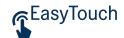
KERN SET-21 EasyTouch Formulation



BB 65578

Multi device use/management



Central component management



Component bars

**Result more conduct of degrees for integration.

| Selection points | Selection points



Manual selection of the next component

Changes to master data are also saved in the dynamic measuring data memory in a tamper-proof manner (Data Traceability).

Dynamic data can be recalled and printed out

at any time and or can be exported as a table

 Recipe weighing can either be carried out continuously without removing the weighed components or individually with removal of the weighed components

Options

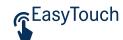
- Save-Server central data memory function for additional storage of all measuring data in a central, local server directory. This is where measuring data is stored from all weighing systems connected using KERN EasyTouch, as well as all installed KERN EasyTouch functions. The advantage of this, particularly for users with several weighing systems, is having all weighing data consolidated in just one database and only having to search for individual measuring data from different balances in one table. Save-Server data storage is also tamper-proof and cannot be changed, KERN SET-10
- Save-Cloud: Has the same central data memory function as the Save-Server for all weighing systems connected to KERN Easy-Touch. The difference is that in Save-Data Cloud, the storage location is a KERN Server, which can be accessed over the internet, instead of a server in a local network. Setting up Save-Data Cloud functionality takes place automatically and does not require a network administrator on the user side, KERN SET-101

Coming soon: SET-12 Pharma Set:
 This program package is based on SET-21 and supports the user with the following processes in the pharmaceutical industry, production of cosmetics and baby food or food supplements or similar products: Production (SET-121), quality checks (SET-122) on your production line and filling as well as labelling (SET-133). Also available: Template for software validation (SET-124) and Anti-Cybercrime function (SET-125) for complete separation of the system from networks in the case of an emergency

- • Open or fixed component sequence:

 When planning a recipe you can specify whether the components need to be added in a fixed designated order or whether you can add the components in any order
- Dosing assistant: When weighing, the system gives the user visual and acoustic feedback when the target weight is reached when dispensing. Visual feedback is supported by an intelligent bar graph with auto-focus on the target range. Acoustic feedback is in the form of a beep
- IIO Component bars: Clear display showing the proportion of the components one to another, which components have already been successfully added (green), which components are next (orange) and which components have not yet been added (grey). III With an open sequence, the next component can be selected manually by clicking on the relevant component
- Safety warning: A freely-editable comment field can be displayed prominently at the start of a recipe process. This information can be used, for example, for safety instructions or warnings
- Central measuring data memory (Save-Data Local): All printed and stored weighing and measuring data is stored in this memory. The data is stored on the local display device or centrally for all connected weighing systems in a server directory (Save-Data Server or Save-Data Cloud). All stored data is saved in a tamper-proof manner and cannot be changed

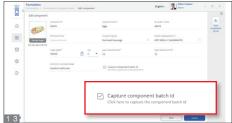
KERN SET-21 EasyTouch Formulation







Defined balance



Batch ID for weighing components

Manual entry

New functions

· 112 Defined balance

- Definition of a specific balance for weighing a specific component with a specific formula
- Automatic switching to the relevant balance, when the user comes to this component in the recipe. In this way errors cannot occur through weighing on the wrong balance
- Documentation of which weighing process was carried out on which weighing device
- Ideal for qualified processes (IQ, OQ, PQ), such as, for example, for pharmaceutical production, KERN SET-212

• 13 Batch ID for components, with

- a batch ID can be defined as mandatory for a component, if this formula is being processed
- For each recipe process the user must first enter the batch name for the selected component, before he can save this weight
- Output of the component batch ID in the print protocol of the completed recipe

• 14 Manual entry:

- This function permits the user to enter a component without weighing it, e.g. a full sack or a full container with reliable weight information from the manufacturer

Technical data

- · Licence model: A license can be operated on up to four terminal devices (PCs, laptops, tablets) at the same time and independently
- User: An unlimited number of users can be created in one license
- · Balances: You can create and operate as many balances in one licence as you want
- · Communication between balance/terminal device: Balances can communicate with the PC, laptop or tablet by serial connection, USB, Bluetooth, Ethernet or WIFI









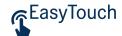


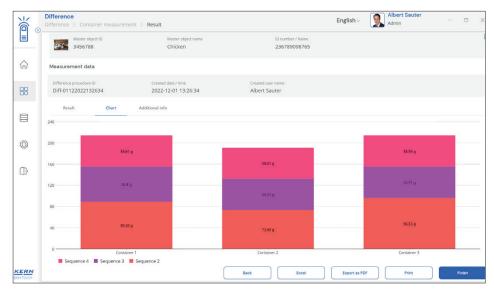






KERN SET-22 EasyTouch Difference





New procedure for difference weighing



Repeating the weighing sequences

Recalling the sample holder



Marking of sample holders



Central master data memory



Measuring screen

ET Difference - Difference weighing e.g. growth of cell cultures

Features

- · Note: the required basis is SET-01 ET OS (basic package). SET-22 is part of the SET-02 Premium Laboratory package with "recipe function" at a bargain price
- In the difference function supports the monitoring and analysis of growth or modification processes, as would occur, for example, in biological series of tests with cell cultures (monitoring). In this function you can define, name and record the related initial weight of as many sample holders as you wish, e.g. petri dishes (with culture mediums) 4. The samples to be monitored are entered in this sample holder and recorded with their initial weights in the function. Using the difference function you can weigh this sample holder at regular intervals again and again. The difference function automatically calculates the weight difference, i.e. the difference in relation to the initial weight (e.g. the growth or other biological, chemical changes). These differences are stored and analysed. Statistical analysis of any differences in a graphical manner and as data to download
- Graphic step-by-step guide: The illustrated guide takes the user safely through the workflow for difference weighing
- 2 Repeating the weighing sequences: You can repeat the weighing sequence as many times as you wish, i.e. sample holders with cell cultures can be weighed as often as you wish and can therefore be monitored for as long as required

- 3 Recalling the relevant sample holder occurs either automatically, in accordance with the defined sequence, or manually using the ID number of the sample holder, which can be scanned using the barcode for example. In this way, the risk of confusion and incorrect weighing is minimised
- 5 Central master data memory: These weighing sequences can be stored in the system memory with the number of containers (e.g. petri dishes), container IDs, ID number for the sequence, name of the sequence, batch name, etc. By doing this, this data does not have to be constantly re-entered when repeating the sequence, but can easily be recalled from the memory. The tare values of the petri dishes can also be stored in the master data memory. These are then automatically subtracted from the particular weighing result

· 6 Efficient weighing and saving of individual results

The sample holders can be stored with an ID number. This can be scanned using a barcode. In this way the correct sample holder is identified. Just weigh, save and you're done

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KERN SET-22 EasyTouch Difference



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Options

- · Save-Server central data memory function for additional storage of all measuring data in a central, local server directory. This is where measuring data is stored from all weighing systems connected using KERN EasyTouch, as well as all installed KERN EasyTouch functions. The advantage of this, particularly for users with several weighing systems, is having all weighing data consolidated in just one database and only having to search for individual measuring data from different balances in one table.
- Save-Server data storage is also tamper-proof and cannot be changed, KERN SET-10
- · Save-Cloud: Has the same central data memory function as the Save-Data Server for all weighing systems connected to KERN EasyTouch. The difference is that in Save Cloud, the storage location is a KERN Server, which can be accessed over the internet, instead of a server in a local network. Setting up Save-Data Cloud functionality takes place automatically and does not require a network administrator on the user side, KERN SET-101

Technical data

- · Licence model: A license can be operated on up to four terminal devices (PCs, laptops, tablets) at the same time and independently
- User: An unlimited number of users can be created in one license
- Balances: You can create and operate as many balances in one licence as you want
- Communication between balance/terminal device: Balances can communicate with the PC, laptop or tablet by serial connection, USB, Bluetooth, Ethernet or WIFI











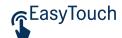


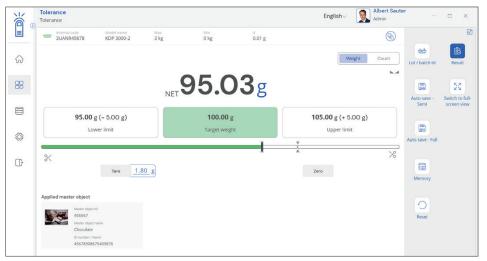






KERN SET-31 EasyTouch Tolerance





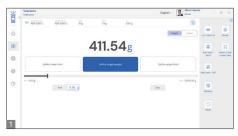
ET Tolerance - Tolerance weighing function

Features

- Note: the required basis is SET-01 ET OS (basic package). SET-31 is part of the SET-03 Premium Industrial package with "piece-counting function" and "target count function" at a bargain price.
- The tolerance weighing function allows rapid, simple and complex checkweighing processes. Here the user enters a lower and upper weight limit. With the KERN Easy-Touch system you can weigh a wide range of objects and the system will indicate whether the current weight is within or outside the defined limits. This function is used for sorting, portioning as well as commissioning and other processes
- In KERN EasyTouch Tolerance the limits can be entered extremely quickly using the touchscreen or on the PC in the relevant field. You can enter the limits in two ways: Either just by using lower and upper limits (absolute limits) ③ or using target value with lower and upper permitted deviation.
 ② the permitted deviations can be entered either in "g" (as absolute value) or in "%" from target value (as relative value) ⑤
- Si Central master data memory: Checkweighing objects can be stored in the system memory with a target weight as well as lower and upper limits. By doing this, these limits do not have to be constantly re-entered, but can easily be recalled from the memory. In the master data memory, you can store a possible tare value for the packaging, box or container which would typically be used for the item and which is then automatically subtracted from the weighing result

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- ID security: Offers the possibility of saving every weighed and stored weighing result with a unique ID number (Dynamic Object ID) and an ID name (Dynamic Object Name). The saving process can occur on a semi-automatic or fully-automatic basis and certainly every time the load is taken off the balance and then load is applied again. This means that the user does not have to press any buttons for mass storage and can work efficiently
- Colour bar graph: Through the colour bar graph, the user is shown clearly and quickly whether the weighing result is below, within or above the tolerance range. The red result marker "I" also shows the user exactly where the weight is within the tolerance range
- **Trull mode**: In full mode, the area for displaying the results will be coloured in the particular result colour for tolerance weighing across the full screen width
- 3 Batch ID: In addition to "ID security" for each individual object, a "Batch ID" can be allocated for a complete test batch. This batch ID will be stored along with each individual save operation Doing this guarantees that all stored results in the dynamic data memory can be identified later with this batch ID



Define target value



Permitted deviation



Absolute limits



Dynamic item data



Permitted deviations



Master data memory

KERN SET-31 EasyTouch Tolerance









Tolerance function in pieces

Display in full mode

- 10 Tolerance function in pieces: The Checkweighing function can be carried out in g, kg as well as in pieces. To do this, you can enter the individual weight of the object to be counted (reference weight), target quantity as well as upper and lower limit quantities
- Tolerance function in percent: It is possible to operate the checkweighing function in percent instead of g, kg or pieces. When doing this, enter the target value as well as the upper and lower limits as a percentage

Options

 Save-Server central data memory function for additional storage of all measuring data in a central, local server directory. This is where measuring data is stored from all weighing systems connected using KERN EasyTouch, as well as all installed KERN EasyTouch functions. The advantage of this, particularly for users with several weighing systems, is having all weighing data consolidated in just one database and only having to search for individual measuring data from different balances in one table.

Save-Server data storage is also tamper-proof and cannot be changed, KERN SET-10



Batch ID



Quick keys

- · Save-Cloud: Has the same central data memory function as the Save-Server for all weighing systems connected to KERN Easy-Touch. The difference is that in Save-Data Cloud, the storage location is a KERN Server, which can be accessed over the internet, instead of a server in a local network. Setting up Save-Data Cloud functionality takes place automatically and does not require a network administrator on the user side, KERN SET-101
- · SET-261 Voice Output: With this option, individual voice or sound files can be stored in the system for specific events. As soon as the event occurs, the system plays back the individual sound file instead of the standard sound file. In this way, for example, clear speech output can be stored for workshops for the blind, such as "too light", "OK" or "too heavy", KERN SET-261
- 111 Quick keys for frequently used objects:
- Automatic display of the last 8 master data objects used in the ET tolerance function in the footer of the weighing screen
- Efficiency: Allows the user to select the right object at the push of a button
- Avoids having to search for the right object in the master data memory, KERN SET-311



Batch ID in the dynamic data memory

Technical data

- · Licence model: A license can be operated on up to four terminal devices (PCs, laptops, tablets) at the same time and independently
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- Balances: You can create and operate as many balances in one licence as you want
- Communication between balance/terminal device: Balances can communicate with the PC, laptop or tablet by serial connection, USB, Bluetooth, Ethernet or WIFI

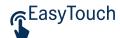
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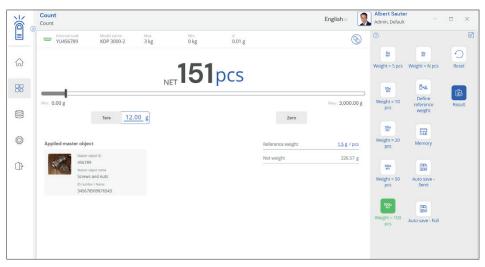




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KERN SET-32 EasyTouch Count





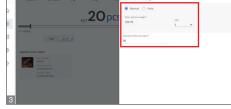


Define reference weight ...



... with predefined reference quantities (REF button)

20_p



... through entering an individual reference quantity



... from stored reference weights in the memory



Central master data memory



Printout of count result

ET Count - Piece-counting function

Features

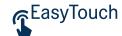
- · Note: the required basis is SET-01 ET OS (basic package). SET-32 is part of the SET-03 Premium Industrial package with "tolerance weighing function" and "target count function" at a bargain price
- · Entering the reference weight: The reference weight can be determined in a variety of ways: e.g. manual entry of the reference weight or through division calculation using the reference quantity. The reference weight can be entered with as many decimal places as you wish. In this way reference weights can be used for example, which were determined on precision balances **1**. Typically the reference weight is determined by placing the counted reference quantity on the balance and dividing by one of the predefined reference quantities (REF button) 2; or by placing an individual reference quantity on the balance and dividing by the reference quantity which has been entered separately 3; or by selecting an object from the master data memory with a stored reference weight 4
- 5 Central master data memory: Counted objects can be stored in the system memory with reference weight, tare weight, name, ID number, etc. By doing this, the reference weight does not have to be constantly re-entered, but can easily be recalled from the memory. In the master data memory, you can store a possible tare value for typical packaging, box or container, which would typically be used for the item and which is then automatically subtracted from the weighing result (Pre tare)

- Highly-efficient workflow thanks to maintained master data:
- Selection of the relevant item to be counted from the master data memory (e.g. by scanning a barcode)
- Placing the goods to be counted in a known tare container on the balance
- Readout of the counting result (and storing it if necessary)
- done!

In comparison with standard counting scales, you do not have the time-consuming weighing and calculation of the reference weight saving time and money!

- · Creating or changing master data, e.g. reference weights, can be saved in the dynamic data memory in a tamper-proof manner with the users responsible and time stamp (Data Traceability). In this way, it is transparent how old a stored reference weight value is and whether this value should be updated. A reference weight value can be re-calculated easily and conveniently from a piece-counting operation and updated in the master data memory
- · Precise counting: Automatic reference optimisation improves the average value of the parts weight and thereby increases the accuracy of the count result
- 6 PC print function and barcode scanning function: By operating the KERN EasyTouch App in a Windows® or Android™ environment you can use the full PC/tablet accessory infrastructure. In particular, standard Windows printers and PC label printers can print out extensive counting slips or compact adhesive labels with the count result to suit your requirements

KERN SET-32 EasyTouch Count





Operation with counting system function



Free selection of the counting system components



Fill-to-target function



Checkweighing in pieces

- · Counting system function: Through the option of connecting any balances to KERN EasyTouch and the support of different balances in the piece-counting function, you can operate a counting system . In this way, the KERN EasyTouch piece-counting function can be used with a precision balance for accurate determination of the reference weight of the smallest reference objects and a platform scale for counting larger quantities of the reference object. Both balances can be verified. With the KERN EasyTouch counting system, components of the counting system can be freely selected 8
- · ID security: Offers the possibility of saving every weighed and stored weighing result with a unique ID number (Dynamic Object ID) and an ID name (Dynamic Object Name). The saving process can occur on a semi-automatic or fully-automatic basis and certainly every time the load is taken off the balance and then load is applied again. This means that the user does not have to press any buttons for mass storage and can work efficiently

Options

- · Save-Server central data memory function for additional storage of all measuring data in a central, local server directory. This is where measuring data is stored from all weighing systems connected using KERN EasyTouch, as well as all installed KERN EasyTouch functions. The advantage of this, particularly for users with several weighing systems, is having all weighing data consolidated in just one database and only having to search for individual measuring data from different balances in one table. Save-Server data storage is also tamper-proof and cannot be changed, KERN SET-10
- · Save-Cloud: Has the same central data memory function as the Save-Server for all weighing systems connected to KERN Easy-Touch. The difference is that in Save-Data Cloud, the storage location is a KERN Server, which can be accessed over the internet, instead of a server in a local network. Setting up Save-Data Cloud functionality takes place automatically and does not require a network administrator on the user side, KERN SET-101

- Darget Count: This automatic Fill-to-target function allows you to enter a target quantity. When getting near to and reaching the target quantity both an acoustic and visual signal will be given. Ideally suited, for example for commissioning activities, KERN SET-33
- 110 Checkweighing in pieces: This function permits weighing with a tolerance range, albeit with the results display in pieces instead of g, kg. In this function, a lower and an upper limit value can be specified in pieces. Depending on the count result, within or outside the tolerance range, the system emits a different signal, KERN SET-31

Technical data

- · Licence model: A license can be operated on up to four terminal devices (PCs, laptops, tablets) at the same time and independently
- · User: An unlimited number of users can be created in one license
- · Balances: You can create and operate as many balances in one licence as you want
- device: Balances can communicate with the PC, laptop or tablet by serial connection, USB, Bluetooth, Ethernet or WIFI

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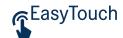


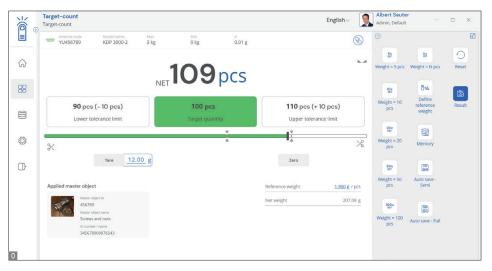


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· Communication between balance/terminal

KERN SET-33 EasyTouch Target count





ET Target count - Target count function

Features

- Note: the required basis is SET-01 ET OS (basic package). SET-32 is part of the SET-03 Premium Industrial package with "tolerance weighing function" and "piece-counting function" at a bargain price
- The Target count function allows extremely convenient target piece-counting. You can enter a target quantity in just one click. In addition a lower and upper limit can be entered separately
- Visual and acoustic output of the target count result, using a coloured bar graph as well as a beep. In this way, the operator can keep their attention focussed on the filling process, without having to constantly watch the weighing result. Different display for underfill 2 and overfill 3 as well as the correct fill level 1
- The target count function is ideal for commissioning processes, which are critical in terms of the count, e.g. in industry or in workshops for people with disabilities
- The target count function contains the same functions for determining the reference weight of the parts to be counted as the piece-counting function (SET-32)
- Central master data memory: In addition to the master data from the piece-counting function (SET-32), you can also store and recall the target value for piece counting here, and the lower and upper limits as well as the tare value of the container. This also enables a highly-efficient workflow for the piece-counting function (SET-32)

- Precise counting: Automatic reference optimisation improves the average value of the parts weight and thereby increases the accuracy of the count result
- Counting system function: The reference weight can also be determined through a counting system here
- **ID security:** Offers the possibility of saving every weighed and stored weighing result with a unique ID number (Dynamic Object ID) and an ID name (Dynamic Object Name). The saving process can occur on a semi-automatic or fully-automatic basis and certainly every time the load is taken off the balance and then load is applied again. This means that the user does not have to press any buttons for mass storage and can work efficiently



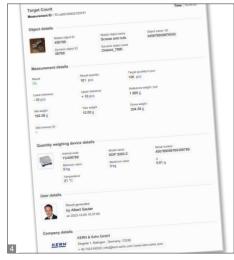
Entering the upper/lower limits



Underfill display



Overfill display

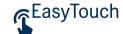


Printout of count result



ID security

KERN SET-33 EasyTouch Target count





Options

- · Save-Server central data memory function for additional storage of all measuring data in a central, local server directory. This is where measuring data is stored from all weighing systems connected using KERN EasyTouch, as well as all installed KERN EasyTouch functions. The advantage of this, particularly for users with several weighing systems, is having all weighing data consolidated in just one database and only having to search for individual measuring data from different balances in one table. Save-Server data storage is also tamper-proof and cannot be changed, KERN SET-10
- · Save-Cloud: Has the same central data memory function as the Save-Server for all weighing systems connected to KERN Easy-Touch. The difference is that in Save-Data Cloud, the storage location is a KERN Server, which can be accessed over the internet, instead of a server in a local network. Setting up Save-Data Cloud functionality takes place automatically and does not require a network administrator on the user side, KERN SET-101

- · Checkweighing in pieces: This function permits weighing with a tolerance range, albeit with the results display in pieces instead of g, kg. In this function, a lower and an upper limit value can be specified in pieces. Depending on the count result, within or outside the tolerance range, the system emits a different signal, KERN SET-31
- Coming soon: SET-261 Voice Output: With this option, individual voice or sound files can be stored in the system for specific events. As soon as the event occurs, the system plays back the individual sound file instead of the standard sound file. In this way, for example, clear speech output can be stored for workshops for the blind, such as "too light", "OK" or "too heavy", KERN SET-261

Technical data

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- Communication between balance/terminal device: Balances can communicate with the PC, laptop or tablet by serial connection, USB, Bluetooth, Ethernet or WIFI

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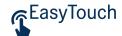


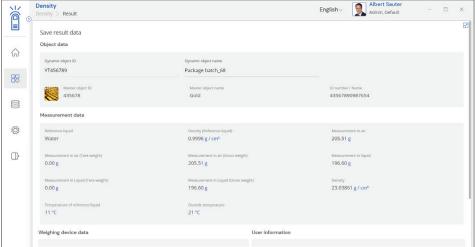


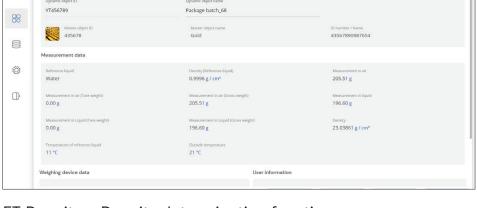




KERN SET-04 EasyTouch Density







ET Density - Density determination function

Features

Graphic guidance through density determination of solid matter and liquids is particularly user-friendly, the density is calculated and output immediately

- · Note: the required basis is SET-01 ET OS (basic package)
- The density determination function permits professional determination of the densities of solid bodies and liquids 2 in accordance with the gravimetric Archimedes' principle. To do this, typically a precision balance [d] = 0.01 g or 0.001 g or an analytical balance with [d] = 0.1 mg and density determination kit 11 are used
- · For samples, which, due to their size or shape, do not fit in the sample pan or beaker of the density kit, we recommend density determination using a balance with a suspended weighing device 9
- · Determining the density of a solid body through buoyancy: Selection of predefined liquid media is also possible, as is the definition of individual liquid media with their specific density at a specific temperature 3. This means that individual liquid media can be stored with individual temperatures with their specific density values
- 5 Determination of densities of liquids using a special plummet (optional) with defined volume. 6 Individual plummets can also be created and stored in the master data memory

- 4 A predefined workflow supports the user step-by-step through the density determination process. In this way errors in the work sequence and calculation errors are minimised
- PC print function and barcode scanning **function:** By operating the KERN EasyTouch App in a Windows® or Android™ environment you can use the full PC/tablet accessory infrastructure. In particular, standard Windows printers and PC label printers can print out extensive counting slips or compact adhesive labels with the count result to suit your requirements
- B ID security: ID security offers the possibility of saving every density result obtained with a unique ID number (Dynamic Object ID) and an ID name (Dynamic Object Name)



Density determination kit



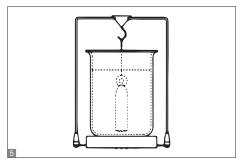
Selection of solid matter or liquid



Temperature information

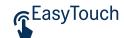


Step-by-step Workflow



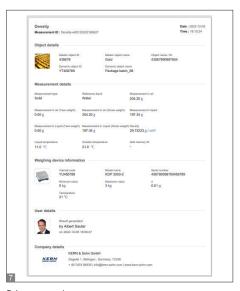
Density determination of liquids using plummets with defined volumes

KERN SET-04 EasyTouch Density



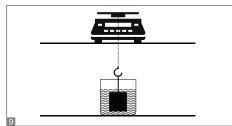


Central master data memory



Print protocol - measurement





Balance with suspended weighing device

Options

- · Save-Server central data memory function for additional storage of all measuring data in a central, local server directory. This is where measuring data is stored from all weighing systems connected using KERN EasyTouch, as well as all installed KERN EasyTouch functions. The advantage of this, particularly for users with several weighing systems, is having all weighing data consolidated in just one database and only having to search for individual measuring data from different balances in one table. Save-Server data storage is also tamper-proof and cannot be changed, KERN SET-10
- · Save-Cloud: Has the same central data memory function as the Save-Server for all weighing systems connected to KERN Easy-Touch. The difference is that in Save-Data Cloud, the storage location is a KERN Server, which can be accessed over the internet, instead of a server in a local network. Setting up Save-Data Cloud functionality takes place automatically and does not require a network administrator on the user side, KERN SET-101

- In Density determination kits for the KERN precision balance which is being used, can be retrofitted. KERN will be glad to help you decide
- Plummets for determining the densities of liquids with defined volumes, KERN YDB-A04

Technical data

- · Licence model: A license can be operated on up to four terminal devices (PCs, laptops, tablets) at the same time and independently
- · User: An unlimited number of users can be created in one license
- · Balances: You can create and operate as many balances in one licence as you want
- Communication between balance/terminal device: Balances can communicate with the PC, laptop or tablet by serial connection, USB, Bluetooth, Ethernet or WIFI



