andheri (East). Mumbai- 400059, Maharashtra, India
TEL: +91-22-6223-1911
Website: inbody.in E-mail: india@inbody.com

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1 Safety

1.1 Safety Symbols Used in the User's Manual

Warning

Failure to comply with safety warnings and regulations can cause serious injury or death.

Caution

Failure to comply with safety cautions and regulations can cause injury or property damage.

Note

LookinBody applies the same as LookinBody120.

1.2 Precautions for Use

Warning

- Individuals with medical implant devices such as pacemakers, or essential support devices such as patient monitoring systems, must not use this device. Although the micro alternative currents flowing through the body during the test are relatively safe, they can potentially cause external devices to malfunction, which can endanger lives. InBody Co., Ltd., shall not be liable for any damages to an individual or the devices that occurred by not complying with the content above.
- The Bioelectrical Impedance Analysis (BIA) method does not harm the human body because it uses micro alternative currents. However, if you are pregnant, please consult your doctor or specialist.
- Individuals with a contagious or infectious disease are not recommended to use the device. If an individual with any kind of contagious disease or infection tests on the InBody, use an alcohol-based disinfectant (e.g., 70 % ethanol) to clean the device.
- Do not pour liquid cleaner directly onto the device. If liquid cleaner flows into the device, it may cause malfunction or an electric shock due to a short circuit.
- Do not use this device for any purpose other than body composition analysis or weight measurement.
- This device is not a diagnostic device. To make an accurate diagnosis, consult your doctor.
- Failure to follow these instructions may result in the user suffering serious injuries.
- Failure to comply with safety warnings and regulations may result in the user's death or serious injury.
- When not in use for an extended period, please disconnect the power plug from the outlet.
- Please do not apply excessive force when removing the power plug.

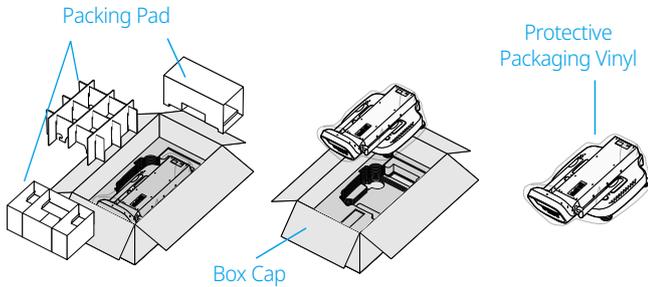
Caution

- This is a sensitive device that precisely measures the body composition. If you test near electronic devices such as refrigerators, TVs or right under fluorescent lights, the test results may be inaccurate. Please use the device away from electronic devices.
- Do not use the device in a humid space such as a bathroom, as excessively high or low temperature, humidity, and pressure may affect the operation of the device. Use in the installation environment specified in the devices specifications.
- Do not allow any liquid substances to contact the device directly. Keep food and drinks away from the device. Substances getting inside the device can cause critical damage to the electronic components.
- Do not disassemble or modify the device including internal parts without written consent from the manufacturer. This may cause electric shock or injury, device malfunction, inaccurate test results, and will void the manufacturer's warranty.
- Children or people with restricted mobility should be tested with the help of an instructor or assistant.
- When storing the device for a long period of time, store it on a flat surface after turning off the device, unplugging the adapter, and packing the device.
- Dispose of the device and its batteries in accordance with the relevant local laws and regulations.
- Repairs and inspections can only be performed by InBody's technician. For repairs and inspections, contact the customer service.
- Do not support yourself with the device when stepping up or down from the footplate.
- Please be careful not to trip or get your foot caught in the footplate.
- Failure to follow these instructions may result in device damage or inaccurate test results.
- Failure to comply with safety precautions and regulations may result in the user suffering injuries or incurring property damage.

2 Device Overview

2.1 Unpacking

Open the device packing box and remove the packaging pad. Take the device out of the packing box.



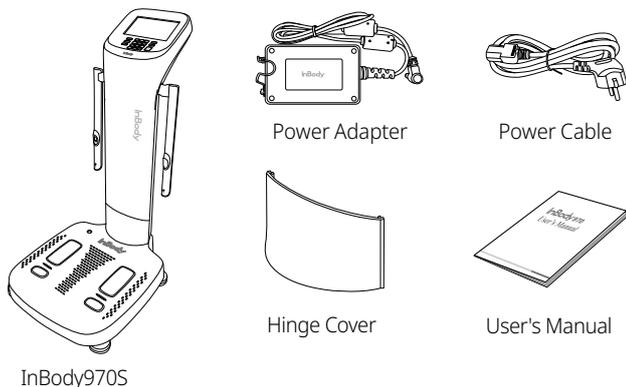
Caution

- When transporting the device, do not grab the upper section or hand electrode connection area.
- For repackaging the device at a later time, the supplied packing materials must be kept. Other wastes should be disposed according to relevant local laws and regulations.
- Be careful not to get your hands or feet caught by the packing box.
- Keep children away from the packing box.
- Do not put protective packaging vinyl on your face.
- Refer to the description below when transporting InBody.

2.2 Device Components

Device consists of the following components. Make sure all of the following components are present.

* Please check if the device has any damage prior to installation.

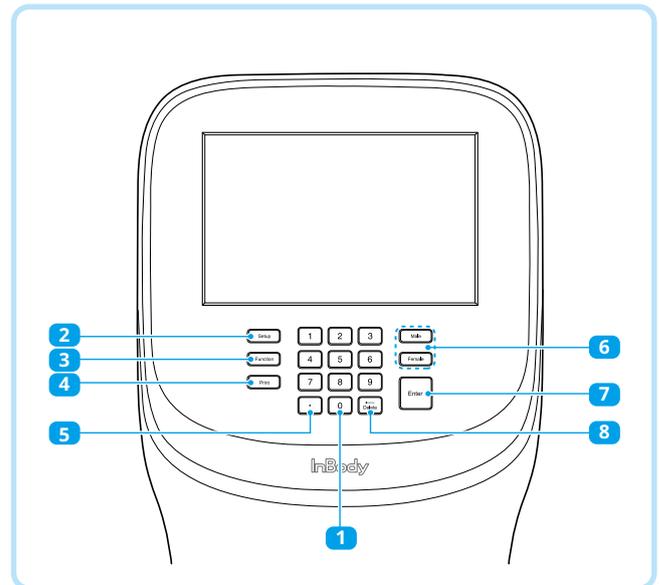


2.3 Name of Each Part

Functions

The names and functions of each part of the device are as follows.

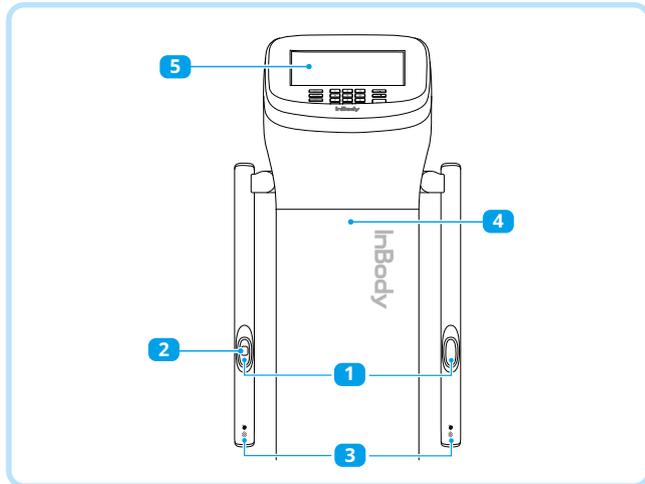
* Please check each component for damage prior to installation.



- 1 Number Button: Enter numeric data such as age and height.
- 2 Setup Button: Enter the 'Setup' in the Administrator Menu from the test standby screen.
- 3 Function Button: Enter the 'FAQ' screen directly from the test standby screen.
- 4 Print Button: Reprint test results.
- 5 Decimal Point Button: Enter the decimal point in ID, height, age and weight.
- 6 Gender Buttons: Select the gender (Male, Female).
- 7 Enter Button: Used when input is completed or changes are saved in the Administrator Menu.
- 8 Delete Button: Used to delete the saved data.

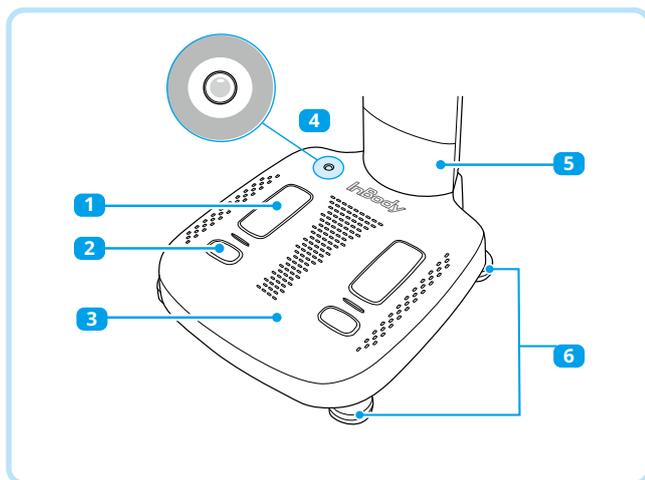
Device Overview

Exterior



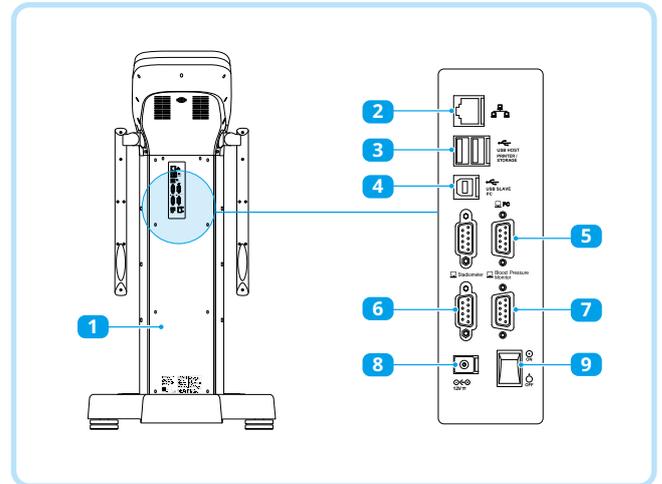
- 1** Hand electrode: For testing, all four fingers must wrap around the hand electrode to contact the surface, and the thumb touches the thumb electrode.
- 2** Fingerprint Recognition Sensor: The sensor recognizes the fingerprint on the left thumb and saves or loads personal information automatically.
- 3** InBodyBAND Recognition Sensor: Receives personal information in wirelessly connected to InBodyBAND.
- 4** Body: Connects the upper section and the lower section.
- 5** Display: It displays each step of the test, the guide, and the test result. Users can input test data, set the test environment, and view results on the touchscreen.

Footplate



- 1** Front Sole Electrode: This area is the electric contacting area where user's front foot treads to contact during the test.
- 2** Rear Sole Electrode Area: This area is the electric contacting area where user's heel treads to contact during the test.
- 3** Footplate: Connected to loadcells that measure the user's weight.
- 4** Level Indicator: Shows the level status of the device.
- 5** Hinge Cover: Used to cover the connecting part of the upper section and lower section.
- 6** Leveling Supporter: Can fit the level by adjusting the height.

Rear Panel



- 1** Rear cover: Used for inspecting internal inspections, etc. The verified InBody service engineer can only open it.
- 2** LAN Port (10/100 T-Base): Connect the device to the Internet or Lookinbody installed on the PC via a wire connection.
* You can connect the InBody to LookinBody installed on the PC if at least one of **2, 4, 5** ports is connected.
- 3** USB HOST Port: Connect printer, USB thumb drive and barcode reader.
- 4** USB SLAVE Port: Connect the device to LookinBody installed on the PC.
* You can connect the device to LookinBody installed on the PC if at least one of **2, 4, 5** ports is connected.
- 5** PC 9-pin Serial Terminal (Female, RS-232C): Can be used to connect the device with LookinBody installed on the PC.
* You can connect the device to LookinBody installed on the PC if at least one of **2, 4, 5** ports is connected.
- 6** Stadiometer 9-pin Serial Terminal (Female, RS-232C): Connect the InBody with a stadiometer.
* Make sure to connect only the InBody stadiometer.
- 7** Blood Pressure Monitor 9-pin Serial Terminal (Female, RS-232C): Connect the device with a blood pressure monitor.
* Make sure to connect only the InBody Blood Pressure Monitor.
- 8** Power Jack: Connect a power adapter.
* Use the adapter provided by only InBody.
- 9** Power Switch: Turn the device on and off.

3 Installation

3.1 Installation Environment

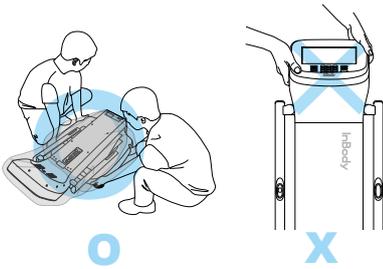
Check the environment before installing the device. This device is suitable for indoor use. If installing this device outdoors, the following requirements must be fulfilled.

Temperature Range	10 ~ 40 °C (50 ~ 104 °F)
Relative Humidity	30 ~ 75 % RH (No Condensation)
Atmospheric Pressure	70 ~ 106 kPa

3.2 Installation

Caution

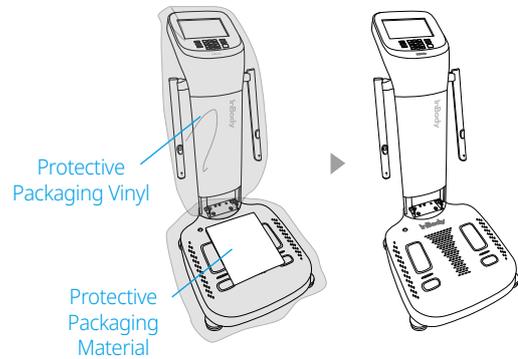
Do not transport the device by holding the head.



Caution

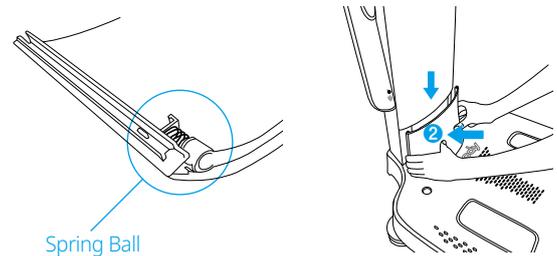
- Using the device in a dry environment or on a carpet may result in static electricity and damage to the device. Use an antistatic mat if you need to install it in an environment with static electricity.
- Install the device on the flat and vibration-free floor. If the device is installed where the floor is not flat, it may topple during a test or the test results may be inaccurate.
- Do not clean the foot electrode and the hand electrode with detergent. If liquid cleaner flows into the device, it may cause corrosion and malfunction. To clean the device, use the alcohol-based disinfectant (e.g., 70 % ethanol).

- 1 Raise the device upper section to the end and then remove the protective packaging vinyl. Remove the protective packaging material placed over the footplate.



- 2 When assembling the hinge cover, push it slightly in the vertical direction so that the spring ball is inserted in the standing end, and push the hinge cover into the direction of the arrow.

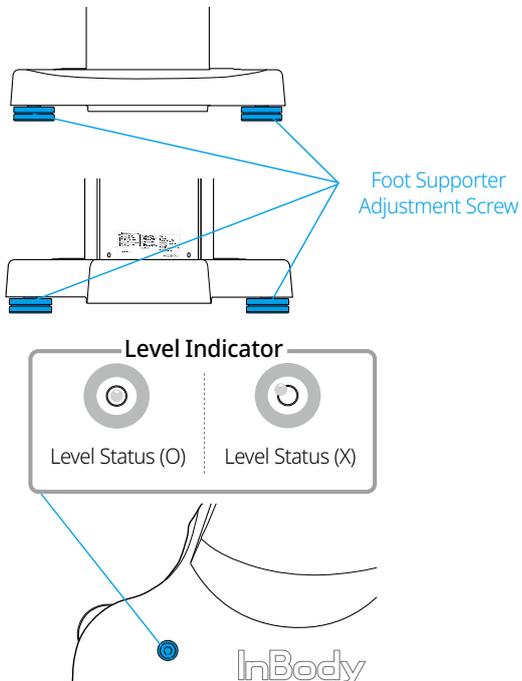
- * If the hinge cover is pressed strongly after the spring is inserted fully, or the stand is lowered with it attached, it may cause scratches.
- * Be careful not to get your fingers caught when assembling the hinge.



Installation

- 3** Adjust the foot supporters to center the bubble in the level indicator and to level the device for accurate weight measurement.

* For accurate weight measurement, the device should be leveled.

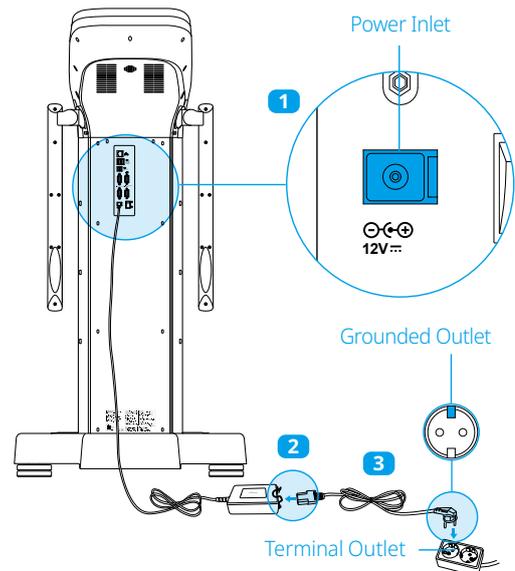


Caution

- Be careful not to get your hands hurt when handling the foot supporter adjustment screw.

- 4** Connect the power adapter (**2**) to the power inlet on the rear of the device (**1**). Connect the power cable (**3**) to the connected power adapter (**2**). Connect the plug of the power cable (**3**) to a 3-terminal outlet with a ground terminal.

* The device can be connected to optional device such as a stadiometer, and LookinBody. For details to connect, please refer to '5 Connecting Compatible Device' in this User's Manual.



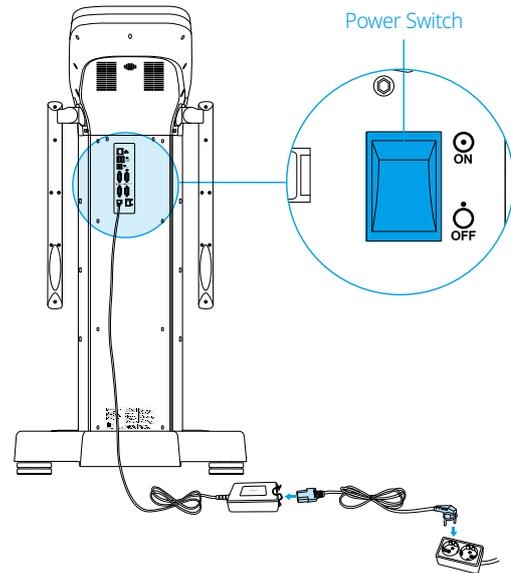
Warning

- Do not pull the power cord violently.
- Do not plug in or pull out the power cord with wet hands. There is a risk of an electric shock.
- Always use an outlet connected to the rated power (AC 100 - 240 V). Using other power-rated outlets may result in fire or malfunction.
- When using a power surge protector, make sure that the outlet or the extension cable has adequate power capacity.
- Do not disassemble or modify the device including internal parts without written consent from the manufacturer. This may cause electric shock or injury, device malfunction, inaccurate results, and will void the manufacturer's warranty.
- Avoid direct contact between the device and other electronic devices while it is on.
- If you have not been using the device for a long time, unplug the power cord.

Caution

- The device may get damaged or malfunctioned due to the electric if plugging into an ungrounded outlet. Or the test results may be inaccurate.
- If the device is subjected to electrical interference, the test results may be inaccurate. Do not install the device in close proximity with fluorescent lights, the device with a large AC motors such as treadmills, vibrating platform refrigerators, air conditioners, compressors, etc., high-frequency heat treatment devices, and heating devices that cause electrical interference. Unplug and plug them into different power outlets when the device and a device that causes electrical interference are connected to the same power outlet.
- If you are connecting the device to another device then turn on the other device first. On the contrary, turn off the power of the device first, and then turn off the power of the other device when turning off the power. This can minimize the electric shock to the device.
- Use the adapter provided by the device. The device may malfunction when other adapters are used.
- If you are operating the device at a place where the altitude is 2,000 m (6562 ft.) or higher, the weight measurement may be affected.
- Do not use the device near heat sources such as heating appliances. It may cause deformation, breakdown or fire by heat.
- Use the device in a location where it is not exposed to direct sunlight. It may cause discoloration or damage to the device.
- Be careful not to pull the cables connected to the device. Otherwise, it may cause a weight measurement error.

- 5 Press the power switch to turn it on.



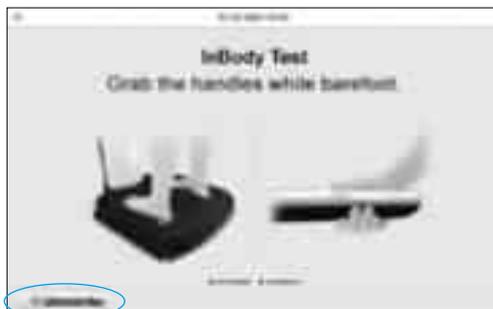
4 Setting

4.1 Initial Setup

- 1 The device automatically starts booting when it is turned on. While booting, it performs a self-weight calibration.
 - * While booting about 5 minutes, make sure there is nothing on top of the footplate. Please do not stand on the footplate, or place objects on the footplate.



- 2 Press the [Administrator Menu] on the test standby screen.



Administrator Menu Button

- 3 Enter the administrator password to set the password. This screen will appear only once for the initial password setup.



- * Be careful not to forget the password you set. If you have forgotten your password, please contact InBody Customer Service

- 4 You will see 'Setup' and 'FAQ' when you enter the Administrator Menu.



Setup



FAQ

Setup

Configure settings and manage data according to the test environment.

- 01 **Date/Date Format/Time/Units/Password/Volume/Country/Language**
 - : This option allows you to change the basic settings of the device.
- 02 **Self Mode/Professional Mode**
 - Self Mode: The subject takes the InBody Test by entering only his/her height. Throughout the test, instructions and the InBody Information will be shown on the screen.
 - Professional Mode: An instructor is present and guides the subject throughout the InBody Test.
- 03 N/A
- 04 **Cloud Service**
 - : InBody App provides services that allow members to check and manage results themselves. If you enter your mobile phone number, you can check the results on the member's mobile phone as the InBody results are transmitted to InBody Cloud.

- 05 Bypass Age/Gender**
: The subject can bypass inputting their age or gender if the test environment is designed for testing a specific age group or gender.
- 06 View/Print/Delete Data**
: This option allows checking, printing or deleting the test result stored in the device as a membership number or mobile number.
- 07 Export Data as Excel**
: This option allows for the copying of the test result saved in the device to InBody USB in Excel file format.
- 08 Data Backup/Restore/Combine**
: This option allows saving the test results to InBody USB for backup or restores the test results backed up to the device. If you are using multiple devices, the data can be merged together.
- 09 Printer Setup**
: This option allows the printer to connect to the device. Connect the printer to the device to print your Result Sheet.
- 10 Result Sheet Types**
: This option allows you to set and select which Result Sheet to print. (Body Composition Result Sheet, Body Water Result Sheet, Evaluation Result Sheet, Research Result Sheet, Comparison Result Sheet, Body Composition Result Sheet for Children)
- 11 Automatic Printing Options**
: This option allows setting the Result Sheet to be printed automatically after completing the test. You can print up to two Result Sheets per type of Result Sheet at one time.
- 12 Paper Types**
: This option allows you to set and select which Result Sheet to print.
- 13 Outputs/Interpretations for Result Sheet**
: This option allows setting the parameters or explanations that appear on the right side of the Body Composition Result Sheet, Body Composition Result Sheet for Children, and Body Water Result Sheet.
- 14 Result Sheet Custom Logo**
: You can preview the logo printed on the upper right of the Result Sheet.
* Please contact Customer Service for help with uploading or modifying a logo.
- 15 Printing Alignment**
: This option allows for the adjustment of the result to be printed on the Result Sheet.
- 16 Internet Options**
: Connect the device to the Internet via Wi-Fi or LAN. Once the device is connected to the Internet, the InBody Test results can be sent to the cloud, or the LookinBody that can be connected remotely.
- 17 Bluetooth**
: This option allows setting up the Bluetooth so that the device can connect to LookinBody, or to other compatible devices such as BSM Stadiometer series, or BPBIO Blood Pressure Monitor series.
* For details on connecting Bluetooth, please refer to '5 Connecting Compatible Device' in this User's Manual.
- 18 Manual/Automatic Weight**
: Select whether to proceed with testing by entering the subject's weight manually or by taking the weight measurement automatically.
- 19 Adjust Weight**
: Adjust measured weight by a fixed value on the device. (Example: Workout clothes at the gym are approximately 0.2 kg; most people are assumed to be wearing workout clothes, so the instructor may adjust the set value to -0.2 kg.)
- 20 Normal Range**
: This option allows setting the normal range of BMI, Percent Body Fat, and Waist-Hip Ratio.
* The ideal value of BMI may also be set.
- 21 N/A**
- 22 Standard Child Growth Curve**
: Set the type of standard child growth curve to use on the Body Composition Result Sheet for children.
- 23 Touchscreen Alignment**
: This option allows for the accuracy of the touch screen to be calibrated.
- 24 Customer Service Information**
: Save the Customer Service contact information. Please refer to the Customer Service information if you have any inquiries regarding the InBody Test, or problems that cannot be resolved through the 'FAQ' menu.
- 25 Auto-Lock**
: This option allows setting the time before the screen is locked and the corresponding password to restrict using the device.
- 26 Etc., Function Setup**
: Set whether to use the fingerprint recognition function or the InBodyBAND recognition function.

FAQ

Refer to additional information on how to use the InBody. Refer to FAQ checklist when there are problems that occur while using the device.

01 Customer Service Information

: Refer to the customer service contact information in '24 Customer Service Information' Please contact the customer service if your problem cannot be resolved through the FAQ or if you need further inquiries regarding the InBody Test.

02 Result sheet does not print.

: View the FAQ checklist when the Result Sheet does not print.

03 Weight is not being measured.

: View the FAQ checklist when weight is not being measured.

04 Weight measurement seems to be inaccurate.

: View the FAQ checklist when the weight measurement seems to be inaccurate.

05 The InBody Test has stopped.

: View the FAQ checklist when the InBody Test has stopped.

06 Test results seem to be inaccurate.

: View the FAQ checklist when the test results seem to be inaccurate.

4.2 IT Security Measures

InBody would like to clarify that the user access to the InBody is only granted for the authorized users, who have appropriately registered the password in the system setting menu of InBody. The steps for registering access password, which restrict access to authorized users, are illustrated below.



5 Connecting Compatible Device

To connect a compatible device to the device, check the communication method of the compatible device.

There are two ways of communication; wired connection such as USB or RS232C (9-pin serial terminal, Female), and wireless connection (Bluetooth).

5.1 Printer

The Result Sheet can be printed if the printer is connected to the device.

- 1 Turn off the device.
 - * When the device is already turned on, the printer might not properly connect.
- 2 Connect the USB cable supplied with the printer to the USB HOST printer terminal on the rear of the device. Connect the other end of the USB cable to the printer's USB connection terminal.
- 3 You can set the options related to printing from '10 Result Sheet Types' to '15 Printing Alignment' in Setup in the Administrator.

5.2 Stadiometer

The height values measured by the stadiometer are sent to the device when it is connected to the device.

* Make sure to connect only BSM Stadiometer series provided by InBody.

- 1 Turn off the device.
 - * When the device is already turned on, the stadiometer might not properly connect.
- 2 Connect the serial cable supplied with the stadiometer to the stadiometer 9-pin the serial terminal on the rear of the device. Connect the other end of the cable to the serial terminal of the stadiometer.
- 3 Turn on the stadiometer.
- 4 Turn on the device. When the stadiometer is connected, () icon will be displayed in the upper left of the test standby screen.

5.3 Blood Pressure Monitor

The blood pressure values measured by the blood pressure monitor are sent to the device when it is connected to the device.

* Make sure to connect only the BPBIO Blood Pressure Monitor series provided by InBody.
* If you select the type of Result Sheet at '13 Outputs/ Interpretations for Result Sheet' in Setup in the Administrator Menu and then select blood pressure in the sub-options, then you can print the blood pressure value on the InBody Result Sheet.

- 1 Turn off the device.
 - * When the device is already turned on, the blood pressure monitor might not properly connect.
- 2 Connect the serial cable supplied with the blood pressure monitor to the Blood Pressure Monitor 9-pin serial terminal on the rear of the device. Connect the other end of the cable to the serial terminal of the blood pressure monitor.
- 3 Turn on the blood pressure monitor.
- 4 Turn on the device. When the blood pressure monitor is connected, () icon will be displayed in the upper left of the test standby screen.

5.4 Barcode Reader

The ID will be inputted automatically if a barcode reader is connected to the device.

* If the barcode reader is not recognized, please contact InBody Customer Service.

- 1 Turn off InBody device.
 - * When the device is already turned on, the barcode reader might not properly connect.
- 2 Connect the USB cable of the barcode reader to the USB HOST port on the rear of the device.
- 3 Turn on the device. When the barcode reader is connected, () icon will be displayed in the upper left of the test standby screen.

5.5 LookinBody

By connecting LookinBody to the device, you can manage your InBody data.

* If LookinBody is not recognized, please contact InBody Customer Service.

- 1 Turn off the device.
 - * When InBody device is already turned on, LookinBody might not properly connect.
- 2 If the PC has a serial port, connect the serial cable provided with LookinBody to the PC 9-pin serial terminal on the rear of the device, and connect the other end of the serial cable to your PC.

If there is no serial port on your PC, you can connect a normal USB-AB type cable to the USB SLAVE port on the rear of InBody device instead, and connect the other end of the USB cable to the USB port of the PC.

- 3 Turn on the device. Then launch LookinBody installed on your PC and follow its instructions to connect to the device.



Caution

- When you are connecting the cable to the device, be careful not to move or pull the device. It may cause a weight measurement error.
- Avoid laying cables connecting to compatible devices where people frequently pass. This may cause individuals to trip over or become injured.
- Do not connect compatible devices that are not specified provided by InBody to the InBody. Otherwise, it may cause malfunction.

5.6 Connecting Bluetooth

Requirements

- The compatible device to be connected must support Bluetooth.
- Bluetooth may not operate normally if the compatible device is more than 10m away from the InBody device.
- There should be no obstacles such as walls between the InBody device and the compatible device.

Connecting Stadiometer/Blood Pressure Monitor/InGrip

- 1 Press the [Administrator Menu] on the test standby screen.
- 2 Enter the password to enter the Administrator Menu.
- 3 Go to the '17 Bluetooth' in Setup.
- 4 If "0" is selected on 'Connect via Bluetooth?', you can select 'LookinBody' or 'Compatible device'. Then, please select the 'Compatible device' for device connection.
 - * If LookinBody and the device are connected via Bluetooth, selecting a compatible device will disconnect them.



- 5 Turn on one of the InBody recommended compatible device and check the device name and serial number on the nameplate attached to the compatible device.

- 6 Choose the compatible device to be connected and then press [Next].



- 7 The compatible device's Bluetooth ID consists of 'Device Name-Serial Number', and select the Bluetooth ID of the device to be paired and press [Connect].

* If the Bluetooth ID does not appear or the connection is not good, please contact InBody Customer Service.

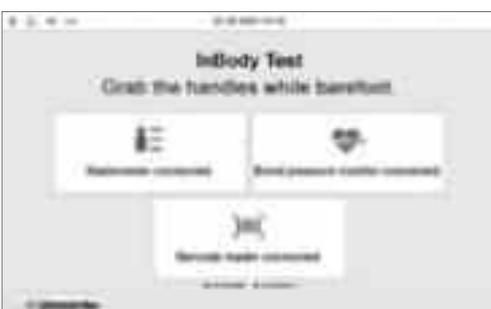


- 8 If the compatible device is paired properly, the Bluetooth ID of the device connected to the device will appear as shown below.



- 9 Press [Exit] to return to the test standby screen, and the Bluetooth icon and the corresponding device icon will be displayed on the upper left corner screen.

* The screen below shows that the device was connected with stadiometer, blood pressure monitor, and barcode reader (USB).



5.7 Connecting Internet

Once the device is connected to the Internet, you can use it to connect to the Cloud Services or LookinBody Web.

* If the Cloud Service does not work or if LookinBody Web is not recognized, please contact InBody Customer Service.

Connecting LAN

- 1 Press the [Administrator Menu] on the test standby screen.
- 2 Enter the password to enter the Administrator Menu.
- 3 Go to '16 Internet Options' in Setup.
- 4 Press LAN and then press [Next].
 - * You may need to enter the IP address or DNS address manually depending on the service area. In this case, press the corresponding button to use.



- 5 Connect the LAN cable to () shape port on the rear of the device.

* LAN cable should be connected to a device terminal with internet service or to a connector on the wall.



- 6 You can connect to LookinBody Web or use the Cloud Service through LAN after completing an internet connection.



Connecting Compatible Device

Connecting Wi-Fi

- 1 Press the [Administrator Menu] on the test standby screen.
- 2 Enter the password to enter the Administrator Menu.
- 3 Go to '16 Internet Options' in Setup.
- 4 Press Wi-Fi and press [Next].
 - * Depending on the service area, you may need to enter the IP address or DNS address manually.



- 5 Select the Wi-Fi network to connect to.



- 6 Enter the Wi-Fi password if needed.



- 7 You can connect to LookinBody Web or use the Cloud Service through Wi-Fi after completing internet connection.



6 InBody Test

6.1 Precautions for Test

Warning

- Individuals with medical implant devices such as pacemakers, or essential support devices such as patient monitoring systems, must not use these devices. Safe, micro alternative currents will flow through the body during the test, which may cause malfunctioning of the device or endanger lives.
- Children or people with restricted mobility should be tested with the help of an instructor or assistant.
- Do not jump on the footplate. This may cause a serious injury.
- If you have an infectious disease or an open cut, do not touch or use the device.
- The Bioelectrical Impedance Analysis (BIA) method does not harm the human body because it uses micro alternative currents. However, if you are pregnant, please consult your doctor or specialist.
- Use caution when stepping on and off of the device. Serious injuries can occur.
- Please be careful not to get your foot stuck or tripped on the step when getting on the product. Serious injuries can occur.

Caution

- Test after using the bathroom. Food in your stomach affects your weight and is considered part of the body composition, which may affect your results.
- Do not eat before testing. In cases where the examinee has already eaten, the test should be put off for at least two hours after the meal. This is because food mass is included in the examinee's weight and thus, may result in measurement errors.
- Test before exercising. Even light exercise can temporarily change body composition.
- Avoid using the sauna or bath before measuring.
- Stand upright for about 5 minutes before testing. Taking the test immediately after lying in bed or sitting for a long period of time might result in a slight change in the test results. This is because body water tends to move to the lower body as soon as the person stands or gets up.
- Make sure that no conductive objects such as steel structures touch your body while measuring.
- Measure at room temperature (20 °C - 25 °C). The human body remains stable at room temperature, but the body composition may change temporarily in cold or hot conditions.
- Avoid contact with the examinee during testing. Contact may lead to interference affecting test results
- Test in the morning if possible. In the afternoon, body water tends to be driven to your lower body, which can affect your test results.
- If your palms and soles of your feet are dry or if you have a lot of dead skin cells, the test may not work well due to poor electrical contact between the electrode and the body. Wipe your palms and soles of your feet with an InBody Tissue (wet tissue) before measuring.
- When stepping onto or off of the device, do not grab or shove the device. Serious injuries to you or damage to the device can occur.

6.2 Test Instructions

The screen changes during the test depending on the setting in '02 Self Mode/Professional Mode' in the Administrator Menu.

- Professional Mode: The screen is configured for testing with an instructor. (Measurement information is managed by user ID).
- Self Mode: The screen is configured for testing alone. (Measurement information is managed by phone number).

- 1 Step up onto the footplate with barefoot.



- 2 The device starts weight measurement.

- * Make sure that the subject stands alone on the device. It may affect the weight measurement when other people lean or touch the device.



3 Connecting InBodyBAND.

- * If InBodyBAND is connected with iOS, turn off the Bluetooth setting and use it.
- * The InBodyBAND firmware version must be "V038N" or later and include "N" at the end of the version name in order to support the interconnection function. (To check the version of InBodyBAND, select 'More' and then select 'Preferences' - 'Device Settings' in the mobile app.)
- * Self Mode: The screen is configured for testing alone. (Measurement information is managed by phone number).
- * Starting provided by InBodyBAND, a recognition function is provided.



4 Personal information is received from the InBodyBAND and displayed on the screen automatically. The last three digits of the mobile number are censored with an asterisk(*).



5 When pressing [Exit] or if InBodyBAND is not recognized, the device checks your fingerprint.



6 If your fingerprint is recognized, the personal information will be automatically displayed on the screen, as shown below.

- * If fingerprint is placed differently from when it was initially registered, personal information may not load properly. For details, please refer to '8.1 Regarding the Device' in '8 Frequently Asked Questions (FAQ)'.



7 If you press [Exit] on the fingerprint identification screen, you may enter your customer information (ID or mobile number).

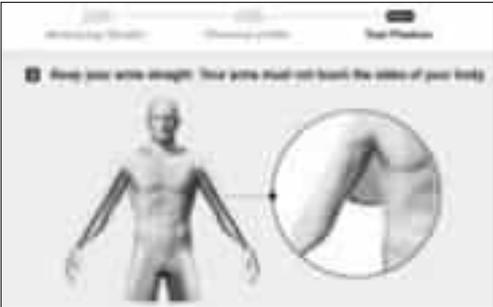
- * For Professional Mode, enter your ID.
- * For Self Mode, enter your mobile number.



8 If you do not want to enter your ID or mobile number, you can press [Guest Test] or [Skip] and enter only your height, age, and gender to perform the test.



9 Maintain proper posture to take the test.
 * For proper test posture, refer to '6.3 Test Posture'.
 * When the hand and foot electrode is recognized, the InBody Test begins automatically.



10 InBody Test begins.
 * It will take 90 seconds to complete the test.



11 The result screen is displayed after completing the test. If a printer is connected to the device, you can check the result according to the selected type of Result Sheet.
 * Please refer to the '4 Setting' in the Administrator Menu for details of printer and Result Sheet setting.

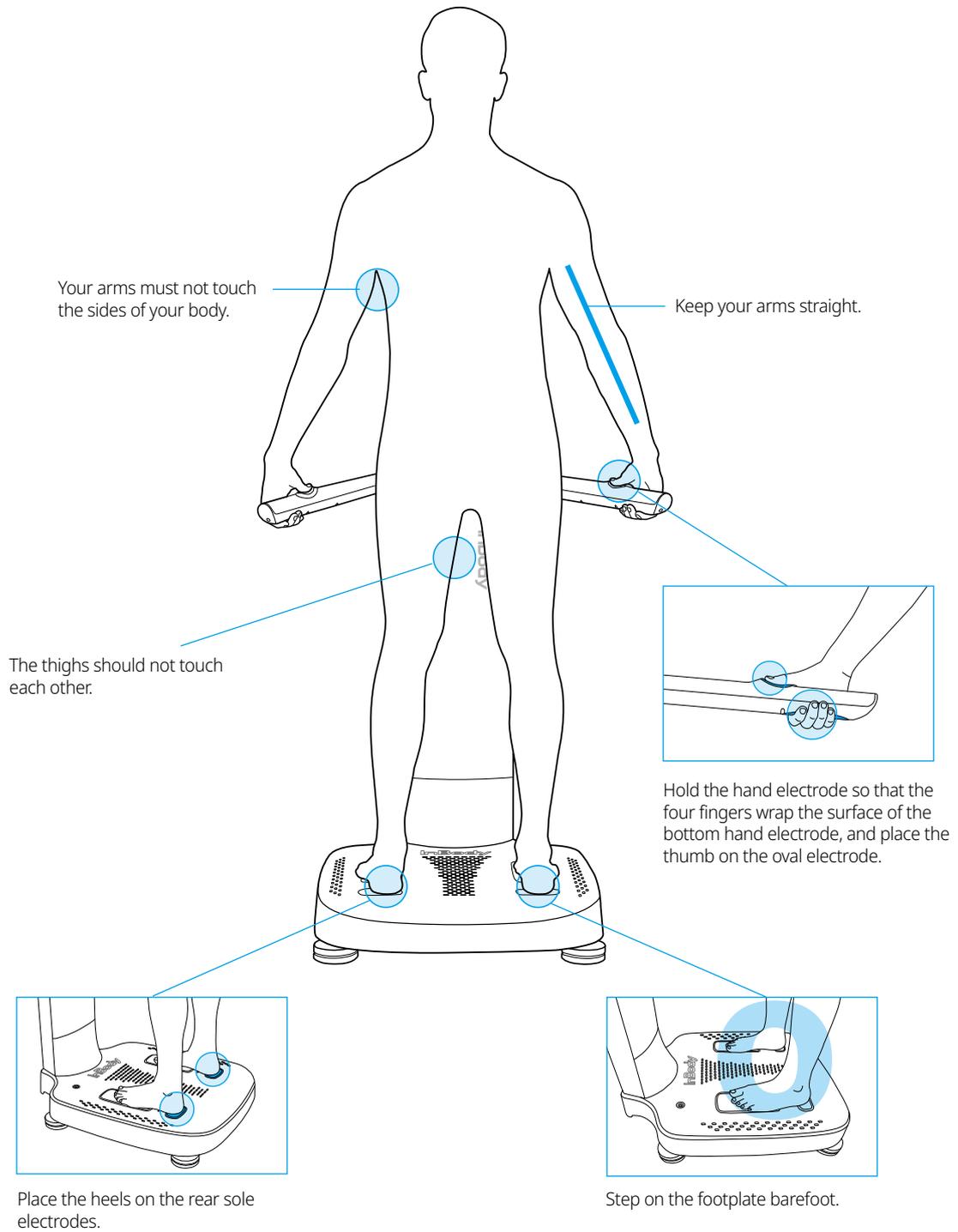


12 Press [Exit] to end the measurement.



6.3 Test Posture

The subject must maintain proper posture to have accurate test results.



7 Maintenance and Storage

7.1 Precautions for Maintenance



Caution

- Do not place any objects on the footplate.
- Do not let children jump on the footplate, as they might fall and get injured.
- Do not apply excessive force on the device.
- Be careful not to get your fingers caught in the shoulder joint when moving the handle.
- Do not bend the handles of the hand electrodes or rotate them in the reverse direction beyond its limitation.
- Do not extend the handles of the hand electrodes beyond its limitation.
- Be careful not to get foreign materials on the bottom of the device. It may cause weight measurement errors.
- Be careful not to get injured by getting your feet caught in the bottom of the device.
- Turn off the device if you are not using it for a day or longer.
- Do not allow any liquid substances to contact the device directly. Keep food and drinks away from the device. Substances getting inside the device can cause critical damage to the electronic components.
- Clean the exterior of the device gently with a lint-free cloth once a week. Be especially careful not to scratch the LCD screen while cleaning the device.
- The device does not need regular maintenance. If some problems occur while operating the device, get in touch with the store where you purchased it or A/S manager. We do not take the responsibility about problems caused by any arbitrary repairs.

7.2 Cleaning

Use the alcohol-based disinfectant (e.g., 70 % ethanol) for 1 minute to clean the surfaces of the device.

7.3 Disinfecting

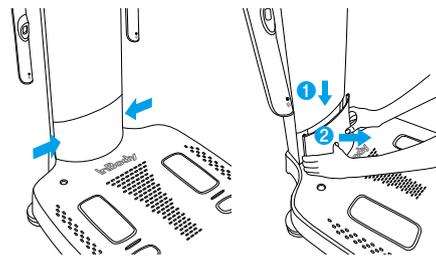
- 1 Use the alcohol-based disinfectant (e.g., 70 % ethanol).
- 2 Follow the instructions on the disinfectant.
- 3 Disinfect the device: Comply with the intervals specified in the table below.

Interval	Component
Before every measurement	Hand electrodes and Foot electrodes
After every measurement	Hand electrodes and Foot electrodes

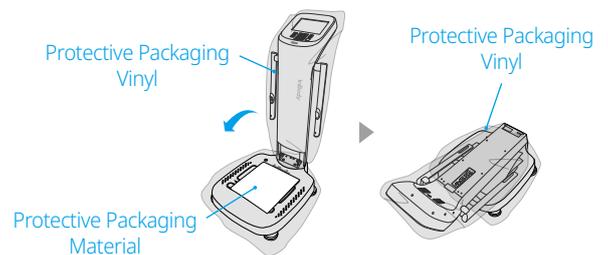
7.4 Repacking and Transportation

Once the device is installed, avoid transporting the device. If it must be transported, repack it in the following sequence.

- 1 Turn off the the device.
- 2 Remove all connected adapters, cables, and the hinge cover. Press both gaps of the hinge cover and press it slightly in the vertical direction and pull it in the arrow direction.

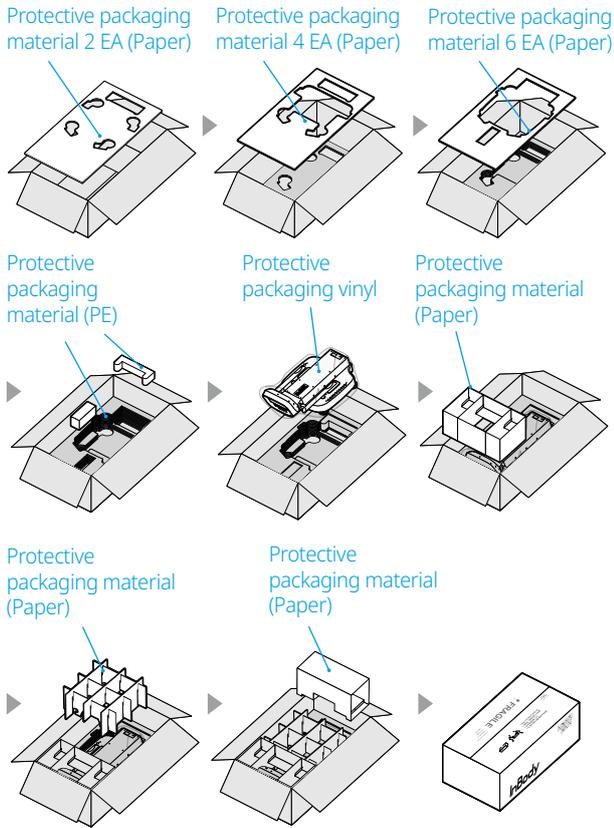


- 3 Wrap the InBody with protective plastic vinyl. Cover the foot electrodes with protective packaging and fold the top as shown below.



Maintenance and Storage

- 4 Place the device into the box as shown in the sequence below. Put the protective packaging material (paper) as shown in the figure and seal it. After sealing it, transport it only by holding the handle.



Caution

- When repacking the device, the protective packaging materials provided by InBody must be used.



Caution

To transport the device safely, two people should keep the device in a horizontal position.



7.5 Storage Environment

The device should be transported or stored under the following conditions.

Temperature Range	-20 ~ 70 °C (-4 ~ 158 °F)
Relative Humidity	10 ~ 80 % RH (No Condensation)
Atmospheric Pressure	50 ~ 106 kPa

8 Frequently Asked Questions (FAQ)

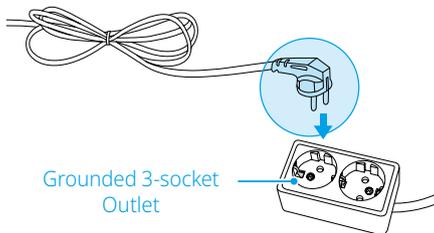
This section includes frequently asked questions and answers for the device. If a problem persists even after checking below, please contact the Customer Service. For contact information, please check '24 Customer Service Information' at 'FAQ' in the Administrator Menu of the device.

8.1 Regarding the Device

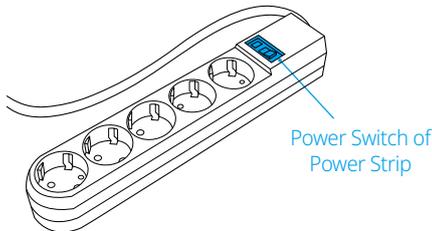
If a problem arises with the device, you may first attempt to check the 'FAQ' in the Administrator Menu. The device can help you diagnose and solve some problems. If your problem cannot be resolved through the 'FAQ', please refer to the possible solutions below.

Question: Power does not turn on.

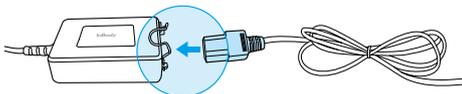
- Answer:**
- Insert the power plug completely into a grounded 3-socket outlet.



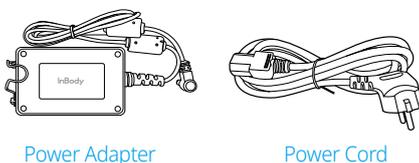
- When using a power strip, the power will not turn on when the power switch of the power strip is turned off. Check the power strip with the power cable connected.



- The problem may occur if the power cord is not completely plugged into the adapter. Insert the power cord completely into the adapter.



- The problem may occur if you are using the power adapter that is not provided by InBody. Always connect a power adapter (DC 12 V, 5.0 A/3.34 A) provided by InBody.



Question: The touch screen does not work well.

- Answer:**
- Calibrate the touchscreen under Settings of the Administrator Menu '23 Touchscreen Alignment'.
 - * Press firmly to optimize touchscreen response.

Question: How to connect with the compatible devices.

- Answer:**
- Please refer to '5 Connecting Compatible Device' in this User's Manual.

Question: InBodyBAND is not recognized.

- Answer:**
- Check whether other people's InBodyBAND are near the hand electrodes.
 - If there are too many Bluetooth devices around, the connection may delay.
 - If InBodyBAND is not properly connected, turn off or deactivate unused Bluetooth devices to improve the recognition rate.

Question: Fingerprint recognition does not work well.

- Answer:**
- Fingerprint recognition may not work well if the subjects' finger prints are worn out due to their working conditions/environment.
 - If the fingerprint is not recognized, place the fingerprint to the same location where it was originally registered, or update the fingerprint information with a new one.

8.2 Regarding Serious Incidents

If you are aware of a serious incident involving your device, you must report it as quickly as possible to both the manufacturer and the competent authority of the Member State where the user and/or patient is located.

The deadlines for reporting serious incidents according to MDR (EU) 2017/745 are as follows (MDR stands for Medical Device Regulation):

Question: What should I do when a serious incident occurs with the device?

Answer: You must report a serious incident before taking corrective action to eliminate the risk, except in emergencies. In such cases, you must immediately implement a field safety corrective action.

- Report within 15 calendar days after being informed of a serious incident.
- Report within 2 calendar days after being informed of a serious incident that poses a serious threat to public health.
- Report within 10 calendar days after being informed of a serious incident that has resulted in death or a serious deterioration in someone's state of health.

8.3 Regarding the InBody Test

The questions and answers regarding the InBody Test are as follows.

Question: Do I have to remove my socks or stockings?

Answer: If the test is carried out while wearing socks or stockings, the current will not flow smoothly, and the test may not be performed correctly. The skin must be in direct contact with the electrode for testing.

Question: Is it OK to test, wearing accessories or metallic materials?

Answer: If accessories or metallic objects do not touch the electrodes, they will not have a significant effect on the test result. However, it is not recommended to wear it for accurate test results.

Question: Are there any cases where I should not take the InBody Test?

Answer:

- A person who is equipped with a medical device that is essential for life support, such as pacemakers or patient monitoring device, must not take the InBody Test. Electronic medical devices may malfunction due to the current flowing through the human body during the test.

Question: Can a person with metal implants in the body take the InBody Test?

Answer:

- A person who has a metallic material inserted in the body may have different conductivity that may affect the results of the test.

Question: I have limited mobility and cannot maintain proper posture for the InBody Test. How can I still be tested?

Answer: The test is available, but the test result may be inaccurate due to poor contacting to the electrode surface. InBody has a line of devices that conduct body composition analysis in lying posture that allow the patients to stay in bed. For more information, please contact InBody.

Question: Is the current flowing in the test harmless to the human body?

Answer: The InBody does not harm the human body because it uses micro alternative electric current. The safety of the InBody has been proven and is being used by many medical institutions because the InBody has already obtained the national and European medical certificate.

Question: How often should I take the InBody Test?

Answer:

- Testing every other week or once a month can effectively track InBody Test results for exercise prescriptions, hormonal prescriptions, obesity, and rehabilitation.
- It's good to check up often, but it's also important to keep track of your body's changes over time through steady tests.
- Body composition changes can be seen on the InBody result screen and the InBody Result Sheet.
- It's good to have regular check-ups, but it's also important to monitor changes in your body composition over time.

Question: What are the precautionary steps to ensure accuracy of the InBody Test?

Answer: Please refer to '6.1 Precautions for Test' in section '6 InBody Test' in this User's Manual.

8.4 Residual Risks and Undesirable Side Effects

Undesirable side effects have been identified as general allergies that may be associated with skin contact with the metal surface during the clinical use of the InBody. As part of a comprehensive risk management protocol, the stainless steel that comes into contact with the patient has been evaluated according to ISO-10993 biocompatibility testing standards, focusing on skin sensitization testing, and has received favorable biocompatibility test results. Additionally, the following contraindication statement has been added to this manual: Individuals with known metal allergies to stainless steel shall not use the device.

9 Classifications and Specifications

9.1 Classifications

Classifications	Body Composition Analyzer of Direct Segmental Multi-frequency Bioelectrical Impedance Analysis Method	
	Type of Protection against Electric Shock	Class I
	Type of the Applied Parts	BF Type
	EMC Emission	Class B
	Degree of Protection against Water Infiltration	IPX0

9.2 Specifications

Bioelectrical Impedance Analysis (BIA) Items	Bioelectrical Impedance (Z)	30 Impedance Measurements by Using 6 Different Frequencies (5 kHz, 50 kHz, 250 kHz, 500 kHz, 1 MHz, 3 MHz) at Each of the 5 segments (Right Arm, Left Arm, Trunk, Right Leg, and Left Leg)
	Phase Angle (\emptyset)	15 Phase Angle Measurement by Using 3 Different Frequencies (5 kHz, 50 kHz, 250 kHz) at Each of 5 Segments (Right Arm, Left Arm, Trunk, Right Leg, and Left Leg)
	Z_0, Z_{∞}	At zero frequency, current does not pass through the cell membrane, so the impedance at zero frequency can be considered to reflect extracellular water, and at infinite frequency, the current can be seen to reflect both intracellular and extracellular water.
Electrode Method	Tetrapolar 8-Point Tactile Electrodes	
Measurement Method	Direct Segmental Multi-Frequency Bioelectrical Impedance Analysis (DSM-BIA) Simultaneous Multi-Frequency Bioelectrical Impedance Analysis (SMF-BIA)	
Body Composition Calculation	No Empirical Estimation (Age and Gender does not affect the result)	

Outputs (Body Composition Result Sheet)	Result Parameters and Result Interpretation
<ul style="list-style-type: none"> • Body Composition Analysis (Total Body Water, Protein, Mineral, Body Fat Mass, Weight) • Muscle-Fat Analysis (Weight, Skeletal Muscle Mass, Body Fat Mass) • Obesity Analysis (Body Mass Index, Percent Body Fat) • Segmental Lean Analysis • ECW Ratio Analysis (ECW Ratio) • Body Composition History (Weight, Skeletal Muscle Mass, Percent Body Fat, ECW Ratio) • InBody Score • Whole Body Phase Angle (History) • SMI (History) • Visceral Fat Area (Graph) • Body Type (Graph) • Weight Control (Target Weight, Weight Control, Fat Control, Muscle Control) • Nutrition Evaluation (Protein, Minerals, Body Fat) • Obesity Evaluation (BMI, Percent Body Fat) • Body Balance Evaluation (Upper, Lower, Upper-Lower) • Segmental Fat Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Body Water Composition (Total Body Water, Intracellular Water, Extracellular Water) • Segmental Body Water Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Segmental ICW Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Segmental ECW Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Body Composition Analysis • Muscle-Fat Analysis • Obesity Analysis (BMI, PBF) • Segmental Circumference (Neck, Chest, Abdomen, Hip, Right Arm, Left Arm, Right Thigh, Left Thigh) • Waist-Hip Ratio (Graph) • Visceral Fat Level (Graph) • Research Parameters (Intracellular Water, Extracellular Water, Skeletal Muscle Mass, Fat Free Mass, Basal Metabolic Rate, Waist-Hip Ratio, Waist Circumference, Visceral Fat Level, Visceral Fat Area, Obesity Degree, Body Cell Mass, Arm Circumference, Arm Muscle Circumference, TBW/FFM, FFMI, FMI, SMI, SMM/WT, ECM/BCM, TBW/WT, Recommended calorie intake per day) • Calorie Expenditure of Exercise • Sarcopenia Parameters (SMI, HGS) • Blood Pressure (Systolic, Diastolic, Pulse, Mean Artery Pressure, Pulse, Rate Pressure Device) • QR code • Result Interpretation QR code • Whole Body Phase Angle (50 kHz: the right side of the body) • Segmental Phase Angle (5 kHz, 50 kHz, 250 kHz: Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • BIVA (Bioelectrical Impedance Vector Analysis) • Impedance (Z_0, Z_{∞}) • Impedance Graph (Each segment and each frequency) 	

Outputs (Body Composition Result Sheet for Children)	<p>Result Parameters and Result Interpretation</p> <ul style="list-style-type: none"> • Body Composition Analysis (Total Body Water, Protein, Mineral, Body Fat Mass, Fat Free Mass, Weight) • Muscle-Fat Analysis (Weight, Skeletal Muscle Mass, Body Fat Mass) • Obesity Analysis (Body Mass Index, Percent Body Fat) • Growth Graph (Height, Weight, BMI) • Body Composition History (Height, Weight, Skeletal Muscle Mass, Percent Body Fat) • Whole Body Phase Angle (History) • SMI (History) • Growth Score • Weight Control (Target Weight, Weight Control, Fat Control, Muscle Control) • Nutrition Evaluation (Protein, Minerals, Fat Mass) • Obesity Evaluation (BMI, Percent Body Fat) • Body Balance Evaluation (Upper, Lower, Upper-Lower) • Segmental Lean Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Segmental Body Water Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Research Parameters (Intracellular Water, Extracellular Water, Skeletal Muscle Mass, Fat Free Mass, Basal Metabolic Rate, Child Obesity Degree, Bone Mineral Content, Body Cell Mass, FFMI, FMI, SMI, SMM/WT, ECM/BCM, TBW/WT) • Sarcopenia Parameters (SMI, HGS) • Blood Pressure (Systolic, Diastolic, Pulse, Mean Artery Pressure, Pulse, Rate Pressure Device) • QR code • Result Interpretation QR code • Whole Body Phase Angle (50 kHz) • Segmental Phase Angle (5 kHz, 50 kHz, 250 kHz: Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Impedance Graph (Each segment and each frequency)
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Outputs (Body Water Result Sheet)	<p>Results and Interpretations</p> <ul style="list-style-type: none"> • Body Water Composition (Total Body Water, Intracellular Water, Extracellular Water) • ECW Ratio Analysis (ECW Ratio) • Segmental Body Water Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Segmental ECW Ratio Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Body Water Composition History (Weight, Total Body Water, Intracellular Water, Extracellular Water, ECW Ratio) • InBody Score • Whole Body Phase Angle (History) • SMI (History) • Visceral Fat Area (Graph) • Body Type (Graph) • Weight Control • Nutrition Evaluation • Obesity Evaluation (BMI, Percent Body Fat) • Body Balance Evaluation
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- Segmental Fat Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg)
- Body Water Composition (Total Body Water, Intracellular Water, Extracellular Water)
- Segmental Body Water Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg)
- Segmental ICW Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg)
- Segmental ECW Analysis (Right Arm, Left Arm, Trunk, Right Leg, Left Leg)
- Body Composition Analysis (Protein, Minerals, Body Fat Mass, Soft Lean Mass, Bone Mineral Content)
- Muscle-Fat Analysis (Weight, Skeletal Muscle Mass, Soft Lean Mass, Body Fat Mass)
- Obesity Analysis (Body Mass Index, Percent Body Fat)
- Segmental Circumference (Neck, Chest, Abdomen, Hip, Right Arm, Left Arm, Right Thigh, Left Thigh)
- Waist-Hip Ratio (Graph)
- Visceral Fat Level (Graph)
- Research Parameters (Intracellular Water, Extracellular Water, Skeletal Muscle Mass, Fat Free Mass, Basal Metabolic Rate, Waist-Hip Ratio, Waist Circumference, Visceral Fat Level, Visceral Fat Area, Obesity Degree, Bone Mineral Content, Body Cell Mass, Arm Circumference, Arm Muscle Circumference, TBW/FFM, FFMI, FMI, SMI, SMM/WT, ECM/BCM, TBW/WT, Adjusted FFM, Adjusted SMI, Recommended calorie intake per day)
- Calorie Expenditure of Exercise
- Sarcopenia Parameters (SMI, HGS)
- Blood Pressure (Systolic, Diastolic, Pulse, Mean Artery Pressure, Pulse, Rate Pressure Device)
- QR code
- Result Interpretation QR code
- Whole Body Phase Angle (50 kHz)
- Segmental Phase Angle (5 kHz, 50 kHz, 250 kHz: Right Arm, Left Arm, Trunk, Right Leg, Left Leg)
- BIVA (Bioelectrical Impedance Vector Analysis)
- Impedance (Z_0 , Z_{∞})
- Impedance (Each segment and each frequency)

Classifications and Specifications

Outputs (Research Result Sheet)	<ul style="list-style-type: none"> • Body Composition Summary (Fat Free Mass, Fat Mass, Intracellular Water, Extracellular Water, Total Body Water, ECW/TBW: Whole Body, Right Arm, Left Arm, Trunk, Right Leg, Left Leg, Whole Body Weight) • Body Composition Analysis (Lean Mass, ICW, ECW, Fat Mass, ECW/TBW): Whole Body, Right Arm, Left Arm, Trunk, Right Leg, Left Leg • Research Parameters (BMI, Percent Body Fat, Skeletal Muscle Mass, Soft Lean Mass, Protein, Minerals, Bone Mineral Content, Basal Metabolic Rate, Waist-Hip Ratio, Waist Circumference, Visceral Fat Area, Obesity Degree, Body Cell Mass, Arm Circumference, Arm Muscle Circumference, TBW/FFM, FFMI, FMI, SMI) • Whole Body Phase Angle (50 kHz) • Segmental Phase Angle (5 kHz, 50 kHz, 250 kHz: Right Arm, Left Arm, Trunk, Right Leg, Left Leg) • Impedance Graph (Each segment and each frequency) 	Outputs (Evaluation Result Sheet)	<ul style="list-style-type: none"> • Bioelectrical Impedance Vector Analysis (BIVA) • Whole Body Phase Angle_50 kHz (PhA, \emptyset) (M \pm SD, Percentile Graph) • Segmental Phase Angle_50 kHz (PhA, \emptyset) Balance • Whole Body ECW Ratio (ECW/TBW) (M \pm SD, Percentile Graph) • ECW Ratio (ECW/TBW) Balance • TBW/WT(%) (M \pm SD, Percentile Graph) • Percent Body Fat (PBF, %) (M \pm SD, Percentile Graph) • Skeletal Muscle Mass and ECW Ratio (SMM, % & ECW/TBW) • Skeletal Muscle mass Index and ECW Ratio (SMI, kg/m² & ECW/TBW) • Skeletal Muscle mass Index (SMI, kg/m²) (M \pm SD, Percentile Graph) • Fat Free Mass Index (FFMI, kg/m²) (M \pm SD, Percentile Graph) • Lean Mass (LM) Balance • Fat Mass Index (FMI, kg/m²) (M \pm SD, Percentile Graph) • Skeletal Muscle Mass divided by WT (SMM/WT, %) (M \pm SD, Percentile Graph) • Visceral Fat Area (VFA, cm²) (M \pm SD, Percentile Graph) • Waist Hip Ratio (WHR) (M \pm SD, Percentile Graph) • Weight (kg) (M \pm SD, Percentile Graph) • Body Mass Index (BMI, kg/m²) (M \pm SD, Percentile Graph) • Body Cell Mass (BCM, kg) (M \pm SD, Percentile Graph) • ECM/BCM (M \pm SD, Percentile Graph) • Outer Circumference (cm)
Outputs (Comparison Result Sheet)	<ul style="list-style-type: none"> • Weight, Skeletal Muscle Mass, Body Fat Mass, ECW Ratio, Phase Angle: Whole Body (Today, Recent, Difference) • Lean Mass, ECW Ratio, Phase Angle: Right Arm, Left Arm, Trunk, Right Leg, Left Leg (Today, Recent, Difference) • Cole-Cole Plot (Standard median curve, Today's Results, Previous Results) 		

* Blood pressure information can only be printed when the blood pressure monitor is connected.

Functional Specifications

Compatible Device	Stadiometer, Blood pressure monitor, InBodyBAND Series (starting provided by InBodyBAND), and InGrip provided by InBody
Logo Display	Name, Address and Content Information can be shown on the Result Sheet
Digital Results	LCD Screen, LookinBody Web, LookinBody
Types of Result Sheets	Body Composition Result Sheet, InBody Result Sheet for Children, Body Water Result Sheet, Evaluation Result Sheet, Research Result Sheet, Comparison Result Sheet, Body Composition Result Sheet for Children
Voice Guidance	Audible guidance for test in progress and test complete
Data Storage	Saves up to 100,000 measurements (when the ID is entered)
Administrator Menu	Setup: Configure settings and manage data. FAQ: Additional information to help with using the InBody.
USB Thumb Drive	Copy, backup, or restore the LookinBody test data (data can be viewed on Excel or LookinBody)
Barcode Reader	Member ID will be automatically inputted when the Barcode is scanned
InBodyBAND Series Recognition Function	Recognizes the InBodyBAND series of the subject and automatically inputs personal information to the InBody (starting provided by InBodyBAND)
Fingerprint Recognition Function	Recognizes the fingerprint of the measurer and automatically inputs personal information to the InBody
Backup Data	Backup data saved in InBody by using an InBody USB
QR code	By scanning QR codes, you can send and verify the InBody results.

* QR code is registered trademark of DENSO WAVE INCORPORATED.

Other Specifications

Applied Rating Current	300 μ A (\pm 30 μ A)	
Adapter	DELTA	Power Input AC 100 - 240 V, 50 - 60 Hz, 1.5 A - 0.75 A
		Power Output DC 12 V \equiv , 5.0 A
Adapter	Mean Well	Power Input AC 100 - 240 V, 50 / 60 Hz, 1.0 A - 0.5 A
		Power Output DC 12V \equiv , 3.34 A
Display Type	1280 \times 800 10.1 inch Color TFT LCD	
Internal Interface	Touchscreen, Keypad	
External Interface	RS-232C 4 EA, USB Host 2 EA, USB Slave 1 EA, LAN (10/100 T) 1 EA, Bluetooth 1 EA, Wi-Fi (2.4 G/5 G) 1 EA	
Compatible Printer	Laser/Inkjet PCL 3 or above and SPL	
Dimensions	614.1 (W) \times 963.8 (L) \times 1239.3 (H): mm 24.2 (W) \times 37.9 (L) \times 48.8 (H): in	
Device Weight	41.1 kg (90.6 lb)	
Test Duration	About 30 seconds	
Operation Environment	10 - 40 $^{\circ}$ C (50 - 104 $^{\circ}$ F), 30 - 75 % RH, 70 - 106 kPa	
Storage Environment	-20 - 70 $^{\circ}$ C (-4 - 158 $^{\circ}$ F), 10 - 95 % RH, 50 - 106 kPa (No condensation)	
Weight Range	2 - 300 kg (4.4 - 661.4 lb)	
Age Range	3+ years	
Height Range	95 - 220 cm (3 ft 1.40 in - 7 ft 2.61 in)	

* Specifications are subject to change without prior notice.

* This device is a medical device. Please read the WARNINGS and PRECAUTIONS before you use it.

9.3 Symbols Used on the Device

Indicators

	9-pin Serial Port (Female, RS-232C)
	LAN Port (10/100T Base)
	USB Port

Safety Symbols

	High Voltage
	Warning, Caution
	BF Type Device
	Adapter
	Power On
	Power Off

Etc., Symbols

	Manufacturer
	Authorized Representative in the European Community
	Catalogue Number
	Serial Number
	Direct Current
	Unique Device Identification
	Do Not Disassemble, Adjust, or Repair the Product Arbitrarily



Disposal of old Electrical & Electronic Devices (Application in the European Union and other European countries with separate collection system.) This symbol indicates that this device shall not be treated as household waste. Instead, it shall be handed over to the applicable collection point for the recycling of electrical and electronic devices. By ensuring this device is disposed of correctly, you will help prevent potential negative consequences for the environment and human health, which could otherwise be caused by inappropriate waste handling of this device. For more detailed information about recycling this device, please refer to local governing ordinances and recycling plans.

9.4 Guidance and Manufacturer's Declaration

The InBody device is intended for use in the electromagnetic environment specified below. The customer or the user of the InBody device should ensure that it is used in such an environment.

Electromagnetic Emissions

Emissions Test	Compliance	Electromagnetic Environment
RF emissions CISPR 11	Group 1	The InBody device uses RF energy only for its internal function. Therefore, its RF emissions are very low and are not likely to cause any interference in nearby electronic devices.
RF emissions CISPR 11	Class B	
Harmonic emissions IEC 61000-3-2	Class A	The InBody device is suitable for use in all establishments, including domestic establishments and those directly connected to the public low-voltage power supply network that supplies buildings used for domestic purposes.
Voltage fluctuations/ flicker emissions IEC 61000-3-3	Complies	

Electromagnetic Immunity

Immunity Test	IEC 60601 Test Level	Compliance Level	Electromagnetic Environment - Guidance
Electrostatic discharge IEC 61000-4-2	± 8 kV contact ± 2 kV, ± 4 kV, ± 8 kV, ± 15 kV air	± 8 kV contact ± 2 kV, ± 4 kV, ± 8 kV, ± 15 kV air	Floors should be wood, concrete or ceramic tile. If floors are covered with synthetic material, a relative humidity of at least 30 % is recommended.
Electrical fast transient/ burst IEC 61000-4-4	± 2 kV for power supply lines ± 1 kV for input/output lines	± 2 kV for power supply lines ± 1 kV for input/output lines	The main power quality should be that of a typical commercial or hospital environment.
Surge IEC 61000-4-5	± 0.5 kV, ± 1 kV differential mode ± 0.5 kV, ± 1 kV, ± 2 kV common mode	± 0.5 kV, ± 1 kV differential mode ± 0.5 kV, ± 1 kV, ± 2 kV common mode	The main power quality should be that of a typical commercial or hospital environment.
Voltage dips, short interruptions and voltage variations in power supply input lines IEC 61000-4-11	0 % U_T (100 % dip in U_T) for 0.5/1 cycles 70 % U_T (30 % dip in U_T) for 25/30 cycles 0 % U_T (100 % dip in U_T) for 250/300 cycles	0 % U_T (100 % dip in U_T) for 0.5/1 cycles 70 % U_T (30 % dip in U_T) for 25/30 cycles 0 % U_T (100 % dip in U_T) for 250/300 cycles	The main power quality should be that of a typical commercial or hospital environment. If the user of this device requires continued operation during power mains interruptions, it is recommended that this device be powered from an uninterruptible power supply or a battery.
Power frequency (50 / 60 Hz) magnetic field IEC 61000-4-8	30 A/m	30 A/m	Power frequency magnetic fields should be at levels characteristic of a commercial or hospital environment.

Classifications and Specifications

Recommended separation distances between portable and mobile communication devices and InBody device

The InBody device is intended for use in an electromagnetic environment in which radiated RF disturbances are controlled. The customer or the user of the InBody device can help prevent electromagnetic interference by maintaining a minimum distance between portable and mobile RF communications devices (transmitters) and the InBody device as recommended below, according to the maximum output power of the communications devices.

Rated maximum output power of the transmitter [W]	Separation distance according to frequency of transmitter [m]	
	IEC 60601-1-2: 2014	
	150 kHz to 80 MHz $d = 1.2\sqrt{P}$	80 MHz to 2.7 GHz $d = 2.0\sqrt{P}$
0.01	0.12	0.20
0.1	0.38	0.63
1	1.2	2.0
10	3.8	6.3
100	12	20

For transmitters rated at a maximum output power not listed above, the recommended separation distance d in meters (m) can be estimated using the equation applicable to the frequency of the transmitter, where P is the maximum output power rating of the transmitter in watts (W) according to the transmitter manufacturer.

NOTE 1 At 80 MHz and 800 MHz, the separation distance for the higher frequency range applies.

NOTE 2 These guidelines may not apply in all situations. Electromagnetic propagation is affected by absorption and reflection from structures, objects, and people.

Electromagnetic Immunity

Immunity Test	IEC 60601 Test Level	Compliance Level	Electromagnetic Environment - Guidance
Conducted RF IEC 61000-4-6	3 V 150 kHz to 80 MHz	3 V	Portable and mobile RF communications devices should not be used closer to any part of the Ultrasound System, including cables, than the recommended separation distance. This is calculated using the equation applicable to the frequency of the transmitter.
	6 Vrms 150 kHz – 80 MHz In ISM bands ¹ amateur radio bands Bands ²	6 V	Recommended separation distance $d = 1.2 \sqrt{P}$
Radiated RF IEC 61000-4-3	10 V/m 80 MHz to 2.7 GHz	10 V/m	IEC 60601-1-2:2014 $d = 2.0 \sqrt{P}$ 80 MHz to 2.7 GHz Where P is the maximum output power rating of the transmitter in watts (W) according to the transmitter manufacturer, and d is the recommended separation distance in meters (m). Field strengths from fixed RF transmitters, as determined by an electromagnetic site survey, ³ should be less than the compliance level in each frequency range. ⁴ Interference may occur in the vicinity of the device marked with the following symbol.



NOTE 1 At 80 MHz and 800 MHz, the higher frequency range applies.

NOTE 2 These guidelines may not apply in all situations. Electromagnetic propagation is affected by absorption and reflection from structures, objects and people.

1. The ISM (Industrial, Scientific and Medical) bands between 150 kHz and 80 MHz are 6.765 MHz to 6.795 MHz; 13.553 MHz to 13.567 MHz; 26.957 MHz to 27.283 MHz; and 40.66 MHz to 40.70 MHz.
2. The amateur radio bands between 0.15 MHz and 80 MHz are 1.8 MHz to 2.0 MHz, 3.5 MHz to 4.0 MHz, 5.3 MHz to 5.4 MHz, 7 MHz to 7.3 MHz, 10.1 MHz to 10.15 MHz, 14 MHz to 14.2 MHz, 18.07 MHz to 18.17 MHz, 21.0 MHz to 21.4 MHz, 24.89 MHz to 24.99 MHz, 28.0 MHz to 29.7 MHz and 50.0 MHz to 54.0 MHz.
3. Field strength from fixed transmitters, such as base stations for radio (cellular/cordless) telephones, land mobile radios, amateur radio, AM and FM radio broadcasts, and TV broadcasts, cannot be predicted theoretically with accuracy. To assess the electromagnetic environment due to fixed RF transmitters, an electromagnetic site survey should be considered. If the measured field strength in the location where the device is used exceeds the applicable RF compliance level, the device should be monitored to ensure normal operation. If abnormal performance is observed, additional measures may be necessary, such as reorienting or relocating the device.
4. When the frequency range exceeds 150 kHz to 80 MHz, the electric field strength should not exceed 3 V/m.

Classifications and Specifications

Electromagnetic Emissions

The InBody device is intended for use in an electromagnetic environment in which radiated RF disturbances are controlled. A portable RF communications devices should be used no closer than 30 cm (12 inches) to any part of the InBody device. Otherwise, the performance of this device could be impaired.

Immunity Test	Band	Service ⁵	Modulation ⁶	IEC60601 Test Level	Compliance Level
Proximity fields from RF wireless Communications IEC61000-4-3	380 - 390 MHz	TETRA 400	Pulse modulation 18 Hz	27 V/m	27 V/m
	430 - 470 MHz	GMRS 460 FRS 460	FM ⁷ ± 5 kHz deviation 1 kHz sine	28 V/m	28 V/m
	704 - 787 MHz	LTE Band 13, 17	Pulse modulation 217 Hz	9 V/m	9 V/m
	800 - 960 MHz	GSM800:900 TETRA 800 iDEN 820 CDMA 850 LTE Band 5	Pulse modulation 18 Hz	28 V/m	28 V/m
	1700 - 1990 MHz	GSM 1800 CDMA 1900 GSM 1900 DECT LTE Band 1,2,4,25 UMTS	Pulse modulation 217 Hz	28 V/m	28 V/m
	2400 - 2570 MHz	Bluetooth WLAN 802.11b/g/n RFID 2450 LTE Band	Pulse modulation 217 Hz	28 V/m	2 8V/m
	5100 - 5800 MHz	WLAN 802.11a/n	Pulse modulation 217 Hz	9 V/m	9 V/m

NOTE If it is necessary to achieve the IMMUNITY TEST LEVEL, the distance between the transmitting antenna and the ME DEVICE or ME SYSTEM may be reduced to 1m. The 1m test distance is permitted by IEC 61000-4-3.

5. For some services, only the uplink frequencies are included.

6. The carrier shall be modulated using a 50 % duty cycle square wave signal.

7. As an alternative to FM modulation, 50 % pulse modulation at 18 Hz may be used because while it does not represent actual modulation, it would be the worst case.



Follow the instructions for use

Suivez les instructions d'utilisation



WARNING

- Electric shock hazard – Do not dismantle.
- Dismantling will void the warranty.
- Do not touch the signal input, signal output, or other connectors, and the patient simultaneously.
- External devices intended for connection to the signal input, signal output, or other connectors shall comply with the relevant IEC standards (e.g., IEC60950 for IT devices and the IEC60601-1 series for medical electrical devices). Additionally, all such combined systems must comply with the IEC60601-1 and/or IEC60601-1-1 harmonized national standards or their combination. If in doubt, contact a qualified technician or your local representative.



AVERTISSEMENT

- *Risque de choc électrique - ne pas démonter.*
- *Le démontage annulera la garantie.*
- *Ne touchez pas l'entrée de signal, la sortie de signal ou d'autres connecteurs et le patient simultanément.*
- *L'équipement externe destiné à être connecté à l'entrée de signal, à la sortie de signal ou à d'autres connecteurs doit être conforme à la norme IEC pertinente (par exemple, IEC60950 pour les équipements informatiques et la série IEC60601-1 pour les équipements électriques médicaux). De plus, tous ces systèmes combinés doivent être conformes à la norme nationale harmonisée IEC60601-1 et/ou IEC60601-1-1 ou à la combinaison. En cas de doute, contactez un technicien qualifié ou votre représentant local.*



DANGER

- Do not use this device with electrical medical devices such as pacemakers.
- *Ne pas utiliser cet appareil avec des dispositifs médicaux électroniques tels que les pacemakers.*



CAUTION

- Do not spray any liquid substance directly onto the device.
- *Ne pulvérisez aucune substances liquides directement sur l'appareil.*



CAUTION

- Avoid applying excessive force to the shoulder joint.
- *Ne pulvérisez aucun liquide directement sur l'appareil.*

9.5 Key Performance Claims

The key performance claims of InBody have been established as the correlation coefficient Ratio (R) of Fat Free Mass (FFM), which is numerically defined as the R-value, should be ≥ 0.80 (80 %).

Clinical Benefit

Using the InBody with the probability of harm occurring is more beneficial when compared to the severe harm that might occur from not using the Body Composition Analyzer of InBody. The Body Composition Analyzer of InBody provides clinical benefits to support the aforementioned intended use, as the InBody is mainly used for healthy and acutely or chronically ill populations in hospitals, medical practices and inpatient care facilities in accordance with the national regulations. It can be used to assist in the assessment of nutritional status, obesity and muscle balance. Body composition analysis is important in preventive medicine since it provides the basis for appropriate physical activity and dietary habits for improving personal daily routines. It can also be usefully applied to follow-up studies of patients treated for various diseases.

Inaccurate measurements of the Fat Free Mass (FFM) could have a negative impact on further use of the body composition analysis data gathered from the clinical use of InBody.

