RIEGL VUX-1 Series

> RIEGL VUX-1HA
> RIEGL VUX-1UAV
> RIEGL VUX-1LR

High Performance LiDAR Sensors for KINEMATIC Laser Scanning

**VUX-1HA (High Accuracy)**
Typical Applications
• indoor and outdoor laser mapping
• tunnel profile measurements
• railway applications like clearance analysis, etc.

**VUX-1UAV**
Typical Applications
• topography in open-cast mining
• agriculture and forestry
• terrain and canyon mapping
• corridor mapping

**VUX-1LR (Long Range)**
Typical Applications
• corridor mapping: power line, railway track and pipeline inspection
• surveying of urban environments
• archeology and cultural heritage documentation

www.riegl.com
RIEGL VUX®-1HA
• compact, rugged and very lightweight High Accuracy LiDAR sensor
• easily mountable to whatsoever type of moving platform
• Laser Pulse Repetition Rate PRR > 1 MHz, high accuracy 5 mm

<table>
<thead>
<tr>
<th>Eye Safety Class</th>
<th>Laser Class</th>
<th>Max. Range @ Target Reflectivity 80%</th>
<th>Max. Range @ Target Reflectivity 10%</th>
<th>Minimum Range</th>
<th>Accuracy/Precision</th>
<th>Max. Effective Measurement Rate</th>
<th>Max. Scan Speed</th>
<th>Field of View (FOV)</th>
<th>Max. Operating Flight Altitude AGL</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>400 m</td>
<td>150 m</td>
<td>1.2 m</td>
<td>5 mm / 3 mm</td>
<td>1,000,000 meas./sec</td>
<td>250 scans/sec</td>
<td>360°</td>
<td>350 m / 1,150 ft</td>
</tr>
</tbody>
</table>

RIEGL VUX®-1UAV
• compact, rugged and very lightweight LiDAR sensor for UAV integration
• easily mountable to professional UAS/UAV/RPAS, etc.
• fully integrated system solution RIEGL VUX-SYS and RICOPTER available

<table>
<thead>
<tr>
<th>Eye Safety Class</th>
<th>Laser Class</th>
<th>Max. Range @ Target Reflectivity 60%</th>
<th>Max. Range @ Target Reflectivity 20%</th>
<th>Minimum Range</th>
<th>Accuracy/Precision</th>
<th>Max. Effective Measurement Rate</th>
<th>Max. Scan Speed</th>
<th>Field of View (FOV)</th>
<th>Max. Operating Flight Altitude AGL</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>920 m</td>
<td>550 m</td>
<td>3 m</td>
<td>10 mm / 5 mm</td>
<td>500,000 meas./sec</td>
<td>200 scans/sec</td>
<td>330°</td>
<td>350 m / 1,150 ft</td>
</tr>
</tbody>
</table>

RIEGL VUX®-1LR
• compact, rugged and very lightweight Long Range LiDAR sensor
• ideally suited for airborne surveying from helicopters
• fully integrated system solution RIEGL VUX-SYS, Helipod available for user-friendly mounting to helicopters

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<tbody>
<tr>
<td></td>
<td></td>
<td>1,350 m</td>
<td>820 m</td>
<td>5 m</td>
<td>15 mm / 10 mm</td>
<td>750,000 meas./sec</td>
<td>200 scans/sec</td>
<td>330°</td>
<td>530 m / 1,740 ft</td>
</tr>
</tbody>
</table>

Further Information