# Accessories

# Security in Your Lab with Level Sensor



### **Prevents overflow**

After titration or density/refractive index measurement, waste solution is often pumped into a waste bottle. LevelSens is installed at the waste bottle and interrupts the series when the waste bottle is full. Overflow is reliably prevented, increasing security in the laboratory.

# Solution monitoring

Many different solutions can be involved in titration like titrants, solvents or auxiliary reagents. If their bottle runs dry the titration is not performed correctly. LevelSens can interrupt the series when bottles are empty, preventing lost samples and wasted time.

### User warning

When a waste bottle is full or a solution bottle runs dry, the instrument interrupts the series and prompts a message. The user can then empty the waste bottle or replace the solution bottle and continue the interrupted task in One Click<sup>®</sup>.

| 0             | Continue | 8        |
|---------------|----------|----------|
|               |          |          |
| Sensor 1 type |          | Waste    |
| Sensor 2 type |          | Level    |
| Sensor 3 type |          | Level    |
| Sensor 4 type |          | Inactive |
| Cancel        | Print    |          |
|               |          |          |

Info

Waste bottle full. Empty waste bottle. LevelSens box 1: Input 2

### **Easy installation**

LevelSens is easily attached on the outside of the bottle and senses the solution in the bottle. It has no contact with reagents and isn't harmed by aggressive chemicals. With plug and play, no complicated settings need to be chosen.



# LevelSens for solutions and waste

With titrators, density meters and refractometers, the new LevelSens accessory increases security and is simple to install and use. The innovative working principle of the capacitive sensor allows reliable detection without coming into contact with reagents.



# **Application Examples**

# **General Titration**

Titration Excellence can utilize multiple burettes and pumps to automatically perform sample preparation, analysis and cleaning of the system. Two LevelSens Boxes can be connected, each connecting up to four level sensors, so titrant, reagent, solvent and waste bottles are monitored. When an analysis is started, the system checks whether all bottles contain enough solution and makes sure the waste container isn't full. This ensures that all solutions are available for titration and no bottle runs dry or overflows.



### **Karl Fischer Titration**

The V30 Compact Karl Fischer titrator has three bottles connected: titrant bottle, solvent bottle and waste bottle. The titrant and solvent bottles are monitored with a LevelSens to make sure the user is prompted before a bottle runs dry. The waste bottle cannot overflow because the waste sensor stops the pump when the bottle is full.



Whenever samples series must be measured, automation is the solution. In such cases, LevelSens can be easily attached to the waste container. The automation unit stops as soon as the waste container is full and the task can be continued as soon as it has been emptied.





# **Technical data LevelSens**

| Titrator models supporting LevelSens                             | Titration Excellence T50, T70, T90 and<br>Compact Karl Fischer Titrators Volumetric V30 and C30 Coulometer  |  |  |
|--|---|--|--|
| Density and Refractive<br>Index instruments supporting WasteSens | LiquiPhysics Excellence DM, DX, RM and RX   |  |  |
| Max. number of LevelSenses per LevelSens Box                     | 4   |  |  |
| Max. number of LevelSens Boxes per titrator                      | 2   |  |  |
| Versions   | LevelSens aqueous for aqueous solutions and polar organic solutions<br>LevelSens non-aqueous for non-polar organic solutions  |  |  |
| Order numbers  | LevelSens aqueous including attachment strap and 1 m cable (mini DIN)<br>LevelSens non-aqueous including attachment strap and 1 m cable (mini DIN)<br>LevelSens Box to connect up to 4 LevelSenses to a titrator including 20 cm CAN cable<br>Spare attachment strap (Holder for LevelSens)<br>Extension cable 1 m for LevelSens (mini DIN) | 51109854<br>51109853<br>51109210<br>51109852<br>51108308 |  |



**Mettler-Toledo AG, Analytical** CH-8603 Schwerzenbach, Switzerland Tel. +41 44 806 77 11 Fax +41 44 806 72 40

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# www.mt.com/titration

For more information