The 3-channel Profiler for Perfect Rack Oven Baking Results

Bakeries with one or two rotating rack ovens or a narrower tunnel oven choose the value packed V-M.O.L.E.® BakeWATCH® to enhance their profit margin with high yield productivity and FSMA kill step compliance. Improve capacity and attain balanced oven performance and improve quality, with bake times resulting in optimum crumb set, texture and moisture content for a long shelf life with this portable method which does not interrupt production. Compatible with BakeWATCH® Kill Step Calculator as well, which automates the data collection, validation and D-Reduction reporting for FSMA post-bake critical control point hazards analysis testing.

Features:

- **Oven Balancing** - The BakeWATCH® profiler, housed in an insulated stainless steel enclosure, rides with 3 thermocouple sensors placed to read oven ambient temperatures from high, medium and low racks that indicate balance or a need for adjustments.
- **Baked Goods Optimization** – From a balanced oven, inserting each sensor halfway into top rack, middle and bottom rack dough pieces provides signature S-Curve data from the baked goods’ perspective. Software displays Yeast Kill, Gelatinization and Arrival as % of bake time automatically for an optimized bake every time.

From Fresh to Frozen to Par Bake – Bake Better Bread with BakeWATCH®

Product Benefits:

- Produce consistently High Quality Product – no matter the pan location
- Speeds new “free-from” varieties development
- Reduce Waste – Improve Yields & Profits

Oven Benefits:

- Replace opinions with facts to control baking variables
- Optimize existing oven(s) capacity when faced with expansion
- Profile Proofer humidity with VaporWATCH® or MiniM.O.L.E.® option – freezers too

System Includes:

- V-M.O.L.E.® 3-Channel thermal profiler
- 3 - Color Coded 0.010” Type K Thermocouples - 2.1M (7 Ft)
- Thermal Barrier (Dependent upon products baked)
- USB PC Interface Cable
- M.O.L.E.® MAP Software
- Quick Reference Guide
- Calibration Certificate
- Carrying Case

KIT P/N:

- E54-2253-10, BAKEWATCH V-MOLE BB-45 SYSTEM
- E54-2253-15, BAKEWATCH V-MOLE BB-50 SYSTEM
- E54-2253-18, BAKEWATCH V-MOLE BB-80 SYSTEM

Compatible with... VaporWATCH®, 3-channel Breadometer® & BakeWATCH® Kill Step Calculator

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* Top rated customer support • No-cost ECD Training Tools • Award winning software •
SPECIFICATIONS

**PHYSICAL**

Dimensions (L x W x H):
- Profiler: 145mm (5.7”) x 64mm (2.5”) x 7.62mm (.3”)
- Barrier: BB-50: 49mm (1.93”) x 122mm (4.80”) x 49mm (1.93”)

Weight:
- Profiler: 0.068 kg (2.4 oz)
- Barrier: BB-50: 2.38kg (5.25lbs)

**OPERATIONAL ENVIRONMENT**

Humidity: 0-85% RH (Non Condensing)
Operational range: -40°C to +85°C (-40°F to 185°F)

<table>
<thead>
<tr>
<th>Temperature</th>
<th>BB-45</th>
<th>BB-50</th>
<th>BB-80</th>
</tr>
</thead>
<tbody>
<tr>
<td>204°C/400°F</td>
<td>25 min.</td>
<td>40 min.</td>
<td>73 min.</td>
</tr>
<tr>
<td>260°C/500°F</td>
<td>15 min.</td>
<td>30 min.</td>
<td>55 min.</td>
</tr>
</tbody>
</table>

**COMPLIANCE**

EN 301 489-01 V1.8.1:2008
EN 300 328 V1.7.1:2006
EN 301 489-17 V2.1.1:2009
EN 60950
R&TTE 1999/5/EC
Low-voltage Directive 2006/95/EC
RoHS 2002/95/EC
WEEE 2002/96/EC

**THERMOCOUPLE SENSORS**

Up to 3 Type K ECD Mini-Thermocouples

**COMMUNICATIONS**

Interface: USB Compliant (charge; upload; download)
Cable: USB Type A, Male-to-Mini B, 5 pin Male, 1m (3’)

**DATA ACQUISITION**

Sampling Interval: 0.1 seconds to 24 hours
Data points: 500,000 for all 3 channels
Data runs stored: 96 (Standard Thermal Profiles)
Accuracy: +/- 0.5°C (0.9°F)
Resolution: 0.056°C (0.1°F)
Measurement range: -200°C to 1271°C (-328°F to 2320°F)

**POWER**

Battery: Lithium Polymer - Rechargeable, 340mAh
Charge Protection: optimized for lithium polymer
Charge time:
- Full: 8 hours
- Partial: 15 min. charge allows one 10min. data run
Charge Capacity:
- 50 ten minute data runs*
Battery Life: 300-400 charging cycles or 3 years [Minimum]
Charger input current: 175 ma via USB Interface
Operating Range: 4.2V to 3.2V

*New, fully charged Power Pack

**WARRANTY**

2 years parts and labor

**WEBSITE**

www.bakewatch.com

**PATENT**

U.S. PATENT No. 7,653,502