A Mining Machinery Company PRECISION CALIBRATED MACHINE ACHIEVES HIGHEST LEVEL OF ACCURACY

CHALLENGE

Struggling with tight tolerance A mining machinery company uses sophisticated machine tools to manufacture and repair products for the mining industry. One of their Cincinnati Gilbert Horizontal Boring Mills (HBM) was struggling to perform tight tolerance work. Because of Konecranes Machine Tool Service's (MTS) experience with this equipment, they were able to use their preventive maintenance program to evaluate the situation, review findings in real time, make the necessary adjustments and confirm the results.

SOLUTION

Assessment and re-calibration

For the Cincinnati Gilbert HBM, Konecranes MTS performed a complete assessment of the machine's geometrical condition. After the machine was assessed, MTS Service Engineers used

Mahr Federal electronic levels to precision level the machine to exceed the original manufacturer's specifications for pitch and roll.

Konecranes MTS state of the art Renishaw ML10 interferometer laser system was used to calibrate the positioning accuracy of the machine. After the machine had been precision leveled and laser calibrated and a Renishaw ballbar had been run to confirm the results, the mining machinery company was able to confirm with their coordinate measuring machine substantial improvements in their product's quality.

RESULTS

Highest ever level of accuracy, beyond original specifications

After Konecranes MTS optimized the Cincinnati Gilbert HBM, it performed at the highest level of accuracy ever achieved in its lifetime. The improved machine repeatability and accuracy reduced set up time for parts by minimizing the necessary adjustments to accommodate the machine's geometry issues.





PRODUCTS & SERVICES



INDUSTRIAL CRANES: Konecranes is the industry benchmark for safety, reliability, cost saving and productivity-enhancing innovation. Standard and heavy duty cranes include electric overhead cranes up to 1,000+ tons and explosion-proof cranes and components. Workstation lifting systems feature enhanced material flow with ceiling-mounted monorails and free standing cranes systems, jib cranes and manual lifting products and electric chain hoist up to 7500 kg. Konecranes provides any lifting application in any industry.



NUCLEAR CRANES: With nearly a half century of nuclear crane experience Konecranes is the most seasoned supplier in the idustry. Our wide range of products are designed specifically for operation in nuclear applications and our quality control program ensures that each nuclear crane and component is designed, manufactured and installed to the demanding standards of the nuclear industry.



PORT AND PORTAL CRANES & SERVICE: Konecranes designs, manufactures, and delivers large cranes for ports, container terminals, intermodal terminals, shipyards and bulk material handling. We also provide expert maintenance and after-sale support as well as complete crane service worldwide for all types and makes of harbor and shipyard cranes.



HEAVY-DUTY LIFT TRUCKS: Konecranes is a world-leading manufacturer of lift trucks with lifting capacities of 10 to 80 tons. For over 50 years Konecranes has designed and customized trucks for the most demanding applications and continues to offer a wide range of trucks for customers in many different industries. Products include fork lifts, reach stackers, container handlers, and Roll-on Roll-off (RoRo) Trucks.



CRANE SERVICE: Konecranes provides an extensive range of services and unique capabilities dedicated to improving safety and helping your business decrease the cost of downtime and increase the productivity of uptime. We can service any brand of crane and hoist. As a leading global manufacturer with a 120-year history and the leading maintenance provider in the Americas and around the globe, Konecranes technicians understand what it takes to keep your equipment working at top performance.



MACHINE TOOL SERVICE: As a global leader in machine tool maintenance service, Konecranes offers world-class service on all makes and models of machine tool equipment. From maintenance programs to rebuild, remanufacture and retrofit, we have the knowledge and expertise required to keep your equipment running effectively and efficiently.



PARTS: Konecranes is the OEM for many of the best known brands of hoists and cranes as well as the largest single source supplier for parts of all makes. We have the most extensive inventory in the industry, as well as dedicated in-house parts manufacturing and extensive reverse engineering services to assist you with obsolete and/or not readily available parts. Our expert technicians are always available to help with field installation and support.



TRAINING: One of the easiest and most cost effective ways to improve safety and productivity while reducing maintenance costs is crane operator training. We can provide on-site training that is tailored to your needs, budget and schedule. In addition you will improve employee morale, generate good will and may reduce liability. We also offer courses at our Training Institutes in Milwaukee and Los Angeles as well as regional seminars in 40 cities per year.