Mining, Minerals & Metals
Altivar Process — The first services oriented drive

Helping you face the significant challenges in Mining, Minerals & Metals processes

Maximizing production, increasing overall efficiency and optimizing asset utilization

As the commodity business remains volatile, it is critical to improve efficiency across your supply chain. Sustainability concerns, increased energy costs, availability of raw material, and a shortage of skilled staff are further adding to the constraints. As experts in the Mining, Minerals & Metals (MMM) sector, Schneider Electric provides solutions to maximize production, increase overall efficiency and optimize asset utilization.

Altivar Process: The first services oriented speed drive for Mining, Minerals & Metals

Business optimization: Increase productivity by up to 20%

Energy management with innovative power technology and regenerative systems help to avoid costly and energy-wasting breakdowns; integrated accurate (<5%) power measurement function maximizes and reduces operating and energy costs.

By managing assets through the electrical control of motor and monitoring the mechanical transmission, Altivar Process can help optimize load management and help avoid unexpected downtime.

Real-time intelligence

Accurate diagnostics, remote control, and remote services capabilities using the embedded Ethernet web server systems make your process safer and more efficient to realize maximum returns in long-term operations.

Complete drive systems to achieve high performance

Clean and reliable power: Integration in the electrical distribution systems with total management of power quality utilizing a passive and active filtering system.

Optimum application performance with complete multidrive solutions for process cranes, roller conveyors, vertical roller mills, and others; drives with embedded master slave control and real-time, Ethernet-based synchronization; seamless integration into Schneider Electric’s automation architecture.
The right drive for your
Mining, Minerals & Metals application

Altivar Process variable speed drive for Mining, Minerals & Metals

The Altivar Process variable speed drive is suitable for conveyors, stacker/re-claimers, and process cranes, providing enhanced motor control for improved energy efficiency and uptime.

High performance

- Greater motor reactivity and stability because of high torque and speed control capabilities and precise load sharing
- Pump applications controlled at best efficiency point (BEP) with condition-based monitoring
- Reduced mechanical stress on your systems thanks to protection against cavitation

Seamless integration in PlantStruxure architecture

- Smart process objects ready for collaborative engineering (engineering time reduced by 50%)
- Greater safety and cyber security thanks to compliance with the latest standards

Altivar Process: Available ranges

<table>
<thead>
<tr>
<th></th>
<th>ATV600</th>
<th>ATV900</th>
<th>Drive systems</th>
</tr>
</thead>
<tbody>
<tr>
<td>Power</td>
<td>0.75 – 315 kW</td>
<td>1 – 1500 kW</td>
<td></td>
</tr>
<tr>
<td>Voltage</td>
<td>200 – 400 – 690 V</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Protection degree</td>
<td>IP21 – IP55</td>
<td>IP21 – IP 23 – IP 54</td>
<td></td>
</tr>
<tr>
<td>Motor type</td>
<td>Induction, PM, reluctance motor</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Motor control type</td>
<td>Open loop</td>
<td>Closed loop or open loop</td>
<td></td>
</tr>
<tr>
<td>Braking</td>
<td>—</td>
<td>Braking resistor or regenerative drive</td>
<td></td>
</tr>
<tr>
<td>Environmental protection</td>
<td>3C3/3S3</td>
<td>3S3</td>
<td></td>
</tr>
<tr>
<td>Operating temperature</td>
<td>-15 °C – 50 °C</td>
<td>3C3/3S3</td>
<td>Applied to your application</td>
</tr>
<tr>
<td>THDI</td>
<td>THDI &lt; 48%</td>
<td>THDI &lt; 5%/THDI &lt; 48%</td>
<td></td>
</tr>
<tr>
<td>Embedded functions</td>
<td>Multipump</td>
<td>Master Slave (speed or torque) Load sharing</td>
<td>Engineered to order</td>
</tr>
</tbody>
</table>

- Energy savings > 25%
- Green and ethical materials — free of PVC, halogen, and conflict minerals
- Improved serviceability and reparability
- Increased recyclability: The product is now 80% recyclable
- Packaging reduced by 64%

Altivar Process is the first drive that makes the Industrial Internet of Things a reality.

Scan the code to find out more about Altivar Process.