# **Designed to Speed up Production** In Wet, Harsh and Hygienic Environments



Date: 30/03/2015 Time: 08:55 ‰<sup>10</sup>VAR औ<sup>10</sup>FIX ←√→

⇒⊛ TA

Above tolerance

Within tolerance

Below tolerance

0.000

#### **Maximum Versatility**

The ICS4\_9 product line is the right fit for your application. Benefit from the user-friendly operation and from a wide range of platform designs, integration options and applications. The double sealed, IP68 and IP69k protected terminals make it best suited for wet, harsh and hygienic environments.

#### Sharp, Clear, Easy to Read

The large LC Display facilitates clear, comfortable and error-free data reading. The content of the displays is configurable and shows exactly what you need to know. Three selectable display modes provide only the most relevant parameters for your application.

# colorWeight® Speeds up Production

Save time and money with the smart colored display making weighing applications such as completeness checks or portioning simple, fast and less error prone. The colorWeight® display indicates at a glance if weight or count is below, within or above target.

## **Configurable to Your Needs**

You can choose between three different ways to mount the terminal relative to the platform in order to ensure optimal ergonomics and maximize productivity. Three types of load cells are available to fulfil the requirements of your environment in order to guarantee reliable operation and a long lifetime.



# ICS4\_9 Combi Bench Solutions Optimize Your Production Processes

The ICS4\_9 compact scale product line offers seamless integration into your production process as your scale can be individually configured for fast and precise operations. The rugged and easy to clean stainless steel design makes it best suited for wet, harsh or hygienic environments in either the food, pharmaceutical or chemical industry.

- All stainless steel construction
- Patented, double sealed terminals with IP69k
- ColorWeight<sup>®</sup> for fast and error-free readings
- Suited for simple weighing as well as for advanced applications
- Easy data handling with dedicated functions and efficient tools
- Smart weighing counter for improved maintenance



# ICS4\_9 Terminals – Technical Data



Model	ICS429	ICS439	ICS449	ICS469
Basic weighing; average weighing	•	•	•	•
Counting; Totalizing			•	•
Over/Under Checkweighing; Portioning			•	•
colorWeight <sup>®</sup>			•	•
Configurable soft keys			•	•
User prompting			•	•
Numeric keypad		•		•
Number of attachable platforms	1	1	2	2
Data storage (max. 100 entries)			•	•
Optional Alibi Memory (300,000 entries)			•	•

General Specifications						
Resolution	Analog platforms: 300,000d; 7,500e; OIML / 10,000d; NTEP					
	Digital platforms: The actual resolution is defined by the respective platform					
Display	LCD liquid crystal graphical display with backlighting; 3 different display layouts					
Display languages	English, German, French, Italian, Spanish, Chinese, Portuguese, Japanese					
Character height	Default layout = 19 mm; Big font mode = 25 mm; 3-line info mode = 15 mm					
Keypad	Tactile-touch membrane keypad (PET), scratch-resistant, > 1,000,000 keystrokes					
Housing	Stainless steel 1.4301, AISI 304					
Ingress Protection	IP68 & IP69k					
Power Connection	100 – 240 V / 50 – 60 Hz / 300 mA, Length of power cord approx. 2.5 m					
Battery (Option)	12 VDC / 2.5 A: Continuous operation with one strain gauge load cell ~ 22 hours; with 4 strain gauge load cells ~ 18 hours. (Duration decreases with installed options like e.g. WLAN). Life time: 500 to 1,000 charging/discharging cycles					
Interfaces (Standard and Options)	Standard: 1 x scale interface (Analog, IDNet or SICSpro) 1 x RS232 data interface 1 x Optional interface is possible: RS232, RS422/485, USB device, USB host, Ethernet, WLAN, Digital I/O (4 Inputs + 4 Outputs), IDNet scale, SICSpro scale, analog scale					
Connectable platforms	All Analog & SICSpro & IDNet platforms (except F-cell, AWU, GD16-17, PIK) Connection of a second scale to ICS449 and ICS469 is limited to SICSpro- or SICS-interface					
Analog scale interface specification	Impedance: $\geq$ 87.5 $\Omega$ (means 1 x 350 $\Omega$ ; 4 x 350 $\Omega$ ), Excitation: 3.3 VDC, Sensitivity: 2 to 3 mV/V Max. Resolution: 7,500e (OIML), 300,000d (not approvable) Min. verification scale interval: 0.264 $\mu$ V/e					
Temperature Range	Class II, 10 to 30 °C (PBK7-Serie) Class II, 0 to 40 °C (PBK9-Series, PFK9-Series) Class III, -10 to 40 °C (Strain gauge)					
Humidity	Max. rel. humidity 85 % for temperatures up to 40 °C					
Net / Shipping weight	2 kg / 2.5 kg					
Approvals	OIML, NTEP, CE, CSA, GMP (Weights & Measures data is shown in display and indicates if system is approved or not approved)					

#### **Terminal Platform Combinations**



t-Version Terminal placed on table or wall-mounted for all platform sizes.



f-Version Front mounted terminal on short side of platforms - for all platform sizes. (Not available with WLAN interface)



c-Version Column mounted terminals on short side of platforms. Cables laid inside column (Not available for B-Size).

#### **Capacities and Readabilities**



Platform Size	3 kg	6 kg	15 kg	30 kg	60 kg
A (240 x 300 mm)	•	•	•		
BB (300 x 400 mm)				•	•
B (400 x 500 mm)				•	•
QA (229 x 229 mm)	•	•			
QB (305 x 305 mm)			•	•	•
Readability not approved <sup>1</sup> (1x3,000d, standard)	1 g	2 g	5 g	10 g	20 g
Max. Readability not approved (15,000d)	0.2 g	0.5 g	1 g	2 g	5 g
Max. Readability approved (1x3,000e, OIML Class III)	1 g	2 g	5 g	10 g	20 g

1) Additional optional resolution (not approved): 6,000d

#### Load Cell Options for Different Environments



Load Cell Type	Delivery	Ingress Protection	Environment	Cleaning Procedure
Aluminium, potted	Standard	IP65	Short time wet (30 min/day)	light hose-down
Stainless Steel, potted	Option	IP65 / IP67	Part time wet (120 min/day)	light wash-down
Stainless Steel, hermetically sealed	Option	IP68 / IP69k	Permanent wet	heavy wash down; high pressure water & steam jet

#### Bundle ICS Terminals with PBK9 High Precision Platforms or any other platform



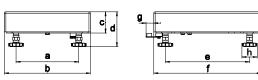
The PBK9 Series high precision weighing platforms can be directly connected to all ICS terminals (see PBK9 datasheet for detailed specifications of the platforms). For PBK9 platforms of A- and AB-size the item "Factory Approval for SICSpro Scale" can be ordered for legal-for-trade applications. Terminal and platform will be shipped separately but can easily be connected to an approved weighing system at the place of installation.

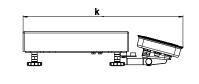
You can connect any other analog or digital METTLER TOLEDO platform including floor scales to the ICS terminals.

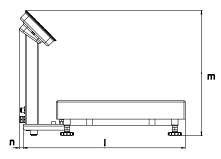
I/O Accessories	Relay box for digital I/O including power supply		
Covers, Brackets	Protective cover for terminals; Wall bracket; Desk mounting plate		
Stands	In many heights and versions		
PC Software	DatablCS PC Database management tool		
Others	Printers; Interfaces; Cables and much more		

Accessories

#### **Dimensions and Drawings**



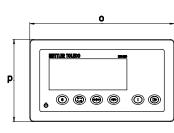


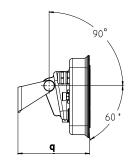


Dimension [mm]	A	BB	В	QA	QB
a	175	235	335	163	240
b	240	300	400	228	305
С	59	76	82	59	76
d	86	97	123	86	97
е	235	335	435	163	254
f	300	400	500	228	305
g	21	18	18	21	17
h	42	42	42	42	42
k	452	549	649	380	452
	452	515	n/a	347	419
m	386	386	386	386	386
n	34	34	34	34	34

# **Dimensions of Terminal**

Dimension	[mm]
0	232
р	130
q	115





## Length of load cell cable for t-Version

Model	Potted aluminium load cell	Potted stainless steel load cell	Hermetically sealed stainless steel load cell
A	1 m	3 m	3 m
BB	2 m	3 m	3 m
В	2 m	3 m	3 m
QA	1 m	3 m	3 m
QB	2 m	3 m	3 m



# **METTLER TOLEDO** Service

Our extensive service network is among the best in the world and ensures maximum availability and service life of your product.



Quality certificate ISO 9001 Environment certificate ISO 14001

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