

# ACCURATE Partnering Quality



# PRODUCT PORTFOLIO





www.accurategauging.com

# Making in India... for the World

Accurate is a pioneer in design, engineering and manufacturing of precision measuring instruments in India. Established in 1963, Accurate has evolved over 6 decades from providing basic measurement systems to being a leading indigenous manufacturer and preferred provider of a diverse range of world-class measuring solutions for the manufacturing industry.

With a state-of-the-art infrastructure developed over the past three decades, Accurate Gauging has accomplished the position of an expert, trusted source In offering sophisticated measuring instruments and services, with special focus on 3D Coordinate Measuring Machines (CMMs).

#### **OUR STRENGTHS**

#### GLOBAL TECHNOLOGY, LOCAL ADVANTAGE

We are proud to 'Make in India' and serve our customers globally by partnering in the pursuit for Quality in manufacturing. We are also passionate about taking up local challenges to provide relevant, cost-effective and indigenous solutions.

Our independent and versatile measurement capabilities, continue to be instrumental in India's progress towards becoming a recognised manufacturing hub.

#### STATE-OF-THE-ART INFRASTRUCTURE

Accurate is amongst the few notable companies in the world with vertically integrated manufacturing facilities from processing Granites for high-dimensional stability machines, to application software, our processes combine best-in-the-class practices with proven skills. We strive to constantly innovate precision equipment and solutions delivery for several high-in-demand customers.

#### END-TO-END CAPABILITIES

At Accurate Gauging, we make every component and instrument in-house; from preparing an inspection plan, to designing, engineering and manufacturing a solution. We bring the best value for our customers with years of experience and understanding of complex measurement tasks.

With innovation and intelligence at the fore; along with a strong, driven and talented team, we are known amongst international players and export to advanced countries.

#### DESIGN

Our dedicated team of engineers are mentored by international experts with decades of experience in advanced design and simulation tools, to create state-of-the-art solutions to address our customers' measurement challenges.





#### MANUFACTURING

A manufacturing structure allows us to handcraft our own high dimensionalstability granite bases and guideways to the highest precision, as well as make our own key parts, such as air bearings through advanced micro-machining processes.



#### SYSTEM INTEGRATION

We have proven expertise in integrating various measuring solutions & sensors together with a load-unload system and part-loading fixtures for inline production. We also augment our machines with task specific application softwares to help our customers get the most efficient application.

#### TURNKEY PROJECTS

We undertake turnkey projects including preparation of the foundation, part load-unload systems and the environmental room for appropriate installation of machines on your shop floor. We help our customers maximise their measuring system capability by supporting fixturing of the parts and load-unload system.

#### CALIBRATION

Our accredited laboratories under ISO/IEC 17025 provide gauge calibration and part inspection services throughout key industrial centers. Advanced calibration artifacts enable our technicians to maintain traceability of our customers' measuring machines at par with international standards.

#### THIRD PARTY MEASUREMENT SERVICES

Our trained quality technicians provide you third-party onsite services to monitor incoming or outgoing quality of your machine parts using advanced QMS solutions. Our AUKOM certified CMM programmers can assist in preparing CMM part programs in advance for use on any make of CMM.

#### TRAINING

Our skill development academy offers training programs for operators and engineers in various areas of quality – MSA, SPC, GD&T as well as equipment specific AUKOM training for CMMs.

#### QUALITY 4.0

We help you take corrective actions based on Real time data on the shopfloor. Our solutions are industry 4.0 ready. Together with our technology partners we provide advanced capabilities for Edge processing on the machine as well as built traceability in every measurement operation. Accurate ploneered the manufacture of CMM's in India. A state of art design coupled to high precision mechanical accuracies of our machines provide a perfect solution for application in the Automotive, Railways, Aerospace, Defence, Power, Medical, Education and General Engineering industry segment.

# **SPECTRA**

Innovative series with power packed features for 3D measurement of small parts as well as for training purpose. Designed for ease of operation and safety ensuring optimum performance.

#### Feature

- Proven design with all granite construction for stable performance, Wrap around air bearing construction for high acceleration and stability.
- Zero hysteresis belt drive for srnooth repeatable movement
- X & Z axes guide ways made hollow reducing mass to achieve high acceleration
- In built Y axis for better homogeneity of material
- · High resolution reader Head for better accuracy



Model	Spectra	
Measuring range X axis	500 - 800mm	
Y axis	600 - 1500mm	
Z axis	400 - <b>6</b> 00 mm	
Mode of operation	CNC	
Nax. Workpiece weight (kg)	250-500	
Accuracy MPE,	2.2 + L / 350	
(as per ISO 10360 - 2 in µm)	1.9 ÷ L / 350*	
Resolution (in µm)	0,5 / 0.1	
Guideway	Air bearings on all axes	
Linear Velocity	400 mm/s	
Volumetric Velocity	700 mm/s	
Measuring table (klaterial)	Granite	
Probing option	TP 20, TP200, SP 25M, Laser scanner	
Probe heads	MH20, MH20i, MH8, MIH, PH10, PH20	

<sup>\*</sup> Custom built range.

<sup>\*</sup> Enhanced accuracies in Spectra Models

# CORDIMESUR



#### Feature

- · All granite guide ways ensuring uniform thermal stability
- · Pre-loaded air bearings to ensure proper griping
- · In built Y axis for better homogeneity of material
- · Toothed belt drive inducing zero hysteresis
- · High resolution read head for better accuracy

Model		Cordimesur
Measuring range (mm)	X axis	1000
	Y axis	1500-2500
	Z axis	800
Mode of operation		CNC
Clearance under bridge (m	m)	750
Max. Workpiece weight (kg	1)	800
Accuracy MPE <sub>t</sub>		2.5 + L / 350
(as per ISO 10360-2 in µm)		1.9 + L./ 350*
Resolution (in µm)		0.5/ 0.1
Guideway		Air bearings on all axes
Linear Velocity		400 mm/s
Volumetric Velocity (3D)		692mm/s
Measuring table (Material)		Granite
Probing option		TP 20, TP200,SP 25M, Revo, Laser scanner
Probe heads		MH8, MIH, PH10, PH20, SP80

Custom built range.
 Enhanced accuracies in Cordimesur Models

# MEGA

Large measuring range bridge type CMM. Using special techniques for machining and grinding of the granite guides, we are able to achieve accelerations similar to lighter construction machines with further benefit of naturally stabilised material.



Model			Mega
Measuring range (mm)	X axis	1200	1500-1700
	Y axis	1500-2500	2500-4200
	Z axis	1000	1200-1500
Mode of operation		CN	C
Clearance under bridge	(mm)	950	1600
Max. Workpiece Weight	(kg)	1000	4000
Accuracy MPE,		2.5 + L / 350	3.5 + L / 350
(as per ISO 10360 - 2 in µm	n)	2.2 + L / 350°	3.0 + L / 350
Resolution (in µm)		0.5/	0.1
Guidetray		Air bearing	s on all axes
Linear Velocity		350 mm/s	300 mm/s
Volumetric Velocity (3D)		600 mm/s	520 mm/s
Measuring table (Material	0	Gra	inite
Probing option		TP 20, TP200,\$P 25N	1, Revo, Laser scanner
Probe heads		MH8, MIH, PH	10, PH20, SP80

Custom built range.
 Enhanced accuracles in Mega Models

# ACCORD



#### Gantry CMM

- · For inspection of large components with high accuracy performance
- · Open Access Structure enable easy inspection of large scale parts
- · High precision Air Bearings in all axes
- · Zero hysteresis drive in all axes
- Can be interfaced with rail system for loading and unloading of large components





Model		Accord
Messuring range (mm)	X axis	2000 - 3000 mm
	Y axis	3000 - 8000 mm
	Zaxis	1500 - 2000 mm
Mode of operation		CNC
Accuracy MPE <sub>s</sub> (Asper ISO 10060-2)		5 + L/200*
Resolution		0.1 µm
Linear Velocity		250 mm/s
Volumetria Velocity (3D)		430 mm/s

<sup>\*</sup> Custom built range.

<sup>\*</sup> Enhanced accuracies with high accuracy probing options.



#### Features

ATAL

- Designed for use in Modern shop floor for Inline or near line measurement solution.
- · Elevated Bridge
- · All Granite construction
- · Small foot print.
- · Light weight and Stable Mechanical construction of Machine.
- · Designed to work with Robotic/ automatic load unload systems.
- · Linear motion Guides in all axes, ensures longer life.
- · Thermally inherent Scale for shop floor environment
- · Automatic Temperature compensation.
- · Touch trigger/ Continuous scanning/ Laser probing options/5 axis Probing
- · Plug & Play Installation.
- · Easy to relocate on shop floor
- . Industry 4.0 ready: OEE, Alerts, SPC display.

# **Technical Specifications**

Model		Ammax
Measuring range (mm)	X axis Y axis Z axis	500 mm 500 mm 400 mm
Mode of operation		CNC
Accuracy MPE <sub>e</sub> As per ISO 10360-2)		2.2 + L/300 µm 2.4 + L/300 µm

Compatible with Scanning and Touch Trigger probing systems

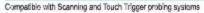




#### Features

- · Designed for use in Modern shop floor.
- Industry 4.0 ready: OEE, Alerts, SPC display. IPC can be added feature.
- Touch trigger/ Continuous scanning/ Laser probing options.
- Designed to work with Robotic/ PLC integration of automatic load unload systems, Flexible 3 Way Accessibility.
- . Linear motion (LM) Guides in ALL 3 axes.
- . Extra 200 MM provision in Z axis for part holding fixtures.
- . Max part weight 200 Kgs.
- · Automatic Temperature compensation.
- . First ever 5 Axis Probing Shop Floor CMM.
- Flexible change racks for automated changing of scanning and touchtrigger modules.
- · Inline or near line measurement solution.
- · Robust scale for shop floor Environment.
- · Plug & Play Installation.
- · Small foot print

Model		Annmax
Measuring range (mm)	X axis Y axis	700 mm 600 mm
Mode of operation	Zaxis	500 mm CNC
Accuracy MIPE <sub>s</sub>		2.5 + L/300 µm
Resolution		0.1 µm
Guldeway		Linear Guide ways





# SEAGULL



#### Feature

- Shop floor environment operation
- Available in single or double machine configuration
- High precision linear guide ways in all axis
- New generation composite material in Y axis reducing droop of arm
- Advance spring balance system for Z axis counter balancing



Model		Seagull
Measuring range (mm)	X axis Y axis Z axis	2000 - 10000 mm 1200 - 3500 mm 1600 - 2500 mm
Mode of operation	Z. BXIS	Motorised / CNC
Accuracy MFE <sub>e</sub> * (As per ISO 10360-2) Single Am		25 + L / 50 µm ≤ 75 µm
Resolution		0.5 µm
Guideway		Linear Guideways
Max. 3D Pos. Speed		700 mm/sec

<sup>\*</sup> Custom built range.

<sup>&</sup>quot; Enhanced accuracies with high accuracy probing options.

# **ACCUFLEX**

Portable articulated arms CMM, ideal for quick and accurate inspection of parts within its range on shop floor environment. Accuflex EXPLORER to measure large volume in Range 5m to 9m High accuracy Accuflex Plus models

#### Wide Range

1800mm 2500mm 3200mm 4000mm 5000mm 7000mm 9000mm

#### Feature

- Portable articulated Arm
- · 6 axis or 7 axis configuration
- · Counter balance System
- · Preset for interchangeable probes
- Certification as per ISO 10360-2/ B89.4.22
- Flexibility for use of Touch Trigger Probe, Floating Probe, Laser Scanner & Laser Forks
- · Ideal CMM for reverse engineering & tube



#### Applications

Automotive Sector: Part Inspection, Alignment, Tool Building & Certification

Aerospace Sector: Part Inspection, Tooling & Mold Certification, Alignment

Mold & Die Sector: Prototype Scanning, Mold and Die Inspection

Metal Fabrication Sector: Periodic Part Inspection, First article
inspection



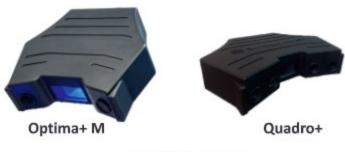




Model	8	Accuf	ox plus	
Measuring range (mm)	1800	2500	3200	4000
Point Repeatability (mm)	0.012	0.016	0.020	0.024
Volumetric Accuracy (mm)	0.020	0.026	0.036	0.046

# EVISCAN

# The Blue Structured Light Optical Scanner





**Fine Precision** 

#### Feature

- · Non-contact data capturing capability
- · Full field measurement with deviation thermal colour plot
- · High speed data processing.
- · Universal scanning range
- · Faster measurement and analysis
- · Easy integration with Robots and Cobots
- · Compact and Portable design

	Optima+ M	Quadro +	Fine Precision
Light source type	Blue LED	Blue LED	Blue LED
Number and type of cameras	2 x 7 Mpix	2 x 12 &2 x 9 Mpix	2 x 8.9 Mplx
Scanning accuracy according to DE VDI/VDE2634 Part 2, 4.1 F	up to 0.009 mm	up to 0.007 mm	up to 0.006 mm
Scanning time	1.2 second	1.2 second	1 second
Measuring range	320x190x120mm	Inner:220x160x90mm Outer:450x225x180mm	120 x 60 x 32 mm
Points density	117 pi/mm2	Inner: 351 pt/mm2 Outer: 88 pt/mm2	1 233 pi/mm2
Computer connection		USB 3.0	
Export formats		sil, ply, obj, asc, bin	
Hardgrare requirements	Window	s 10 (64 bil), 32 GB RAM	CPU I7
Software		eviXscan 3D Suile	

# **ACCU TRACK 3D**



#### Features

- Flexible & Mobile 3D Tracking and Measuring System
- . Easy to Install & Start-Up
- · Plug & Play Measurement Software
- · No Regular Calibration Required
- Software Tool for on-Site Probe Calibration Correction



#### OPTIME



#### Features

- · Fast, accurate and flexible.
- Optical measurement systems based on stereo vision and Photogrammetry with highresolution digital cameras.



- . Designed for surface Scanning and Reverse Engineering.
- From Object to CAD model. Million points are acquired in few seconds. Possible to use "passive" mode for edge, holes and slots detection.

Models : Small range for scanning area upto 1000mm Large Range for scanning area upto 2500mm

Options: Tripod or Robotic Mounted

#### **Technical Specifications**

Technical Data	OptiMe	
Carnera Resolution	5 Mplxel	
Nominal Working Distance	800-1000mm (customizable)	
Nominal Working Area	700 X 1000mm (customizable)	
Points Cloud	5 Msample	
Accuracy	0.02-0.1mm	
Dimensions	505 X 220 X 105 mm	
Weight	4.5 kg	
Operating System	Windows 10 or 11	

Applications: Composite, Plastic, Automobile & Aerospace

# AIM



#### Feature

- · Multisensor Measuring Machine
- · High Intrinsic Mechanical Accuracy
- · Modular and replaceable Sensor System
- · Precision Drives and Sensors
- · State of Art Image Processing Technology
- · Multisensor Technology Includes Touch Trigger, Laser and Camera
- · Light Source White LED
- · User Friendly CAD based Software







Model		AIM
Measuring range (mm)	X axis Y axis Z axis	300-500 mm 300-500 mm 200-300 mm
Mode of operation		CNC
Accuracy MPE, * (46 per ISO 10360-2)		1.9 + L/250 mm
Resolution		0.1 µm
Guideway		CNC
Max. 3D Pos. Speed		200 mm/sec

# **VERTICAL PROFILE PROJECTOR**

Screen diameter: 300 mm

Measuring Traverse: 200 mm x 100 mm Measuring accuracy: 3 + L/100 microns

Work piece load capacity: 20 kg

Max. Diameter: 150mm

Standard: 10x Tele centric lens

With fibre optic cables

Overlay Charts



# HORIZONTAL PROFILE PROJECTOR

Screen diameter: 400 mm

Measuring Traverse: 250 mm x 150 mm Measuring accuracy: 3 + L/100 microns

Work piece load capacity: 40 kg

Max. Diameter: 175mm

Standard: 10x Tele centric lens

With fibre optic cables

Overlay Charts

Set of V Block with clamps

Tilting Support



#### VIDEO MEASURING MACHINE

Designed to facilitate fast and accurate measurement of mechanical parts, plastic injection moulding parts, electronic devices, dies and moulds.

CNC model has 3D video measuring capability with motorized X, Y & Z movement and motorized zoom lens Z axis measurement and auto focus are standard

features



# **MEASURING SOFTWARE**

Software for reliable measurement in three dimensions, simple to use and easily upgraded. The software packages are available for wide range of measuring applications. The software options for Geometrical Measurement, CAD Comparison and Reverse Engineering Applications.

An advanced measuring system is completely integrated with a powerful CAD engine.

#### Prismatic Part Measurement





Sheet Metal Measurement



- · Import of native CAD formats.
- Group management.
- Extracting geometrical elements from CAD.
- · Inspection Path programming
- · Alignment on free forms.
- Measuring surface edges in real time.
- · Measuring and creating profiles.
- · Optimisation of an existing reference.
- · Graphical outputs
- · Implementation of the native DMIS language
- · Total solution for both prismatic and free form measurement
- Geometrical engine supporting neutral IGES format or native CAD inter aces.
- · Powerful solution for single and dual arm CMM
- Integrated with articulated arms
- · CNC controller and measuring instruments
- · Offline graphical programming tools with simulation on the program
- Complete GD & T. geometric dimension and tolerances, as per ASME Y14.5 M 1994
- I\*compliant & PTB Certified algorithm
- · Gear and Turbine Blade Measurement
- · Complete compensation of the CMM errors
- · Textual, Graphical and statistical output





CAD Comparison







# MODULAR FIXTURING

## Modular Fixturing for Child Parts/ Sub Assemblies

- · Quick configuration and construction of a fixture.
- · The ability to reuse the fixture elements in future projects.
- The fixtures can be supplied with software packages for design & validation.
- · Prototype & initial sample inspection.
- · Production control in connection with CMM.
- · Prototype welding.

AccuFix system for small and medium parts support on 3D Coordinate Measuring Machines.







# FIXTURES FOR SHEET METALS, TRIMS, UNDERBODY AND GLASS



Raster Plate on Air Bearing

Front End Module Checking Fixture



Taligate Glass



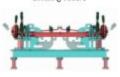
Complete Assy. Cross Member



Assembly Front Wiper Functioning Checking Fixture



Assembly Twist Beam Checking Fixture



Assembly Fuel Filler Nerk Checking Enture



Assembly Front Glass Aperture Checking Fixture



Assembly Strut Checking Fixture



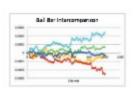
# CALIBRATION MASTERS

#### Check Master

- Step Gauge in range 300/450/600/1000 mm.
- · Measuring steps of 10 mm.
- Measurement Uncertainty of calibration (1+1.5 X 10-6L) Microns.
- \*\*\*\*\*\*\*\*\* Optional swiveling stand for positioning step gauge in CMM calibration.
- · Optional software Cal-Check 1.0 for CMM calibration.

#### Segmented Ball

- Comply with ISO 10360 2 to verify 66% of maximum extension of CMM Measuring volume
- Verification of Bridge type & Horizontal Dual Arm CMM
- Solution for CMM with axis length between 3 m & 15 m
- · Reference can be assembled & disassembled without losing





#### Quick Check Tetrahedron

- · For rapid geometric accuracy checking of CMM
- The expanded uncertainty  $U = 0.20 \mu m + 0.50 \mu m * L/m$ .
- · Available for different sizes of CMM with Tactile and multisensor and for tomography System



#### Reticules for Calibration

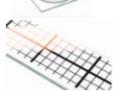
Calibration gratings, photomasks, Test Target and Collimators for the following applications.

Aerospatial, Microscopy, Optical Vision, Optoelectronics, Electronic industry, Biomedic and Lifesclence, Sports and Defence, Metrology, Geodesic, High resolutions display units, Optic systems

#### Features:

- Pattern Accuracy: +- 0.001 mm
- Minimum Pattern dimensions: 0.002 mm
- The target produced on a variety of substrate (glass/ quartz/ steel/ Opal etc.) with different possible surface treatment





# METROLOGY & QUALITY CONTROL EQUIPMENTS



# For Engineering & Technical Institutes

#### Feature

- · Precision Measuring Instruments and 3D CMM
- Support for the college capital measuring equipment of for next 5 years
- Free training to college instructors for Precision measuring instruments and 3D CMM
- · Calibration of instruments by our NABL certified lab
- MSBTE Training Program
- · Industrial Visits & Placement Support



FLOATING CARRIAGE MICROMETER



MEASURING PIN SET



DIAL CALIBRATION TESTER



3 WIRE MEASURING SET



STEEL GAUGE BLOCKS



DIAL SNAP GAUGE



CARBIDE GAUGE BLOCKS



ADJUSTABLE SNAP GAUGE

#### **AIR GAUGES**

#### E TYPE

**Null balance Pressure Indication** 



Range +/- 0.010 mm +/- 0.020 mm +/- 0.040 mm Least Range 0.00025 mm 0.0005 mm 0.001 mm

#### C TYPE

Differential back pressure sensing



# AIR / ELECTRONIC COLUMN GAUGE

- . Measures ID & OD diameter, straightness, Squareness and Taper
- · 4 Rows 3 Color bar, Graphic Color LCD
- Resolution 0.1/2/4/10/40 μm
- · Various measuring modes & histogram.
- . (+, -, average, max-mm)
- RS232c communication >1/0 interface



#### DIGITAL DISPLAY UNIT

- · 16 channel color TFT LCD type & touch panel.
- Various measuring modes & histogram.
   (+, -, average, max-mm)
- · High resolution | High reliability.
- RS232C output, I/O interface.
- · SD memory (option)



# MULTI-CHANNEL DISPLAY UNIT

- · 1-32ch electronic Display Unit
- · Measures height, thickness, inside/outside diameter, flatness,
- Various calculation modes (+, -, x, /, avg, max, mm M-m)
- · High resolution & reliability
- · PLC interface
- RS232c communication
- I/O interface
- EEPROM parameter backup



#### WIRELESS MECHANICAL BORE GAUGE

- Wireless (Bluetooth) portable bore gauge.
- Realtime value checking by 2" color TFT LCD.
- 1µm resolution
- ±0.3µm repeatability.
- Built-in Li-polymer rechargeable battery.
- · Strong at contamination.



#### **CUSTOM GAUGING SOLUTIONS**

- Accurate offers custom design & built solutions for measurement of high volume parts in production.
- Combining various sensor options like LVDT, Eddy current, Optical sensors and Camera, our solutions provide precision with through put.



### Applications

- Connecting Rod
- Gears
- Ammunition Cartridge
- Gear Housing
   Armament Shell
   Crank Shaft
- · Cylinder head
- Bearings
- · Cylinder Block
- Piston

Gear Box Housing Shim Selection



Crankcase Measuring Machine



Brake Disc Measuring Machine



Auto Gauging System for Rail wheel axie



Camshaft Measuring Machine



Crankshaft Measurement with True Roundness and Harmonic Analysis



Auto Gauging, Sorting and Packing Systems MWW Caps



Auto Gauging, System for Barrel Bore



Auto Gauging, System for Measuring Gear Play in Synchromesh Gear Box

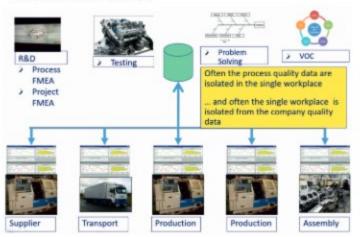
# IIoT



#### Features

- · Web-based Digital Quality 4.0 Platform.
- Tablet/Desktop based measured data collection.
- · Digital interface to devices like Vernier, Laser based gadgets.
- Wireless transmission of measurement data from devices.
- · Eliminate manual intervention, hence eliminate errors and omissions.
- · Condition based monitoring to initiate actions in real time.
- Customised Reports/ dashboards and SMS/Email Alerts

#### Connection of Real-time Data



# THIRD PARTY INSPECTION SERVICES

- · Firewall at Final Inspection Stage to insulate the defectives
- · Receipt, In process Pre-dispatch Inspection, Dock Audit.
- · Segregation of Inspected Parts and Containment Actions.
- · Rework and Re-Inspection after rework.
- Root Cause Analysis for defects observed at Customer End in the vendor supplies.
- · 8 D reports on defect elimination.
- · PPAP at the vendors.
- · Product / Process audits: In house or at your Supplier End.
- · Remote Vendor Quality Management.
- · Provide Smart Metrology solutions (SMS) for all shop floor needs.
- Provide Guidance and Consultation for all types of Quality Management needs.
- · CMM & Operations.





# SMART METROLOGY SOLUTION (SMS)

#### Designed to Integrate Real Time Intelligence in Manufacturing for Industry 4.0

Manufacturing is experiencing a digital revolution. With the technologies driving Industry 4.0- IIoT, AI, and cloud at the forefront — manufacturing has reached a critical tipping point.

Accurate SMS is a true Quality 4.0 solution platform developed ground-up with the needs and requirements of the manufacturing processes in mind. A very robust and scalable platform, it has digital Interface to field devices and other industrial assets to generate rich visualization and analytics.

#### Feature

#### PAPERLESS Q 4.0

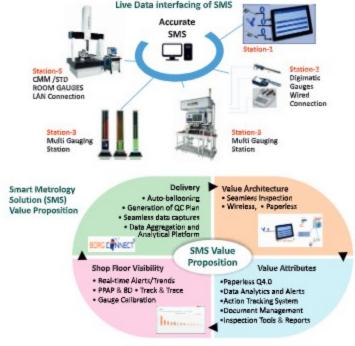
 Wireless Interface with Instruments • Eliminate Manual Errors and Omission • E Capture • Paperless Digital Platform Accessible anytime

#### DATA ANALYTICS AND ALERTS

 E Alerts and Dashboards • On Board Analytics for real Time Information • Condition based monitoring

#### ACTION TRACKING SYSTEM

- IOT Gateway and server management Manage Corrective action Plans • Responsibility Assignment and escalation
- Real time Status / Closure and tracking



# TRAINING & CONSULTANCY

- Training as well as services in the area of dimensional measurement for Measurement System Analysis
- Evaluation of Measurement uncertainties.
- Consultancy services for NABL accreditation





- Hands on Operation
- Understanding GD & T
- Correlation establishment on various CMM Makes



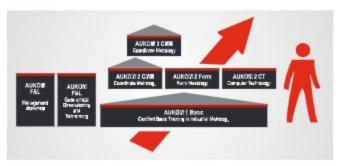
Training session for Customers

# CMM OPERATOR TRAINING AND CERTIFICATION

Certified Partner For

- The objective of the training program from "AusbildungKoordingatenmesstechnik e. V - Aukom" is to ensure up to date, comparable, controllable and certificate training in coordinate metrology in accordance with its capabilities.
- The training develops, promotes and spreads the good measurement practices in CMM and furthers the Globalization of cooperation in coordinate Metrology Training.
- The program is meant for production Metrologists to improve their CMM knowledge for improving the reliability of measurement result and make it easier for right decisions.
- It also help in cutting down time and cost for delivering globally comparable measurement results.

# Cross-Vendor Device-Independent & Tailored Training Coordinate Metrology



## **ACCREDITED CALIBRATION SERVICES**



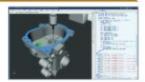
calibration and part inspection from its various locations in India. These facilities are accredited by NABL.

All calibration laboratories are well equipped to cater to Quality Management Systems as laid down by ISO 9000/QS 9000, TS 16949 etc. for gauge calibration and comply to ISO/IEC 17025 Quality standards.

Accurate is operating a network of NABL accredited calibration laboratories at Pune, Coimbatore, Chennal, Bangalore, Gurgaon, Nasik and Pantnagar for Instruments and Gauges in Linear Dimensional measurements and provides Gauge Management for OEM's and their suppliers using Database Management solutions

#### OFFLINE CMM PROGRAMMING SERVICES

Offline programming services in DMIS format to suit various software that are compatible with other CMM makes.



#### Feature

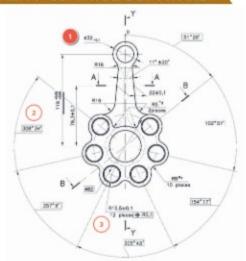
- Availability of different popular CMM software for offline programming
- · Virtual DMIS, Rational DMIS, Arcocad, Polyworks, Power Inspect etc.
- · Native DMIS programming
- · Native CAD Import option for programming
- Catia V4/V5, Unigraphics, ProE, Solid work, IGES, STEP
- Powerful Workstation with Nvidia Quadro graphics to handle big size CAD model for programming
- Well Documentation for generation of tabulated Report as per customised requirement
- · Pre plan of offline programming during manufacturing of part to get

# **CRIBWISE**

#### INVENTORY MANAGEMENT AND LOGISTICS FOR TODAY'S HIGH-TECH INDUSTRIES



# MANUFACTURING QUALITY CONTROL SOFTWARE



Speed-up Quality Control tasks from Drawing Ballooning and QC Plan Creation through Inspection Data Collection, Analysis and Reporting to prevent defects.

#### Features

- · PDF Drawing Auto-Ballooning
- · Quality Control Plans
- First Article Inspection, As9102
- CMM Data Import
- . Incoming / Receiving/
- In-Process / Final Inspection
- · Process Capability Cpk, Ppk
- · SPC (Process Control)
- · Factory Defect Risk Monitoring
- Traceability
- · NCRs, CAPAs, SCARs
- Gage Calibration





#### Some of our valued customers



#### All Trademarks Acknowledged



# Sales & Services

# ACCURATE SALES & SERVICES PVT. LTD.

Gauge House, 67, Hadapsar Industrial Estate, Pune - 411 013. India. Tel.: +91-20-6603 9000/ 6603 9211 Fax: +91-20-2681 4234

Email: sales@accuratesales.co.in | Web.: www.accurategauging.com