

NEW PRODUCT PREVIEW

A SAMPLE OF NEW PRODUCTS
SET TO DEBUT AT FABTECH 2019

CHICAGO
NOV 11-14

REGISTER TODAY
FABTECHEXPO.COM



NORTH AMERICA'S LARGEST METAL FORMING,
FABRICATING, WELDING AND FINISHING EVENT



Thank You to Our Platinum Sponsors



Thin-To-Thick. No Setup.

Continuous processing of thin materials and thick plate without a cutting lens change or manual setup.

AMADA's ENSIS fiber laser technology utilizes a proprietary and highly-innovative resonator to automatically change the beam mode to accommodate whatever material and thickness being processed. Now, the latest evolution adds another dimension with an innovative collimation system to automatically control beam diameter and beam configuration for unprecedented productivity.

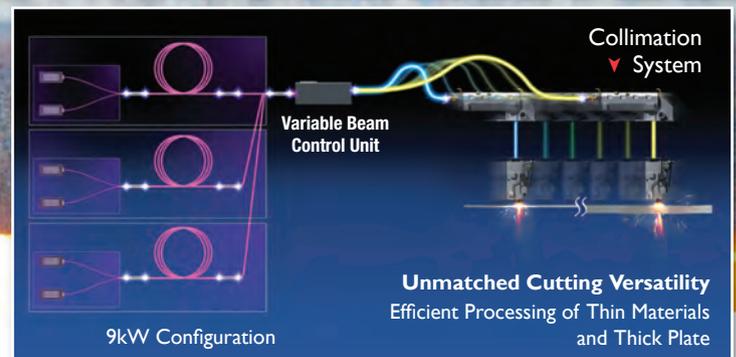
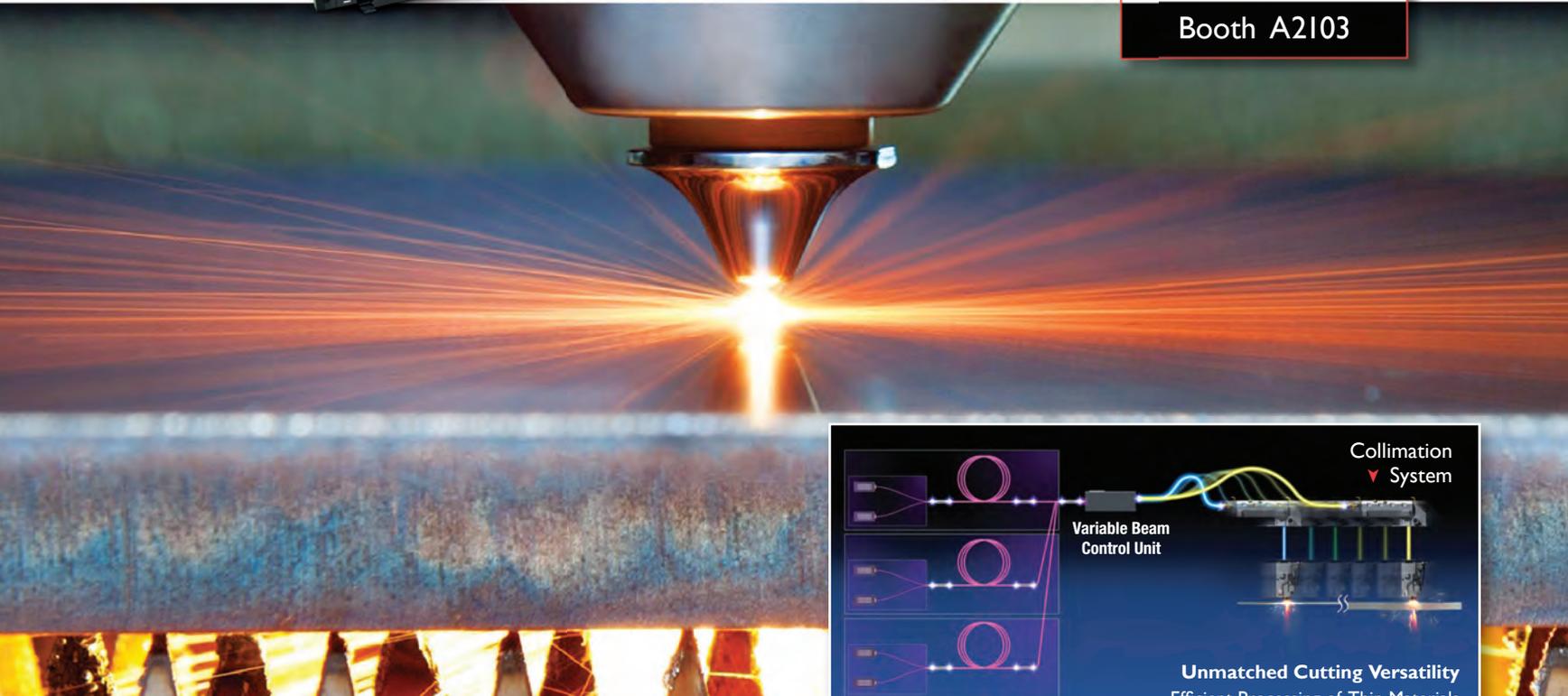
To keep pace with the unmatched power and productivity of the ENSIS Series, it's essential to pair it with automated material handling such as the AMS 3015 CL (Cycle Loader). Designed and built in Brea, California, the AMS CL's modular design allows fabricators to easily expand their automation capabilities as future needs evolve.



ENSIS 3015 Fiber Laser
with AMS 3015 CL

Key Evolution Factors:

- Now available in 6kW and 9kW
- Addition of collimation system expands ENSIS cut quality and capabilities
- Collimation mechanism does not limit access to cutting lens or head maintenance
- Infinite mode and diameter control combination is an industry first
- 1-second clean pierce in 1" plate
- Up to a 66% reduction in process time when compared to conventional fiber lasers at the same wattage



AMADA's new Collimation System provides infinite mode and diameter control combinations — **AN INDUSTRY FIRST.**

AMADA[®]
AMADA AMERICA, INC.
180 Amada Court • Schaumburg, IL 60173
www.amada.com/america
877-262-3287

To learn more about how you can leverage ENSIS technology to achieve unprecedented productivity, contact AMADA today.

Stay In Touch With What's Next.



TECHNOLOGY & INNOVATION TO TRANSFORM YOUR BUSINESS

See, touch and discover the latest technology and innovation you need to transform your business at FABTECH 2019. Explore aisle after aisle of new product launches and equipment demonstrations. Network with peers, learn from the pros, and gain insights that will change the game for your career and business.

REGISTER TO ATTEND TODAY AT FABTECHEXPO.COM

LEARN Gain valuable, can't-miss insights from best-in-class education and training programs that target technical, lean, operational, and managerial segments.

CONNECT Visionary keynotes, expert panels, and other special events allow attendees to network with peers, exchange best practices, and learn about the latest industry advancements.

COMPARE Discover advanced technologies that improve quality and productivity and compare innovative solutions from more than 1,700 exhibitors side-by-side.

FABTECH 2019 FEATURES

- 1,700+ EXHIBITORS
- KEYNOTE SPEAKERS
- 170+ EDUCATIONAL PROGRAMS AND WORKSHOPS
- PRODUCT DEMONSTRATIONS
- 500+ NEW PRODUCTS
- EXPERT-LED DISCUSSIONS

McCORMICK PLACE

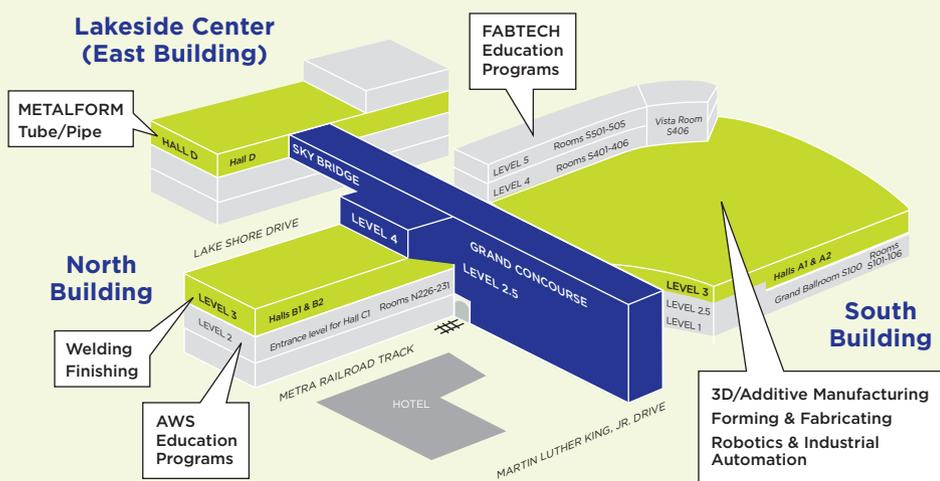


TABLE OF CONTENTS

General Show Information	3
Hotel & Travel	4
Exhibitor List	6-9
New Products	10-34
Additive Manufacturing	10
Arc Welding	10-12
Assembly	12
Automation	12
Bending/Forming	12-14
Coil Processing	14
Cutting	14-16
Finishing	16-17
Inspection & Testing	17-18
Lasers	18-20
Lubrication	21
Machining/EDM	21
Maintenance & Repair	21
Material Handling/Marking	22
Other Machinery/Equipment/ Parts/Products	22-26
Plate & Structural Fabricating	26
Press Brakes	26-27
Punching	28
Robotics	28
Safety & Environmental	28
Saws & Cut-off Machines	28
Software & Machine Controls	30
Stamping	30-31
Tool & Die	31
Tooling	31
Tube & Pipe Fabricating or Welding	31-32
Tube & Pipe Producing	32
Waterjet	33
Welding Consumables	33
Welding Machines/Equipment	33-34
Special Events	38-41
Pricing Chart	42
Education Program Schedule-At-A-Glance	43-46



START PLANNING TODAY!

DESTINATION CHICAGO

Chicago has something for everyone. From world-class museums, parks, and amazing architecture to shopping on the Magnificent Mile, a wide range of dining options, and much more!

SHOW ADMISSION

Exhibit-only attendance is FREE if you register by November 8, 2019. Beginning November 9, the cost to attend the exhibits is \$50. AWS, FMA, SME, PMA and CCAI members may always attend the exhibits for FREE with a valid member card.

HOW TO REGISTER

Register today at fabtechexpo.com.



GET THE BEST HOTEL SELECTION AND SAVINGS

Book your stay through onPeak, FABTECH's Official Hotel Provider, for guaranteed lowest rates and big benefits — including complimentary shuttle service, hotel parking and no booking or service fees! Reserve your rooms early for the best selection and price — hotels sell out quickly.

Visit fabtechexpo.com/hotels.

SHOW HOURS

Monday, Nov. 11

10:00 AM*–6:00 PM

Tuesday, Nov. 12

9:00 AM–5:00 PM

Wednesday, Nov. 13

9:00 AM–5:00 PM

Thursday, Nov. 14

9:00 AM–3:00 PM

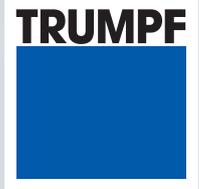
**EAST BUILDING (LAKESIDE CENTER)
OPENS AT 9 AM*

DOWNLOAD THE FABTECH MOBILE APP

Download the FABTECH app to access show info on the go — exhibitor lists, a floor plan, sessions, agenda planner and more at fabtechexpo.com/mobile-app.



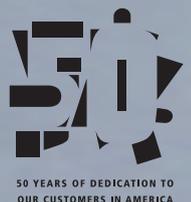
Sponsored By: 



For High Productivity Bending of Small and Medium Size Parts
Put Your Confidence in TRUMPF
The new TruBend 7050

The fastest just got bigger. The new TruBend 7050 from TRUMPF integrates the ergonomic and performance features of the well-known TruBend 7036 onto a platform with 55 tons of bending force and 60 inches of bed length. Now precision production bending reaches an even wider range of parts. And it doesn't stop there - just some of the additional enhancements include doubling of the ram acceleration, integration of ACB and the award-winning touchpoint control. Don't just bend, bend more. Put your confidence in TRUMPF – Together we can build your success.

See the TruBend 7050 at FABTECH Booth A2904 / www.trumpf.com



EXHIBITOR LIST (as of 8/22/19)

3D/ADDITIVE MANUFACTURING

3D Metal Printing Magazine
3DXTech
AddUp Inc
Alpha Laser US
Altair Engineering Inc
ASM International
Baker Industries
BigRep America Inc
Bluestreak | Bright AM
BMF Material Technology Inc
CIDEAS Inc
Cimquest Inc
Cincinnati Inc
Creatorm
Desktop Metal
EnvisionTEC Inc
EWI
ExOne Company
FilamentPM
Formlabs
Fraunhofer USA Center for Laser Applications
FreePoint Technologies Inc
Fusion3
Geneva Capital LLC
Gentec Electro-Optics Inc
GKN Additive
Globe Metal
Graphiccast Inc
Han's Laser Smart Equipment Group
HP
InnovMetric Software Inc
Laserline Inc
LillyWorks Inc
MakerBot 3D Printers
Markforged
Matterhackers
Met-L-Flo Inc
MicroCare Corporation
Microtek Finishing LLC
New Imaging Technologies
Oak Ridge National Laboratory
Paperless Parts Inc
ProManage
Protolabs
Raise3D
Sanken Industry Co. Ltd.
Shenzhen Industrial Man Rapid Prototyping & Manufacturing Co
Shining 3D
Siemens Industry Inc
Smart Manufacturing Hub
Stacker LLC
Stratasys
SuNPc Prototype
Tethon 3D
The Additive Report
Trak Machine Tools
Ultimaker
Venton
Xact Metal
Xometry

FINISHING

Accudraft Paint Booths
Accu-Labs Inc
ACT Dust Collectors
ACT Test Panels LLC
ADF Systems Ltd
AEREM – The Andreae filters
AFC Finishing Systems / Airblast AFC
AkzoNobel Powder Coatings
Alconox
Alliance Manufacturing Inc
American Industrial Sales LLC
Amiberica Inc
ANAEROBIA
APEL International
Argon Masking Corp
Atotech USA LLC
Axalta Coating Systems
AZZ Metal Coatings
Baril Coatings USA
Bayco by Guspro Inc
BCI Surface Technologies (Bulk Chemicals Inc)
BEKO Technologies
Benko Products Inc
Bex Spray Nozzles
Bi-State Rubber Inc
Blast Cleaning Technologies
Blast Guru, LLC
BlastOne
Brush Research Manufacturing Co
Caldan Conveyor A/S
Calvary Industries Inc
Caplugs
Carbit Paint Co
Cardinal Paint and Powder
Cardinal Parts & Equipment LLC
Carlisle Fluid Technologies
Castrol
Catalytic Industrial Systems
CFCM Canadian Finishing & Coatings Magazine
Chemco Manufacturing
Chemmetall US Inc
Chemical Coaters Assoc International
ChemQuest Inc
Chemtec North America LLC
ClearClad Coatings LLC
Clemco Industries Corp
Cold Jet LLC
Col-Met Engineered Finishing Solutions
Columbus Industries Inc
Combustion and Systems Inc
Cool Clean Technologies, LLC
Coral Chemical Co
Cortec Corporation
CPR Systems
CTI Systems
Custom Fabricating & Supplies
Daifuku
Decoral System USA Corp
DeFelsko Corp
Delfin Industrial Corporation
Diamond H2O
Diamond Vogel – Industrial Coatings
Dinamec Systems
DMP Corporation

FINISHING

DuBois Chemicals Inc
Duroair Technologies Inc
Durr Systems Inc
DURUSA LLC
Dynabrade Inc
Echo Engineering
Egyptian Coatings
Elcometer Inc
Emitted Energy
Engineered Paint Applications
Enhancement Technologies Inc / Sublitex
EPSI
Ervin Industries
ESMA Incorporated
Euroimpianti Srl
Eurovac Inc
FANUC America Corp
Fischer Technology Inc.
Flex Trim USA
Fostoria Process Equipment div of TPI Corp
Frank Lowe
GAT Finishing Systems
Gema USA Inc
General Fabrications Corp
George Koch Sons
Global Finishing Solutions
Goff Inc
Graco Inc
HafcoVac
Hedson Technologies North America
Henkel Corp
Hentzen Coatings Inc
Heraeus Noblelight LLC
Herr Industrial Inc
Hubbard-Hall Inc
IFS Coatings Inc
Integrity Metal Finishing Supplies
INTEK Corporation
IntelliFinishing
INTERTEK
Iowa Area Development Group
IPCMI - International Paint & Coating Magazine
IST International Surface Technologies
IXS Coatings
Jamestown Coatings
KeepTheHeat
Keyland Polymer Material Sciences LLC
Klinger Paint Co
Kotar Steel Shot
Kyzen Corporation
LDPI Inc
Lesta USA-Self Learning Painting Robots
LPI Inc
M L Filters
Magic Rack/Production Plus Corp
Marpol Parlatici Sanayi ve Ticaret AS
Marvel Industrial Coatings
Master Finish Company
MAXAIR Systems
Michigan Metal Coatings Inc
Midco International Inc
Midwest Finishing Systems
Mighty Hook Inc
NikoTrack LLC
Nilfisk Inc

FINISHING

Nordic Air Filtration
Nordson Corp
Northern Coatings & Chemical
Omnirobotic
Parker Engineering of America
Patriot Metal Finishing Systems Inc
PEM Inc
PKG Equipment Inc
Pneu-Mech Systems Mfg
Pollution Control Products Co.
Polymer Molding Inc
Porcelain Enamel Institute Inc
Powder Coated Tough
Powder Coating Institute
Powder Parts Inc
PrestiVac Inc
Proceco Ltd
Products Finishing Magazine
Quaker Houghton
Quality Finishing Systems
Rapid Coating Solutions LLC
Richards-Wilcox Conveyor
Rohner
RollSeal Inc
RPB Safety LLC
Ruwac
Sames Kremlin
Sata Spray Equipment
Scientific Control Laboratories
Selas Heat Technology
Sherwin-Williams
Singer Safety Co
Southern Systems International LLC
Spray Systems Inc
Spray Tech/Junair
Sprimag Inc
Sunkiss USA
Surface Engineering Alloy Co
SurTec Inc
SWECO
System Technologies
Tanis Inc
TCI Powder Coatings
Technotrans America Inc
The Blast Shop
The Electrocoat Association
Therma-Tron-X Inc
Thermion Inc
TIGER-VAC USA INC
Transmet Corp
Trimac Industrial Systems
UniCure Spraybooths
Uni-Spray Systems Inc
United Surface Solutions LLC
V&S Galvanizing LLC
Valmont Coatings
VaporTech
Venjakob / Nutro Inc
VentCor Systems
Vitracat America Inc
VulkanBlast Shot Technology
W Abrasives
Wagner Systems Inc
Washington Mills Ceramics
Webb-Stiles Co
Wheelabrator Norican Group

FORMING & FABRICATING

360 Direct
3Arm - Roscamat Division of Eurlink, Inc.
3D Fab Light Inc
889 Global Solutions
ABIS Inc
Accurpress
Acrotech Inc
ACTY SYSTEM AMERICA INC
Advance Cutting Systems
Advanced Robotic Technology
Advanced Spiral Technology
AFFRI Inc
Air Products and Chemicals Inc
Ajan Elektronik Servis Sanayi Ve Ticaret Ltd St
AKS Cutting Systems Inc
Akyapak Uluslararası Dis Ticaret Mak San Ve Tic A
ALA Industries Limited - Yuken & GRH Hydraulics
ALCOS Machinery Inc
Alliance For American Manufacturing
Alliance Steel LLC
Allied Machine & Engineering
Allor Manufacturing Inc/ Plesh Industries
Allstrap Steel & Poly Strapping Systems
Alma CAM USA LLC
Alpha-Brush Aps
Alternative Parts Inc
Altrac USA
AM Machinery Sales Inc
Amada America Inc
Amada Marvel Inc
Ambrell Induction Heating Solutions
American Cutting Edge
American Manufacturing Inc
American Photonics
American Punch Co
American Sweeping Solutions
AMS Controls Inc
ANDRITZ Herr-Voss Stamco Inc
ANDRITZ Soutec & RWC Inc
Apex Machine Group
ARKU Inc
Armstrong Kover Kwick Inc
ARNTZ Inc
Arro-Mark Co LLC
Arrowhead Manufacturers & Fabricators Assoc
Arvos Ljungstrom LLC
ASC Machine Tools
Ascentium Capital
ASCO Carbon Dioxide Inc
ASKO Inc
Atea Laser
Athader ZL
Atlanta Drive Systems Inc
Atlas Copco
Atlas Machine & Supply Inc
Automated Layout Technology
Automated Machinery Inc (AMI)
Automec Inc
AWS Schäfer Technologie GmbH
Axelent Inc
Azarbud ERP Software

FORMING & FABRICATING

b+s group
Bad Dog Tools
Bahco Bandsaw Blades
Baileigh Industrial Inc
Barton International
Baykal Makine A.S.
Beagle I Inc
Beckhoff Automation
Behringer Saws Inc
BesCutter
Beta Tools
Betenbender Manufacturing Inc
Big Ass Fans
Big Steel Rack
Bissell Commercial
Blastec Inc
BLM Group
Blue Water Engineering Pty Ltd
boeck GmbH
Bonak CPL SL
Bonat Technologies Inc
Boschert Precision Machinery Inc
Boss Laser
Boss Manufacturing Co
Bossi
Bowlin Manufacturing Inc
Braden Filtration LLC
Braner USA Inc
BTM Company LLC
Burr King Manufacturing Co
Butech Bliss
BUWW Coverings Inc
Bystronic Inc
Cagle Industrial Maintenance
Cambo
Cameron Mfg and Design
Camlock Systems Inc
Capital One Services LLC
Carell Corporation
Caster Works Inc
CECO Environmental
CH Steel Solutions Inc
Chambrean SAS
Chase Cooling Systems
Cheung Woh Technologies Ltd.
CIDAN Machinery Inc
Cincinnati Inc
Civan High Power Lasers
Cle-Line by Greenfield Industries
Cleveland Punch & Die Co
Cleveland Steel Tool Co
CMF
CMS North America Inc
CNC Machines
COB Industries Inc
Coherent Inc
COLE-TUVE Inc
Comblift USA
ComEd IS
COMEQ Inc
Controlled Automation Inc
Convergent Photonics
Coractive High Tech Inc
Cosen Saws
Costa Sanders
Cowles Tool Co
CTD Machines
Custom Quality Manufacturing
Cy Laser America

FORMING & FABRICATING

Daito Seiki Co Ltd
Dallan America Corp
Dalmeic Inc
Danobat Goiti S Coop
Darex LLC
data M Sheet Metal Solutions GmbH
DAVI Inc
DAWN Vices & Clamps
DCM Tech Inc
DeeTee Industries Ltd
Dener Makina San Tic Ltd Sti
Design 2 Part
Diamond Saw Works Inc
Dimeco Coil Technologies Inc
Diversified Transportation Services
DKOI
DoALL Sawing Products
Dongguan Insertion Machinery Co Ltd
Doring Cold Saws
Doucet Machineries Inc
Dr. Shrink Inc
Dreistern Inc
Dude Solutions
Durma North America Inc/ Durmazlar/DURMA
Dynatec Manufacturing Inc
Eagle Bending Machines Inc
Eagle Laser
Eastern Metal Supply
Ebbco Inc
Eberle America
EBM Laser/Reservoirs Depres
EBS Ink-Jet Systems USA Inc
ECi Software Solutions
Econco/CPI
EHRT North America
ELG Metals Inc
Elmali Makina Sanayi VE Ticaret Ltd Sti
Elumatec North America Inc
Emmegi USA Inc
Enfasco Inc
EO Technics Co Ltd
EOS Business Surveillance Solutions
Epicor Software Corp
Epilog Laser Corp
Eprner Technology Inc
Ercolina - CML USA Inc
ErectaStep
Ergo Advantage
Ergotronix
ERIEZ
ErmakUSA/Ermaksan
ERS Engineering Corp
EuroGauge USA
Exact Metrology
ExhibitForce
Fab Line Machinery Llc
Fab Supply Inc
Fabricating & Metalworking Magazine
Fabrication Solutions & Technologies Inc
Fabricators & Manufacturers Assoc Intl (FMA)
Fabricator's Hot Line
Faccin USA Inc
Factory Cat
Fagor Arrasate

Explore equipment and services from leading companies in the metal forming, fabricating, welding and finishing industries. Go to fabtechexpo.com for the most up-to-date exhibitor list.

FORMING & FABRICATING

Family Business USA
 FARO Technologies Inc
 FASPAR SpA
 Fehr Warehouse Solutions Inc
 Ferrato Davide SAS
 FF Journal/Modern Metals
 Ficep Corporation
 Fladder-Hansen & Hundebol Inc
 FlashCut CNC
 FlexArm Inc
 Flow International Corp
 Flowdrill Inc
 FMT
 FomUSA
 Formdrill USA Inc
 Formtek Inc
 Foshan Beyond Laser Technology Co. Ltd
 Franklin Mfg Inc
 Friedrich August Picard GmbH & Co KG
 Fromm Packaging Systems
 G.I.S Mfg. Inc.
 Gasparini SpA
 GE Mathis Co
 Genius ERP
 Glen Dimplex Thermal Solutions
 Global Shop Solutions
 GMA Garnet
 GMC Machine Tools Corp
 Gorbelt Inc
 Graphic Products
 Gripnail - Fastening Systems
 Grotnes Inc
 H2O JET Inc
 Haas Automation Inc
 Haco-Atlantic Inc
 Haeger Inc. A
 Pennengineering Company
 HAEUSLER AG Duggingen
 Hafendorfer Machine Inc
 Hamilton Caster
 Hangzhou Grand Imp & Exp Co Ltd
 Hangzhou Sikan Technology Co Ltd
 Hangzhou Xiangsheng Abrasive Machine Manufacturing Co. Ltd
 Han's Laser Corp
 Han's Laser Smart Equipment Group
 Hans Weber Sales and Service Corp
 Hanson Rivet & Supply Co
 Heck Industries
 Help Lighting Inc
 HEM Inc
 Hennig Inc
 Hexagon Manufacturing Intelligence
 HK Laser & Systems
 Hornet Cutting Systems
 Hougren Manufacturing Inc
 HUB Industrial
 Husky Rack & Wire
 HVR Magnetics Co Ltd
 Hyd-Mech Group Ltd
 Hydren Systems LLC
 HYMSON
 Hypertherm Inc
 igus Inc

FORMING & FABRICATING

II-VI Infrared
 IMO USA Corp
 Imperien LLC
 IMS USA LLC
 Industrial Machinery Digest
 Industrial Magnetics Inc
 InfoSight Corporation
 Innovative Components
 International Knife & Saw Inc
 International Technologies Inc
 Into-N2 LLC
 IQMS
 ISB
 Italmac USA Inc
 Jacquet
 JD Squared Inc
 Jepsen Power Inc
 Jet Edge
 JETCAM/NestONE Solutions/The Aquila Group
 JHP Fasteners Inc
 Jiangsu Tone Machine Co Ltd
 Jinan Bodor CNC Machine Co Ltd
 Jinan Xintian Technology Co Ltd
 JMR Industrial
 Jobscope ERP
 Johnson Bros Roll Forming Co
 KAAST Machine Tools Inc
 Kalamazoo Machine Tool
 Karcher
 Kasto Inc
 KD Capital Equipment LLC
 KDM International
 Keller USA Inc
 Ken Bergman & Assoc LLC
 Kennametal Inc
 Kern Laser Systems
 Keyence Corp of America
 Kinetic Cutting Systems Inc
 King Forging Co. Ltd
 Kipp Inc
 Klingelhofer Corp
 KMT Waterjet Systems Inc
 KNUTH Machine Tools USA Inc
 KOHLER Maschinenbau GmbH
 Kolev Engineering Inc
 Laguna Tools
 Lanetek Systems Inc
 LAP Laser LLC
 Lapham-Hickey Steel
 Laser Experts Inc
 Laser Mechanisms Inc
 LaserStar Technologies Corp
 laservision USA
 Lazer Safe Pty Ltd
 Leasing Resources Inc
 LENOX®
 Lincoln Electric Cutting Solutions
 LINSINGER
 LISSMAC Corp
 Lockformer Custom Machinery
 LS Industries Inc
 LT Ultra Precision Optics
 Lucescent Bearing Corporation
 Lumentum

FORMING & FABRICATING

LVD Stripit
 Lyon Metals LLC
 MachineMetrics
 Machinery Dealers National Assoc
 MachineTools.com
 Manufacturing News
 Marando Industries Inc
 Marketing Essentials LLC
 Masteel America Corp
 Master Magnetics
 Master Roll Manufacturing
 Masterplan ERP
 Mate Precision Tooling
 Matthews Marking Systems, Matthews Industrial Automation
 Mazak Optonics
 MB Metal Technologies LLC
 MC Machinery Systems Inc
 Meccanica Ronzani Srl
 MECCO
 Mechanical Inc. VDC / Scanning Services
 Meltric Corp
 Messer Cutting Systems
 Mestek Machinery Inc
 Metal Supermarkets Service Company Inc
 MetalFinish LLC
 MetalForming Inc
 Metalix CAD/CAM Ltd
 MetalMizer
 Metalphoto of Cincinnati Inc
 Metamation Inc
 Metform International Ltd
 MetSaw Systems Inc
 Metreel Inc
 Metronor Inc.
 MG Srl
 Microsoft Dynamics 365 / Turnkey Technologies
 Midwest Automation
 Midwest Tool Inc
 MIE Solutions Inc
 Ming Ping Machinery Co Ltd
 Minnesota Department of Employment and Economic Development
 Modula Inc
 Mohawk Machinery Inc
 Morton Machine Works
 MSS Americas Inc
 MultiCam Inc
 Murata Machinery USA Inc
 MVD Makina Sanayi A.S.
 Nadella Inc
 Nanjing Prima CNC Machinery Co Ltd
 nano-purification solutions naturalLED
 Neuman Aluminium Impact Extrusion Inc
 New London Engineering
 Newcastle Systems Inc
 Nichols Portland LLC
 Nitto Kohki USA Inc
 NKT Photonics
 nLIGHT Inc
 NN Inc Power Solutions
 Nordfab Ducting
 Norlok Technology Inc
 North Alabama Industrial Development Association
 Nukon USA
 NUM Corporation

FORMING & FABRICATING

Oasis Scientific Inc
 O'Brien Steel
 Ocean Machinery Inc
 Ohio Laser LLC
 OMAX Corp
 OMCO Rollforming Plus
 OmegaCube Technologies
 Oncor
 Ophir Optronics Solutions LTD. / MKS Instruments
 Optical Gaging Company
 Oriental Casting Inc
 Orion Machinery North America Inc
 Pacific Press Technologies
 Packsize International LLC
 Palmer Associates Inc
 Palmgren
 Pangborn LLC
 Pannier Corporation
 Paperboard Packaging Solutions
 Park Industries
 Parker Hannifin Industrial Gas Filtration & Generation Division
 Pat Mooney Saws
 Patterson Fan Company
 Peak Scientific Instruments LTD
 Peddinghaus Corporation
 PennEngineering
 PEP Technology
 Perfection Global LLC
 Permador Industries Inc
 Peter Prinzing GmbH
 Phillips Saw & Tool Inc
 Philpott Rubber/Lankhorst Mouldings
 Phoenix Metals Co
 Pinnacle Systems Inc
 Piranha \ MegaFab
 PM SAS
 PMF Industries Inc
 Polyurethane Products Corp
 Power Solutions Pro
 PRC Laser Corp
 Press Brake Repair
 Press Brake Safety
 Presto Lifts Inc
 Prima Power North America Inc
 Prodevo Robotic Solutions Inc.
 Production Products Inc
 Profile Cutting Systems USA Inc
 Project Tool & Die Inc
 Qingdao Puhua Heavy Industrial Machinery Co Ltd
 Qnect LLC
 Quantum Machinery Group
 R&M Manufacturing Co LLC
 RADAN I Hexagon Manufacturing Intelligence
 Radian Laser Systems
 RAS Systems LLC
 Raytech Measuring Systems
 RDI Laser Blanking Systems
 RealSTEEL Software
 Red Bud Industries
 Reibus International
 Replacement Brush Tables
 Revolution Machine Tools

FORMING & FABRICATING

Rice Lake Weighing Systems
 Richardson Electronics Ltd
 Rigaku Analytical Devices
 Rigidized Metals Corp
 Riteway Brake Dies Inc
 Rocklin Manufacturing Co
 Rocky Mountain Instrument Co
 Rolled Alloys
 Rolled Metal Products
 Roller Die + Forming Co
 Roller USA
 Rousseau Metal Inc
 RUF Briquetting Systems
 Ruijie Laser
 Ryerson
 SafanDarley BV
 Sahajanand Laser Technology LTD
 Salvagnini America Inc
 Samco Machinery Ltd
 Sawblade.Com
 SB Whistler & Sons Inc
 Schindling America Inc
 Schmidt
 Schneider Electric
 Scotchman Industries Inc
 SDS/2
 Semyx
 Sen Fung Rollform Machinery Corp
 Senfeng CNC Laser Technology USA Inc
 Service Lamp Corp
 SES Salico Finishing and Processing LLC
 Shanghai Shuheng Cutlery & Mould Manufacturing Co Ltd
 ShopBot Tools Inc
 ShopData Systems Inc
 Shoptech
 SIC Marking USA
 Sideros Engineering Srl
 SigmaTEK Systems, SigmaNEST
 Sinto America
 Sioux Tools
 Site Location Partnership (SLP)
 SkyBlade Fan Company
 Slatpro LLC
 SMART Sheet Metal Air Rail and Transportation Workers Union
 SME ZONE
 Smith & Wesson Precision Components
 Smith Metal Products
 Snap On Industrial
 Soitaab USA Inc
 South Tek Systems
 SP Air Corporation
 Spanco Inc
 Spraying Systems Co
 SSC Controls Co
 SSI Schaefer
 Stainless Structural LLC
 STAM SpA
 Starrett Company
 Staub Manufacturing Solutions
 Steel King Industries Inc
 Steel Plate Akron Atlanta
 Steel Storage Systems Inc
 Stopa

FORMING & FABRICATING

Stop-Painting.com
 Stor-Loc Corp
 Stresstech
 Striker Systems
 Strong Hold
 STRUMIS LLC
 Sugar Steel Corp
 SUNS International LLC
 Super Duty Fans
 Supra Machine Tool
 SYSPRO USA
 TAB Industries LLC
 Tailiff Co Ltd
 TapeCase Ltd
 Tapeswitch Corporation
 Team Texas
 Techflex Inc
 Techni Waterjet A GMM Group Company
 Tekfab Inc
 Tennesmith/Roper Whitney
 Texas Right Corner
 The Bradbury Group
 The Fabricator Magazine
 The M.K. Morse Company
 Thermal Care
 Three D Metals Inc
 TigerStop LLC
 Timesavers LLC
 Tinius Olsen
 Toolmen Corp
 Tormach LLC
 Travelers Insurance
 Trilogity Machinery Inc
 Trimble Solutions USA Inc.
 Tri-Mer Corp
 Trim-Lok Inc
 Tru-Cut Saw Inc
 TRUMPF Inc
 TST Tooling Software Technology LLC
 Tsune America LLC
 TYKMA Electro
 Ultra Tech Industries Company Inc
 Unibor
 UniPunch Products Inc
 United Lens Co
 Ursviken Inc
 US Industrial Machinery Co
 US Lubricants
 Valgro India Limited
 Various Machining Solutions LLP
 Verisurf Software Inc
 Versatility Professional Tool Storage
 Viking Blast & Wash Systems
 Virtek Vision International
 Visual Factories
 VKS - Visual Knowledge Share
 Voortman USA
 Vytek Laser Systems
 Walker Magnetics
 WARDJet
 Water Jet Sweden AB
 Waterjet USA LLC
 Wazer
 WDM Bending Rolls
 Welsler Inc
 Wemo Netherland B V
 West Virginia Development Office

FORMING & FABRICATING

Wila USA
 Willbanks Metals Inc
 Wilson Tool International
 Wisconsin Metal Parts Inc
 WM Caster
 Workshops For Warriors
 World Economic Development Alliance
 Wuxi Qingyuan Laser Technology Co. Ltd
 Wyndham Hotels & Resorts
 Wysong Parts & Service
 Xinxiang Tianfeng Machinery Manufacture Co Ltd
 xTuple — Open Source ERP+CRM + Web Portal
 YESTOOL / Aloris USA
 Zapp Precision Strip
 Zund America Inc

METALFORM

ABC Metals Inc
 Accra-Wire Controls Inc
 Accurate Die Design Software Inc./Logopress3
 Admiral Steel LLC
 Agathon Machine Tools Inc
 AIDA-America
 AIM Computer Solutions, ERP and EDI Software
 AKH Inc
 Alma Machinery Co
 Almcro Inc
 Alro Steel Corporation
 AMADA ORII AMERICA INC
 AP&T North America Inc
 ART Metals Group
 Asmith Manufacturing Company
 AutoForm Engineering USA Inc
 Automated Tapping Systems
 Azimuth Machinery
 Balluff Inc
 Beckwood Press Co
 Berg & Co GmbH
 Spanntechnik
 BesTech Tool LLC
 Biele SA
 Bihler 4 Slide-NC
 Bohler Steels
 Bruderer Machinery
 BTAL Plastic & Hardware Industry Co Ltd
 BTD Manufacturing Inc
 C2AE
 Chemcoaters LLC
 Christy Metals
 CIECO Inc
 Clayton Metals
 CM Diagnostics
 COACT Associates Ltd
 COE Press Equipment Corporation
 CoilTech Machinery Inc Co
 Colt Automation LTD
 Combined Metals of Chicago
 Dallas Industries Inc
 Daubert Cromwell
 DAYTON Lamina Corporation
 DDI Inc
 Dees Hydraulic Industrial Co Ltd
 Delta Computer Systems Inc
 Delta Industrial

METALFORM

DENN - Industrias Puigjaner, sa - Global Metal Spinning Solutions
 DESCH USA Inc
 Dexco Industrial Storage
 Die Cad Group, a Tooling Tech Group Company
 Dongguan City Yalu Industry Co Ltd
 Dongguan Gooming Mechanical Co Ltd
 Dongguan Sunyuu Automotive Equipment Co Ltd
 Dongguan Topway Tool & Die Co Ltd
 Dongguan Wisdom Tool & Die Co Ltd
 Dongguan Zerostart-tool Co Ltd
 DTC Products Inc
 Dubuque Stamping & Mfg Inc
 Durable Superior Casters
 Eagle Press & Equipment Co Ltd
 EAS Mold & Die Change Systems Inc
 EBway LLC
 EIGEN
 Elizabeth Carbide Components
 eNETDNC & Machine Monitoring
 Engineered Lubricants Co
 Enprotech Industrial Technologies
 Erickson Metals Corporation
 Excelsior Hardware & Plastic Co Ltd
 F&G Tool and Die Co
 Fagor Arrasate
 Feed Lease Corp
 Fibro Inc
 Flight Industrial Co Limited
 FluidForming Americas
 FORMTEK-ME
 Fortech Products Inc
 Fuchs Lubricants Co
 Fuzhou YIN TOU Precise Metallurgy Industry Co Ltd
 Gibbs Metals
 Goanwin USA Inc
 Green Valley Manufacturing Inc
 Greener Press & Machine Company Inc
 Gruber Tool & Die Inc
 Guangdong TopZone Tooling Co Ltd
 Hammer Presses
 Hebei Matson Metal Tech Co Ltd
 Hefei Metalforming Intelligent Manufacturing Co Ltd
 Heim Group, The
 Helm Instrument Co Inc
 Heyco Metals Inc
 Hifly Tool
 Hilma By Carr Lane Roemheld
 Hindustan Pressings Pvt Ltd
 Hitachi Metals America
 HLC Metal Parts Ltd
 HMS Products Co
 HTM Sensors
 Hutchison Tool Sales Co
 Hidraulico AS
 IHI Ionbond Inc
 Ikra Makina San Ve Tic AS
 Impax Tooling Solutions® a Division of Wilson Tool International

METALFORM

Industrial Innovations Inc
 Inno-Spin LLC
 Jarvis Cutting Tools
 JET-SET
 JIER North America
 Jinghong Precision Industrial Co. Ltd
 JIT Automation Inc
 J-Tech
 Kaeser Compressors Inc
 Kent Corporation - Dietronic
 Kingyu Tool & Die Co Ltd
 Komatsu America Industries LLC
 Kovinoplastika Loz D.D.
 Kunshan Dersun Precision Mould Co Ltd
 Kunshan Eagle Precision Tooling Co Ltd
 Kyntronics
 Latrobe Specialty Metals Distribution
 Lee Industrial Contracting
 Leifeld Metal Spinning AG
 Lien Chieh Hydraulic Industrial Co LTD (LCH)
 Lincoln Electric
 Linear Transfer Automation Inc
 LINK Systems
 Logopress3/Accurate Die Design Software Inc.
 LSP Industries Inc
 Lucky Harvest Co Ltd
 M. S. Willett
 Machine Concepts Inc
 Macrodyne Technologies Inc
 Manitowoc Tool & Manufacturing LLC
 Marposs Corp
 Mayfran International Inc
 MD Metals
 MDL Mold & Die Components Inc
 Metalloid Corporation
 MetPro Group
 Meyer Aluminium Blanks Inc
 Midwest Industrial Metals Corp
 MISCO Refractometer
 Misumi
 MJC Engineering & Technology Inc
 Moeller Precision Tool
 MPI Magnetic Products Inc
 Multipress Inc
 National Kwikmetal Service LLC
 Neff Press Inc
 NGK Metals Corp
 Nidec Press & Automation
 Norgren Automation Solutions LLC
 NOXON Automation USA LLC
 Oerlikon Balzers
 OGS Industries
 Orttch Inc
 Overton Tool & Die
 P/A Industries Inc
 Pacesetter Systems
 Pascal Engineering Inc
 Pax Products Inc
 Penn United Technologies Inc
 Pepperl+Fuchs Inc
 Plant Engineering Services Inc
 Plex Systems
 Pneumatic Innovations LLC
 Pottiez America LP
 Precious Plate Inc

METALFORM

Precision Metalforming Association
 Precision Punch Corp
 Premier Tooling & Manufacturing LLC
 Prescor LLC
 Press Room Equipment Co
 Pressix North America
 Pressroom Electronics Inc
 Pronic Inc
 Punch Industry USA Inc
 Quality Wire EDM Inc
 Quintus Technologies LLC
 Raffin Construction Co
 Ramcel Precision Stamping and Manufacturing LLC
 Rapid-Air Corp
 Ravne Presses DOO
 Ready Technology Inc
 Rock Valley Oil & Chemical Co Inc
 Ross Controls
 Samson Roll Formed Products Co
 Sangiacomo Presses Americas LLC
 Sankyo Automation
 Sasahara Kanagata Co. Ltd
 SB Specialty Metals LLC
 SC Fastening Systems
 Schuler Inc
 SeifLube
 Serapid Inc
 SEYI America Inc
 Shenzhen Huayuanda Technology Co Ltd
 Shenzhen Manyes Precision Metal Co Ltd
 ShopEdge Software Inc
 SIMPAC America Co Ltd
 Solar Atmospheres
 Solar Manufacturing
 Southern Copper & Supply
 Southern Machinery Repair Inc
 Special Springs LLC
 Stamtec Inc
 Steel Craft Technologies
 STEINEL Normalien AG
 Superior Die Set Corp
 Sutherland Presses
 TAIYO SPRING JAPAN THAI VIETNAM
 TDS Automation - A Doerfer Company
 Tecnomagnete Inc
 The David Round Company
 Thomas Industrial Rolls Inc
 Toledo Integrated Systems
 Tooling Tech Group
 Toptime Precision Electronics Co Ltd
 Torque Incorporated
 Torque Technologies Inc./Goizper
 Tower Metalworking Fluids
 TOX Pressotechnik LLC
 Trans-Matic
 T-Sim Solutions
 TST Tooling Software Technology LLC
 Tsubaki - Kabelschlepp
 UEI Tool and Die/Jacar in Die Transfer Systems
 Uelner Precision Tools & Dies
 Ulbrich Stainless Steels & Special Metals Inc
 UltraLox
 Ultratech Tool & Design Inc

METALFORM

UMI Industries / Ningbo UMI Industries Co Ltd
 Unico Inc
 Unisorb Installation Technologies
 Unist Inc
 United Aluminum Corp
 United Performance Metals
 United Wire Co Inc
 Unittool Punch & Die Company
 Vaccari SPA
 Vektex LLC
 Vibro Dynamics LLC
 Victory Tool
 Vidir
 voestalpine eifeler Coatings
 Voith Turbo Inc
 Wilco Inc
 Wintriss Controls Group LLC
 Wolfgang Loch GmbH & Co KG
 WorkWise Software
 World Precise Machinery Co Ltd
 Yamada Dobby America LLC
 Yih Shen Machinery Co Ltd (YSM)
 Yunsing Industrial Co LTD
 Zerust Corrosion Solutions

ROBOTICS & INDUSTRIAL AUTOMATION

Accu Tech USA
 ARM - Advanced Robotics for Manufacturing
 ASO Safety Solutions Inc
 Bilsing Automation North America
 Binder USA
 Canon USA
 Design Storage & Handling Inc
 Dispatch
 Ekide SL
 Fagor Automation Corp
 FANUC America Corp
 Festo Corp
 Fremont Automation
 Harmonic Drive LLC
 Hiwin Corporation
 Hollbrit Inc
 IKO International Inc
 ILME S.p.A.
 JobPack Inc
 Kosmek USA
 Lasermet Inc
 Leadec Industrial Services
 Mach Machines LLC
 Mayer USA Inc
 Murrplastik Systems Inc
 Nabtesco Motion Control Inc
 NB Corporation of America
 Neugart USA Corp
 OnRobot US Inc
 Onshape Inc
 OPERA
 PrimeTest Automation Inc
 Promess Inc
 Sage Automation Inc
 Shop Floor Automations Inc
 Sigma DT Robotics
 SIS Corp
 SMC Corporation of America
 THK America Inc
 TURCK Inc
 Two Technologies Inc
 Veo Robotics
 Welker Engineered Products
 Zeiss, Carl Zeiss Industrial Metrology LLC

TUBE & PIPE

5 Star Engineering and Maintenance
 Accurate Technology Inc
 Accurex Measurement Inc
 Addison Machine Engineering Inc
 Advanced Fabricating Machinery
 Advanced Tubular Technologies Inc
 AFM Advanced Manufacturing Technologies
 AIM, Inc.
 Ajax Tocco Magnethermic Corp
 Alpine Bender Machinery
 AM Industrial Group
 AMOB SA
 AMPCO Metal Inc
 ASMA USA Inc
 Azak Tool Technologies Inc
 Bend Tech
 Beverlin Specialty Tube
 BLM Group
 Chiyoda Kogyo-Maruka USA
 Clark Fixture Technologies
 Combifit USA
 Comco USA Inc
 Continental Pipe & Tube Cut-Off Machines
 Creative Safety Supply
 Crippa SPA
 Current Tech
 Design Storage & Handling Inc
 Dynobend BV
 Eddytech Systems Inc
 EFD Induction Inc
 EJP Maschinen GmbH
 Electrex Industrial Solutions
 EMMEDI
 FD Machinery
 FENN
 Fives
 Gem Tool Corporation
 George A Mitchell Co
 Grazioli Cesare Srl
 Guild International
 Haas Saw & Supply
 Han Jie Machinery Co Ltd
 Haven Manufacturing Corp
 Heiko Machine
 Herber Engineering AB
 Horn Machine Tools Inc
 Huth Ben Pearson
 International LLC
 Hydro Tube Enterprises Inc
 Innerspec Technologies
 INNOVO Corporation
 INSPECTECH
 IP Automation Inc
 ITEC - Innovative Tube Equipment Corporation
 J&S Machine Inc
 Julia USA
 Kent Corp
 King Tester Corp
 Kinkelder USA
 Lomar Machine & Tool Co
 Mair Research SpA
 Manchester Tool & Die Inc
 Matter Srl
 Metalloid Corporation
 Mioi OPTON (USA) Inc
 Mill Masters
 New-Form Tools
 Numalliance Inc
 Olimpia 80 Srl
 OMNI-X USA
 OP USA Inc

TUBE & PIPE

Overton Tube Forming Systems
 Passline Performance
 Pensa Labs
 PHI
 PILLAR Induction
 Pines Engineering/H&H Tooling
 Proto-1 Manufacturing
 PT Peroni Karya Sentra
 Quaker Houghton
 Rafter Equipment Corp
 RbSA Industrial
 REA JET US
 Reika GmbH & Co
 Roll Machining Technologies & Solutions
 Rust Release (Safe Industrial Rust Remover)
 Saar Hartmetall USA LLC
 Sanderson Machines
 Schwarze-Robitec GmbH
 SST Forming Roll Inc
 Star Bend - Star Technology Srl
 T&H Lemont
 Taloc USA
 T-Drill Industries Inc
 Tenryu America Inc
 Thai German Products PCL
 Thermo Fisher Scientific
 Tools for Bending
 Transfluid Maschinenbau GmbH
 Tru-Cut Saw Inc
 Tube & Pipe Technology
 Tube 2020 Messe Dusseldorf North America
 Tube Bending Concepts Inc
 Tube Form Solutions
 Tubex Technology Machinery
 Ultraflex Power Technologies Corp
 Uniflex Of America
 Union LTD
 United Industries Inc
 Universal Controls Group
 Universal Tool & Engineering
 Universal Tube & Rollform Equipment Corp
 Viega
 ViewTech Borescopes
 Vinston US Corp
 WAFIOS Machinery Corp
 Wauseon Machine & Manufacturing Inc
 Wecotech AG
 Weil Engineering North America
 Wilmington Precision Machining
 Winton Machine Company
 World Machinery & Saw Inc
 Ying Chivan Corp
 YLM USA Inc

WELDING

3M
 ABB Inc
 Abicor Binzel
 Above Material Technology Co Ltd
 Ace Industrial Products
 ACT Automotive NA
 ADDere
 Advanced Metallurgy Technology Co Ltd
 Aerospace Engineering Equipment (Suzhou) Co. Ltd
 AGT Robotics
 Aimtek Inc
 Air Purification Inc
 Airflow Systems Inc
 Airgas Inc
 Aketek Industries
 Alabama Laser
 Allegro Industries
 Allied Powers LLC
 ALM Positioners Inc
 ALS Maverick Testing Laboratories Inc
 AlumaReel USA
 Amada Miyachi America
 American Society For Nondestructive Testing
 American Technical Publishers
 American Torch Tip Co Inc
 American Welding Society
 American Weldquip LLC
 AMET Inc
 Anand Arc Ltd
 Andersen Industries Inc
 Andritz Powerlase
 Angle-Rite® Clamping System
 Anthony Welded Products Inc
 Antra Technologies Co Ltd
 Anxin Abrasives Co Ltd
 Applied Technical Services Inc
 Aquasol Corp
 Arc Solutions Inc
 ARC Specialties Inc
 ArcBoss
 Arch Value Solutions
 ArcOne
 Arc-Zone.Com Inc
 Arkansas Elite Welding Academy
 Armor Tool
 Artotic
 Astro Arc Polysoude Inc
 ATA Tools Inc
 ATI Industrial Automation
 Attollo Lift
 Auburn Manufacturing Inc
 Automation International Inc
 AVS Industries LLC
 AWS Bookstore
 AWS Welding Competition
 AXXAIR USA
 Baoji Taimei New Material Technology Co Ltd
 Beijing Essen Welding & Cutting Fair
 Beilun Futuo
 Berkenhoff GmbH
 Bernard
 BESSEY Tools North America
 Beveler USA Inc.
 Black Stallion Industries (REVCO)
 Bluco Corp
 Blue Demon Welding Products
 Bolthoff USA
 Boostweld
 Bore Repair Systems Inc
 Bosch
 Bow Ind
 Bradford Derustit Corp
 Broco Rankin
 Bruker Corporation
 BSP Tools (Kunshan) Co Ltd
 Buffalo Shrink Wrap
 BUG-O Systems
 C & G Systems
 Cadi Co Inc
 Caiman Gloves / Primax

WELDING

Callington Welding Chemicals
 Cambridge Vacuum Engineering
 Canaweld Inc
 CANTESCO®
 Capital Weld Cleaners
 Carr Lane Manufacturing Co
 CEIA USA Induction Heating Systems
 CENIT North America Inc
 Cerbaco Ltd
 CGW-Camel Grinding Wheels USA
 Changzhou Asia Science & Technology Co Ltd
 Changzhou Huarui Welding & Cutting Machinery Co Ltd
 Changzhou Shine Science & Technology Co Ltd
 Changzhou Zhengyang Welding Material Co Ltd
 Chart Inc
 Chicago Pneumatic Tool Company LLC
 Chung I Silver Solder Co Ltd
 Cibo Abrasives USA
 CK Worldwide
 Ciampetek USA Inc
 Clean Air Consultants
 CleanSpace Technology Pty Ltd
 Cloos Robotic Welding Inc
 Closed Loop Recycling
 CM Industries Inc
 Cobra Torches Inc
 Coldwater Machine Company - A Lincoln Electric Company
 Computers Unlimited
 Continental Abrasives
 Copier Pipe Machinery
 Coral SPA
 COR-MET INC
 Cougartron Inc.
 Coxreels
 CRC Industries
 CS Unitec Inc
 CWB Group
 CWI WELDING Generation4
 D/F Machine Specialties Inc
 Dahching Electric Industrial Co Ltd
 Dataweld Inc
 Dedeco International Inc
 Dengensha America Corp
 Denray Machine Inc
 Dentec Safety Specialists
 Diablo Tools
 Diagraph
 Diamond Ground Products Inc
 Dino-Lite Scopes (BigC)
 Dinse Inc
 Direct Wire & Cable
 Diversitech
 Donaldson Torit - Donaldson Company Inc
 DualDraw LLC
 DURUM Verschleiss-Schutz GmbH
 Dynatorch Inc
 E.H. Wachs / Orbitalum
 Easom Automation - A Lincoln Electric Co
 EASYKleen Pty Ltd
 Ecogate Inc
 Eidos Ergonomics
 eldec LLC
 Elderfield & Hall / Pro-Fusion
 Electron Beam Technologies Inc

WELDING

Encompass Machines Inc
 Ensitech Inc
 ESAB Welding & Cutting Products
 ESCO Tool Co
 Euroboor USA
 FANUC America Corp
 Fastenal Company
 FEIMEC 2020
 Fein Power Tools Inc
 Fireball Tool Works LLC
 FIT RITE Systems LLC
 Flame Technologies Inc
 Flange Wizard Inc
 Flexovit USA Inc
 FOCUS GmbH
 Forney Industries Inc
 Foshan Sanqiao Welding Industrial Co Ltd
 FPT Industrie Spa
 Fronius USA LLC
 FSU Welding Engineering Technology
 FumeVac
 Fusion Inc
 Gas Lens Galore
 GAWDA
 GE Schmidt Inc
 Genesis Systems IPG Photonics Company
 Genstar Technologies Co., Inc. (GENTEC)
 Gentex Corporation
 German Pavilion
 Gesswein Co
 GH Induction Atmospheres LLC
 Global Saw
 Golden Eagle Minmetals (Beijing) Welding Materials Co Ltd
 Golden Spot Machinery (Taicang) Co Ltd
 Goss Inc
 GSM America Inc
 Gudel Inc
 Guilin Mingfu
 Gulco International
 H&M Pipe Beveling Machine Co Inc
 Har-Bach
 Harbert's Products Inc/Allied Flux Reclaiming Ltd
 Harris Products Group
 HBS Stud Welding Partners
 Henan Huamao Metal Materials Co Ltd
 Henan Xinxing Arts and Crafts I/E Co Ltd
 Heron Intelligent Equipment Co Ltd
 HGG Profiling Equipment BV
 Hi Temp Products
 Hobart Brothers
 Hobart Institute of Welding Technology
 Honsberg America Corporation
 Honsberg Metallsagen GmbH
 Hypertherm Inc
 Hy-Tech Engineered Solutions
 IAP Air Products
 Ideal Welding Systems LP
 igm Robotic Systems Inc
 IHT Automation GmbH & Co KG
 II-VI Highyag
 IMC Marks
 Imperial Systems Inc
 Industrial Solutions & Innovation LLC

WELDING

Industrial Specialists by BrandSafway
 Intercon Enterprises Inc
 International Welding Technologies Inc
 InterTest
 IPG Photonics
 Iron Age Footwear
 Ironworker Management Progressive Action Cooperative Trust
 ISOTunes
 IVEC Systems
 JASIC Technologies America Inc
 JAZ Brush USA Inc.
 Jiangu Meixin Optoelectronics Technology Co Ltd
 Jiaying MTB Machinery Co Ltd
 JLC Electromet Pvt LLC
 John Tillman Co
 Joysun Abrasives Co Ltd
 JR Automation
 Kalas Wire Inc
 Kanca El Aletleri Dovme Celik Ve Makina Sanayi AS
 Kawasaki Robotics (USA) Inc
 Kayo Products Co Ltd
 Kemper America Inc
 Kennametal Stellite
 Kent Stud Welding
 Keystone Fastening Technologies
 Kistler Cutting and Welding (Kistler GmbH)
 Kiswel USA Inc
 Kjellberg Vertrieb GmbH
 Klimawent USA LLC
 KLINGSPOR Abrasives Inc
 Kobelco Welding of America Inc
 Koike Aronson Inc
 Konzen Company
 KUKA Robotics Corporation
 LA-CO Industries Inc
 Laizhou Hongyuan Bench Vise Manufacture Co Ltd
 Laser Marking Technologies LLC
 Lessmann GmbH Drahtburstenfabrik
 LeTourneau University
 Levitate Technologies Inc
 Lianyungang Orientcraft Abrasives Co Ltd
 Liburdi Automation Inc
 LinAn Da Yang Welding Material Co Ltd
 Lincoln Electric Automation
 Lincoln Electric Co
 Luvata Ohio Inc
 Machitech/Beamcut Systems
 Magnatech LLC
 Manufacturing Solutions Industries Inc
 Matsumoto US Technologies Inc
 Matuschek Welding Products Inc
 Maxxeon Inc
 McDantim Inc
 MCR Safety
 Mercer Industries
 Metabo Corp
 Mianyang Zhongyan Abrasive Co Ltd
 Michigan Pneumatic Tool Inc
 Micro Air
 Midalloy
 Miller Electric Mfg LLC
 MITUSA Inc

WELDING

MK Products Inc
 Morris Precision Technology Company Limited
 MSC Software
 MTA-USA LLC
 NASA Technology Transfer Program
 Nation Wide Products
 National Standard
 Nederman LLC
 Nelson Stud Welding Inc
 New Fire Co Ltd
 Newland (Tianjin) Welding Material Co Ltd
 Ningbo Air-Safe Tool Co Ltd
 Ningbo Dabu Welding Technology Co Ltd
 Ningbo Jamson Machinery Manufacturing Co Ltd
 Ningbo Jintian
 Ningbo Kimpin Industrial Pte Ltd
 Ningbo Powerway Alloy Material Co Ltd
 Ningbo Starx Welding & Cutting Technologies
 Ningbo Yihe Refrigeration Equipment Co Ltd
 Ningbo Zehen International Trade Co Ltd
 Nodha Industrial Technology Wuxi Co. Ltd
 Norton I Saint-Gobain
 Novarc Technologies Inc
 Nuova CMM Srl
 Octopuz Inc
 Olympus America Inc
 Optrel Inc
 Osborn
 OTC DAHEN Inc
 Otto Trading Inc
 Oxyliance Inc
 Pador Marketing Group
 Panasonic Systems Solutions Company of America
 Pandjiris Inc
 PDS BarTech Inc
 Pearl Abrasive Company
 Pemamek LLC
 Penny Weld LLC
 PFERD INC
 Phoenix International Inc
 Piher
 Pittarc Welding Wires
 Plasma Automation Inc
 plasmoo USA LLC
 Plymovent Inc
 Pollstar Communications Pty Ltd
 POWER ROBOT
 Praxair Distribution Inc.
 Precitec Inc
 Preston Eastin
 Primo Automation Systems
 Pro Spot International
 Pro Systems LLC - A Lincoln Electric Company
 proAutomation LLC
 pro-beam GmbH & Co. KGaA
 Proceq USA Inc
 PROFAX / LENCO
 PSTproducts GmbH
 Pulsa
 PushCorp Inc
 Pyramex Safety Products
 Quantum Machinery Group
 Radyne Corp
 Rasco
 Resistance Welding Controls LLC
 Resistance Welding Machine & Accessory

WELDING

Rex-Cut Abrasives
 RIDGID
 Rite-Hite
 Robotic Technologies of Tennessee LLC
 Robotmaster a Hypertherm Company
 Rocon LLC
 RoMan Manufacturing Inc
 Roy Smith Company
 RWMA - Resistance Welding Manufacturing Alliance
 Saf-T-Cart Inc
 Sakura of America
 Saldatore Distribution Inc
 Sanpo Publications Incorporated
 SanRex Corporation
 SciAps Inc
 Selectrode Industries Inc
 Serimax North America LLC
 Servo-Robot Inc
 Shandong Aotai Electric Co Ltd
 Shandong Maik Tungsten Molybdenum Technology Co Ltd
 Shanghai Huawei Welding & Cutting
 Shanghai Kaisen Environmental Technology Co Ltd
 Shanghai TAYOR Heavy Industry (Group) Co Ltd
 Shanghai Wtl Welding Equipment Manufacture Co Ltd
 Shaver Industries
 Shenzhen Riland Industry Co Ltd
 sia Abrasives
 Sigma Steels
 SISMA USA Inc
 SKM Industries Inc
 SMA Abrasives USA LLC
 Sorex Welding Co Ltd
 Southern Stud Weld Inc
 SPI Lasers
 Stabila Inc
 Stanley Black & Decker Inc
 Steel Vision Tools
 Steelmax Tools
 Steiner Industries
 Strong Hand Tools
 STUAA Automation Co Ltd
 Suhner Industrial Products Inc
 Sumig Usa Corp
 Sumner A Southwire Company
 Sunstone Welders
 Superflash Compressed Gas Equipment
 Surewex USA Inc
 Surface Flow Technologies Inc/LSN Diffusion LTD
 T. J. Snow Company
 Taurus Englobe Ltd
 Taylor-Winfield Technologies Inc
 Team Industries Inc
 TEC Welding Products
 Techniweld USA
 Technogenia Lasercarb Technology
 TECMEN Electronics Co Ltd
 Tennessee Rand Inc - A Lincoln Electric Co
 Termmei Torch & Tip Company
 THE ROUECHE CO LLC
 ThermaCut Inc
 Thermal Dynamics

WELDING

Thermal Tech & Temp
 Thermco Instrument Corp
 Threaded Fasteners Inc
 Thred Taper
 Tianjin Jinlong Welding Material Co Ltd
 Tip Tig USA LLC
 Top Cat Air Tools
 Top Manufacturing Inc
 Trafimet Group S.p.a.
 Tregaskiss
 Trendex Information Systems Inc
 Tri Tool Inc
 Tru-Cutt Inc
 TRU-FIT Products TRU-Weld
 Trystar Inc
 TSI Inc
 TSS Worldwide
 TWI North America LLC
 UltraTech International Inc
 U-Mark Inc
 UNIARC
 United Abrasives Inc /SAIT
 United States Welding Corp
 Universal Robots USA Inc
 Uniweld Products Inc
 Urrea Professional Tools
 Uweld Technologies Co Ltd
 VANTERM MAKINA San. Tic. A.S.
 VDM Metals
 Victory CNC Plasma Systems
 Vitronic Machine Vision
 Vizint Manufacturing Solutions Inc - A Lincoln Electric Co
 voestalpine Bohler Welding USA Inc
 VSM Abrasives Corp
 W Weldpro
 Walter Surface Technologies
 Washington Alloy Co
 Watts Specialties Inc.
 WD-40 Company
 WDI Westfälische Drahtindustrie GmbH
 WEICON Inc
 Weiler Abrasives
 Weld Engineering Co
 Weld Pride USA For Weldbrush
 Weld Systems Integrators Inc
 Weldas Co LLC
 WeldComputer
 Weldcote Metals
 Welder Training & Testing Institute
 Welding Alloys USA
 Welding Consultants LLC
 Weldobot Technologies Inc
 Weldsale LLC
 WELDVIS, KOREA
 Wendt USA LLC
 West Chester Protective Gear
 West Warwick Welding Co
 Winnox Industries Ltd
 Wire Wizard Welding Products
 Wisconsin Wire Works Inc
 Wise Welding Technology & Engineering Co Ltd
 WITT Gas Controls
 Wolf Robotics LLC - A Lincoln Electric Co
 Wrefs Welding LLC
 Wuhan Welhel Photoelectric Co Ltd
 Wuxi Datang Welding & Cutting Mechanical Equipment Co Ltd

WELDING

Wuzhou Ally Protect Co Ltd
 Xiris Automation Inc
 Yaskawa America Inc
 York Portable Machine Tools
 Zhejiang Changzheng Project Carbon Electrodes Co Ltd
 Zhejiang Jingwei Welding & Cutting Technology Co Ltd
 Zhengzhou Research Institute of Mechanical Eng Co Ltd
 ZJ Industries Inc

EXPLORE NEW PRODUCTS AT FABTECH

The following pages in this New Product Preview offer a glimpse of what's in store at FABTECH. Find descriptions and images of new machinery, new materials and new processes listed by technology and company name. To view a complete list of all new products offered, click on the Exhibitor Search tab at fabtechexpo.com.

Additive Mfg

AddUp Inc

Booth A4141
FormUp® 350



An industrial metal additive manufacturing machine using multi-laser beam melting technology to produce mass production components or prototyping.

Bluestreak | Bright AM

Booth A3945
Advanced Part Build Tracking Capabilities

Order #	Part Number	Serial Number
2251	004476-000001_01	000001
2252	004476-000001_02	000002
2253	004476-000001_03	000003
2254	004476-000001_04	000004

With an electronic (or paper) traveler allowing the ability to track operating steps including out-of-sequence as well as advanced dispositioning of non-conformances.

CIDEAS Inc

Booth A3745
EOS P770



Powder Bed Fusion laser sintering machines.

Desktop Metal

Booth A3752
Studio System



Three-part solution that automates metal 3D printing. Tightly integrated through Desktop Metal's cloud-based software, it delivers a seamless workflow for printing complex metal parts in-house—from digital file to sintered part.

Laser Mechanisms Inc

Booth A3364
Direct Deposition Head



FiberWELD® DH is a high-power direct deposition head for processing macro-scale industrial and aerospace components. Delivers multi-axis laser energy to a center fed process wire for directional independence. For additive manufacturing, cladding and HLAW.

Protolabs

Booth A4350
Metal 3D Printing for Production



Metal 3D printing service offering several secondary processes like post-process machining, tapping, reaming, and heat treatment and also offering powder analysis, material traceability, process validation, and inspection reporting.

Tethon 3D

Booth A4241
Bison 1000



Ceramic DLP desktop printer.

Xometry

Booth A4343
Carbon DLS Capabilities



Xometry connects customers with manufacturing solutions through proprietary AI algorithms offering CNC Machining, Sheet Metal, Injection Molding, and 3D Printing.

MakerBot 3D Printers

Booth A3739
MakerBot METHOD X



The MakerBot METHOD X manufacturing workstation prints with real ABS, a 100°C build chamber, and SR-30 supports to deliver dimensional accuracy, precision, and reliability.

Arc Welding

Miller Electric Mfg LLC

Booths B19054, B23054
Deltaweld® System with Intelx™ Feeders



Deltaweld Systems deliver pulsed MIG capabilities to help operations reduce welder training time, minimize spatter and rework, and improve weld quality. The Intelx Pro dual wire feeder option provides even greater flexibility.

Multimatic® 255 Multiprocess Welder



Reduce downtime and increase productivity with this multiprocess welder that delivers MIG, stick, DC Lift-Arc™ TIG and pulsed MIG capabilities — making it ideal for professionals in the light manufacturing, fabrication and MRO segments.

Millermatic® 255 MIG Welder



Built for professionals in the light manufacturing or fabrication segments, this smaller, more versatile machine is capable of welding metals up to 1/2-inch thick with an output rating of 230 amps and 25.5 volts at a 60 percent duty cycle.

Multimatic® 220 AC/DC Multiprocess Welder



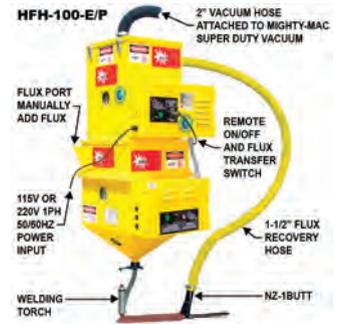
Delivers all-in-one capabilities for MIG, flux-cored, DC TIG and DC stick welding, plus the addition of AC TIG. Welders can tackle more projects and more materials — now offering AC/DC TIG from 24-gauge to 1/4-inch thick aluminum and steel.

Weld Engineering Co
Booth B18035
AS-4 - Electric Flux Recovery



The AS-4 is the Mighty-Might standard duty submerged arc flux recovery system with patented self-cleaning filter technology. Mounts onto most sub arc welding equipment.

HFH-100-E/P - Heated Auto Flux Hopper/Separator



The HFH-100-E/P is a heated 150 pound (or larger) low-mount flux hopper and separator that automatically transfers recovered flux to the welding torch for continuous welding and flux recovery operation. Used with the Mighty-Mac Super Duty Vacuums.

NEW PRODUCTS

VIRO WSI SEES MORE



Instead of Recalls: Automatic Weld Seam Inspection with VIRO WSI

Defective weld seams in automotive manufacturing often have serious consequences. The solution? The VIRO WSI optical inspection system from VITRONIC. The new generation of sensors is even more compact, faster, and more powerful and inspects all types of weld seams. Thanks to in-line, direct inspection, VIRO WSI also enables rapid intervention in the upstream welding process. This sustainably reduces defects, optimizes processes and ensures fewer downtimes, rework and rejects.

Weld seam inspection from the technology leader. www.vitronic.com

Arc Welding

Weld Engineering Co

Booth B18035

LAFV-32 & MAFV-32 - OEM Replacement Hopper Valves



The LAFV-32 and MAFV-32 valves give complete valve closure and prevent problems associated with OEM hopper valves, especially using pressure feed (PT-100, HPT-100, PFR-3000, HPR-3000, HPFR-HAMX-3000) or flux recovery (XP-3, XP-4T) systems.

Assembly

Multipress Inc

Booth D45054

M5P Bench Top Press



A model M5P bench top press with dual anti-tie-down start buttons including pressure shift speed change and pressure reversal.

PFERD INC

Booth B31017

INOX-TOTAL Brushes



A line of brushes with all components: wire, face plate and stem built out of 302 stainless steel. The line features both crimped and knot wire wheel and bevel brushes.

Automation

Amada America Inc

Booth A2103

AMS 3015 CL Automation



The AMS 3015 CL was engineered to provide a flexible automation solution that reduces unnecessary machine downtime due to manual material loading.

MC Machinery Systems Inc

Booth A2923

ASTES4 Laser Automation



Fully integrated system provides seamless communication between the laser and the sorting mechanism.

Murata Machinery USA Inc

Booth A4901

Motorum M2044TS with RL1212



This 22-ton, punch press, uses a servo-electric drive system for simple and reliable processing. A large turret provides flexibility and a small table for limited space. Paired with the RL1212 load/unload system, the punch can work for hours unattended.

Pemamek LLC

Booth B35050

PEMA WeldControl



PEMA WeldControl streamlines the communication between operator and machinery during welding operations. Production data monitoring, diagnostics, tracking, and robot programming can be performed by one operator on a one-panel control system.

Shop Floor Automations Inc

Booth A5174

DataXchange ODI - Operator Data Interface



The ODI replaces the previous Data Entry window for the machine monitoring system. More user-friendly and visually appealing.

DataXchange SRC Adapter



Connect fabricating equipment with the Status Relay Control (SRC) - any machine, brand and age of equipment.

RS232 to USB Upgrades



The Pendant and Portable USB Connect devices help fabrication shop floors modernize RS232 ports.

Bending/Forming

BLM Group

Booth A2153, D46532

3 RUNNER End-Forming Machine



Straightening, end forming, cutting. The 3-RUNNER is a complete tube production process starting from a coil which, straightens, forms (up to six stations), faces, cuts and unloads the finished part. All in one continuous operation.

Elect All-Electric CNC Tube Bender



All electric CNC tube bending machines for tubes up to 150 mm (6"). Configurable for right- or left-hand bending.

E-TURN All-Electric CNC Tube Bender



CNC mandrel tube bender for pipes and profiles up to 50.8 mm in diameter. In-process right-hand/left-hand bending.

Carell Corporation

Booth A5743

Plate Rolls



Carell Corp. has partnered with PARMIGIANI, builder of high-quality plate rolls to offer 4Roll, 3Roll and Translating Geometry Rolls.

Durma North America Inc/Durmazlar/DURMABooth A2934
Blue Bend Panel Bender

Increases piece production efficiency using advance technology and provides full capacity automatic tool changing with minimal adjustment timing.

Eagle Bending Machines IncBooth A5743
CPS-20 H/V Roll Bending Machine**"CPS-20 H/V"
Universal Section Roll**

Hydraulic Roll Bender designed to operate in both horizontal and vertical positions. This universal roll is complete with programmable controls and universal tooling.

HAEUSLER AG DuggingenBooth A5319
HAEUSLER EVO CNC 4-Roll Plate Bending Machines

EVO four-roll plate bending machine includes as standard the latest graphically supported CNC Control BENDtronic®, the VSA® variable side rolls swing arm technology and the HAEUSLER Hybrid Drive System HHDS®.

Herber Engineering ABBooth D46559
2400S All Electric 4" Boosted CNC Bender

The Herber 2400S is capable of bending up to and including 4" Stainless Steel tubes and was designed for the rigors of high production while offering a

unique design for contract manufacturers where seconds and flexibility count.

Mate Precision ToolingBooth A3168
Wila Trumpf Style Press Brake Tooling

Expanded Wila Trumpf Style press brake tooling with over 30 punch and die profiles. Additions include punches with acute, sash, gooseneck and blade profiles. 55mm height dies have a wide range of V-openings and angles at 30°, 80° and 86°.

**Visit Caplugs at FABTECH 2019.**

We will be exhibiting a variety of new masking components, including blind weld nut plugs, at FABTECH 2019. This series is ideal for threading a mask through a weld nut. Made from our Ultrabake™ material, these reusable plugs are ideal for use in high temperature finishing processes such as:

- Powder coating
- Plating
- E-coating
- Anodizing

Caplugs Masking Specialist Chris Malone will be speaking on "Masking, the Key to Quick Cost Savings" on Monday, November 11 from 2:30 - 3:00 p.m.

Product Protection | Masking Solutions | Custom Molded Components

- Injection Molding
- Extrusion
- Rubber Molding
- Vinyl Dip-Molding
- Vinyl Coating
- Die-Cutting



www.caplugs.com/masking

1.888.CAPLUGS | sales@caplugs.com

Stop by to see Caplugs
at Booth B16055.

Bending/Forming

MetalForming Inc

Booth A2162

Schröder MAK4 EVO 40/5 UD
ATC AHS



The Advanced Handling System features the dynamic combination of automatic tool change, up and down bending, and automated part manipulation fully automating the entire bending process.

Schwarze-Robitec GmbH

Booth D46541

CNC 25 E TB MR

Fully electric tube bending machine for smaller tube diameters with intelligent NxG control system. Almost all CNC axes can be operated simultaneously during bending - reducing production times enormously.

Star Bend - Star Technology SrL

Booth D46559

Star 450 - 1.75/2" 3-Stack
4-Axis CNC Bender



The re-envisioned Starbend electric CNC bending machine features include an electric bend head, slim line bend head, independent bend die return, carriage boost and more.

Steelmax Tools

Booth B33050

ABM50 Double Side Plate
Beveling Machine

A digital display provides precise control of bevel geometry and full digital control of milling head and travel speed. Lay the foundation for high quality welds with precise, consistent bevels.

TRUMPF Inc

Booth A2904

TruBend 7050



The TruBend Series 7000 is known for speed and ergonomics, and increasing the size and tonnage brings the high level of productivity to a wider range of parts.

Coil Processing

Allor Manufacturing Inc/ Plesh Industries

Booth A5062

Precision Tapered Backup
Bearings



Backup Bearings give direct interchange 2.5"- 11.375". All are sealed or shielded for life and are heat-treated using bearing-quality steel.

Pull-Thru Slitting Line Leveler



Roll plunge based on gauge and yield, positions machine for desired plastification. Real time roll bending corrects strip defects. Auto side shift cassette change. 4-HI machine allows for 5 or 6-HI with no mods required.

Work Rolls



Work Rolls from 0.75" - 12.00" in diameter meet the highest standards for material, finish, tolerance, strength and reliability to keep production moving for leveling equipment. Available in "inch" and "Metric" diameters.

The Bradbury Group

Booth A4375

Athader Double Eccentric
Slitter Heads



Athader's double eccentric slitter head produces a clean strip edge with minimal penetration, enhancing the edge quality of cut strips and reducing wear on the slitter knives and motor.

Cutting

Durma North America Inc/Durmazlar/DURMA

Booth A2934

Fiber Laser Tube Cutting
Machine



High quality components, great efficiency and includes a complete automatic loading and unloading system requiring less effort, while saving time.

HYMSON

Booth A4396

HF H Series



High power smart laser cutting machine with outstanding power up to 15kW, a multiple of extension choices and great design for automatic production line.

HF LU Series



All-in-one laser cutting machine with an automatic loading and unloading system, parallel kinematic technology, superior performance in thin materials and assembly with retractable grippers to ensure remarkable precise cutting.

HP D Series



Expert-class ultra-high speed intelligent machine tool with an automatic loading and unloading system that can easily handle a variety of tube shapes and fully covered with protection.

Park Industries

Booth A5342

KANO HD CNC Plasma Cutting
Machine



The KANO™ is available in six machine sizes and is configured with a Hypertherm EDGE® Connect CNC, a Hypertherm® high definition plasma system, optional oxy-fuel cutting torch and choice of cutting table style.

COME SEE THE
KANO™ HD
IN ACTION AT
FABTECH
#A5342

BUILT LIKE A TANK

The KANO™ HD features a design that will thrive through years and years of high production volumes. No shims or jack screws are ever used to adjust the components straight - that's accuracy!

Since 1953, Park Industries® has proudly brought American manufacturing ingenuity and world-class machinery to fabricators across North America. Their state-of-the-art manufacturing facilities are tooled with highly sophisticated 5-Axis mills that produce some of the highest precision machines on the market today.

Available in six machine sizes, the KANO™ HD is configured with a Hypertherm EDGE® Connect CNC, a Hypertherm® high definition plasma system, an optional oxy-fuel cutting torch and your choice of cutting table style.



KANO™ HD

- True Unitized Machine Frame
- Independent Cutting Table
- 6, 8, & 10 Ft Wide
- 12 & 24 Ft Long
- Plasma & Oxy-Fuel
- 3 Cutting Table Styles
- Built to ISO-230-2 Machine Tool Accuracy and Laser Verified

 **Park Industries®**
Precision. Performance. Peace of Mind.™

// Contact us today to learn how the KANO™ HD can help increase your productivity.

800.328.2309 // parkindustries.com/kano

Cutting

Piranha \ MegaFab

Booth A4924
PIRANHA B-Series Plasma Table



The B-Series plasma table is perfect for hobby to light industrial cutting needs. Available in 4'x4', 4'x8' and 5'x10' models with power ranges up to 125 amps.

Thermacut Inc

Booth B19062
EX-TRACK Portable Cutting Machine

The EX-TRACK unit is a light-weight and highly portable CNC cutting system that can be easily transported and assembled.

Products for HPR®400XD

A suitable replacement series of consumables, torches and accessories for the HPR®130XD, HPR®260XD or HPR®400XD HyperPerformance® cutting systems.

Finishing

ARKU Inc

Booth A3162
EdgeBreaker® 3000



Deburring machine in ARKU's deburring and edge rounding portfolio offering fast and efficient double-sided deburring and rounding of laser cut parts.

Caplugs

Booth B16055
BWNP-SH Series of Blind Weld Nut Plugs



The reusable BWNP-SH Series plugs are designed to mask blind weld nuts where it is not possible to thread a mask through the weld nut. They are also ideal for use when it's easier to install a mask into the weld nut from one side.

Durr Systems Inc

Booth B13066
EcoAUC



EcoBell and EcoGun Control Unit. PLC and valve technology allows operating color change systems from the EcoMCC family with up to 10 colors.

EcoDose 2K



Electronic dosing system suitable for high and low pressure applications. It can be used in

manual and automatic processes. Optimized for quick color changes and easy flushing.

EcoPump Packages



Fully assembled, portable, ready to use modules.

EcoRP 10 R1100



The ready2spray robot is a high performance, compact, paint robot for industrial applications.

Rotary Package - EcoBell2 SL



Applications by rotary atomizers. Optimal integrated 2k - Unit.

System Application Equipment
 Color change, dosing and atomization. Dual shaping air ring for spray pattern regulation from 90 to 600 mm.

Ensitech Inc

Booth B37043
TBE-440



The TBE-440 is optimized to include the latest advances in TIG Brush™ technology and streamlined to deliver quality.

TBE-550



The TBE-550 utilizes a specifically focused adaptation of the 700 series design, to align its performance with Ensitech's latest technological advance, the PRO-PEL™ Torch.

TBE-700



Powerful, reliable, electrochemical weld cleaner at 90amps @ 100% duty cycle.

Gema USA Inc

Booth B13034
Dynamic Contour Detection



The Dynamic Contour Detection laser scanner offers a higher level of automation for powder coating. The innovative design detects object geometries, aligning each gun to the correct position to coat the most complex components.

MagicControl® 4.0 Control Unit

MagicControl® 4.0 provides full control for all automation aspects such as guns, reciprocators and booths for powder coating systems. This allows complete operation of the coating line and consistent process reliability.

OptiCenter® All-in-One Powder Center

Powder center combining powder feeding, control and electrostatics. This space-saving design provides fast color changes, stable coating results, clean working conditions and trouble-free maintenance.

OptiFlex® Pro Series

OptiFlex® Pro series brings high performance to manual powder coating. PowerBoost® technology delivers 110,000 volts of power for quick and efficient powder coating.

OptiFlex® Pro Spray Series

OptiFlex® Pro Spray powder coating series provides superior application performance and quality for operations with frequent color changes that require a stable powder output over extended time and long distances.

OptiStar All-in-One® Control Unit

OptiStar All-in-One® control unit combines electrostatics and powder feed in one compact device. This design eliminates all pneumatic lines between injector and control unit and enables space-saving system integration.

Graco Inc

Booth B13030
Pro Xp Electrostatic Spray Guns
Over 50 out-of-the-box models.

Lesta USA-Self Learning Painting Robots

Booth B11054
LestaUSA Self Learning Painting Robots



A simple self-learning robotic painting technology mirroring intricate human movements without the need for programming.

PFERD INC

Booth B31017
POLIVLIES®



PFERD's POLIVLIES® ceramic oxide CO-COOL flap disc is an addition to the POLIVLIES® flap, and hook and loop discs.

Inspection & Testing

Accurate Technology Inc
Booth D46450
ProTable-GA



Large format measuring table capable of locating any point in X, Y space for Quality Control checks. Accuracy within +/- .005 inches for non-contact systems. Ranges up to 35x120 inches. Ideal for all part formats up to 4 inches thickness.

Aquasol Corp

Booth B17012
PRO OX®-100 Kit



Programmable handheld digital oxygen monitor with a 2-Point Calibration procedure designed to give operators the most precise oxygen level readings.

Fischer Technology Inc.

Booth B10026
FERITSCOPE FMP30



Precise measurement instruments to determine the proportion of ferrite quickly and non-destructively.

FISCHERSCOPE® X-RAY XAN® 500



The XAN®500 X-ray fluorescence instrument can be used as a handheld device, as a fully enclosed desktop unit or integrated directly into production lines. Coating thickness measurements with WinFTM® software is based on the fundamental parameter analysis.

Inspection & Testing

Accurate Technology Inc

Booth D46450

MMS® INSPECTION



A handheld dry film thickness gauge for coating thickness measurement on steel and non-ferrous metals. Measuring ranges: 0-2500 µm on FE and 0-2000 µm on NF (DFT).

PHASCOPE® PAINT

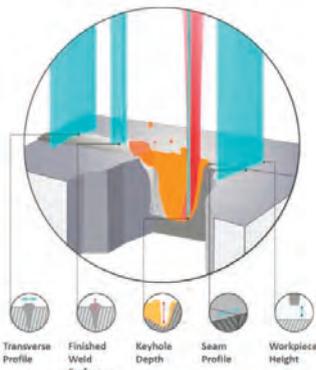


The pen-like PHASCOPE® PAINT is ideal for fast and easy thickness measurement of paint layers on ferrous and non-ferrous metals. Statistical evaluation of the readings is carried out on a smartphone using the intuitive Fischer app.

IPG Photonics

Booth B19038

LDD-700 In-Line Scanning Weld Monitor



In-line weld monitoring system uses in-line Coherent Imaging to confirm quality of welded parts in real-time. An IR laser beam fired through the same optics as

the welding laser records weld depth, finished surface transfer profile and bead height.

Vitronic Machine Vision

Booth B31104

Weld Seam Inspection VIRO WSI with New Sensors



With newly developed sensors, the automated weld seam inspection is even faster and more compact and has been optimized for MIG/MAG and for laser seams.

Lasers

Amada America Inc

Booth A2103

EML 2515 AJ (3kW) Fiber Laser/Punch Combination



Amada's most popular combination machine pairs the multi-purpose turret with the unlimited shape cutting flexibility of a fiber laser. This grants fabricators the flexibility to work with their customers to create better part designs.

ENSIS 3015 AJ (9kW) Fiber Laser Cutting System



9kW ENSIS fiber laser technology utilizes a collimation system so fabricators can process both thin and thick materials without a cutting lens change or manual setup.

ENSIS 3015 RI (3kW) Fiber Laser Cutting System



Engineered to include an innovative Rotary Index with the power and speed to efficiently transition from flat sheet to tube or pipe cutting in as little as two minutes.

FOL 3015 AJ (9kW) Fiber Laser Cutting System



Now available in 9kW and engineered to produce the highest quality parts at unmatched speed while reducing operating costs and environmental waste.

Ventis 3015 AJ (4kW) Fiber Laser Cutting System



The Ventis 3015 AJ Fiber Laser Cutting System uses Locus Beam Control (LBC) technology to control the kerf width of the laser beam when processing stainless steel and aluminum.

BLM Group

Booth A2153, D46532

LC5 Combo Lasertube/Sheet Metal Laser Machine



Cuts tube and sheet on the same machine.

LS5 Flat Sheet Laser Cutting System



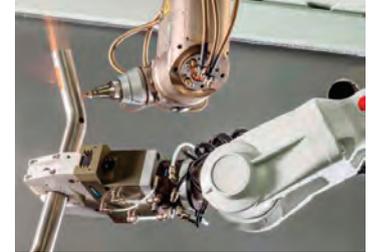
LS5 is one of the markets most complete solutions, designed to evolve with needs. The very compact and configurable layout can be suited to fit available space and processing requirements.

LT7 Lasertube



Fiber laser processing machine for tubes and profiles that assure the best cut accuracy at the highest productivity.

LT-FREE 5-Axis Laser Cutting Machine



Bent tubes, hydroformed components, tubular assemblies or stamped parts. The LT-FREE 5-axis laser cutting machine is perfect for processing any 3D part with high precision and excellent cut quality.

Bystronic Inc

Booth A2122

ByStar Fiber 12kW Laser Cutting System



ByStar Fiber with 12kW laser has an expanded spectrum of cutting applications, a unique cutting head for exceptional speed and cutting quality from thin sheet material to thick plate.

Dallan America Corp

Booth A5952

Dallan LXN



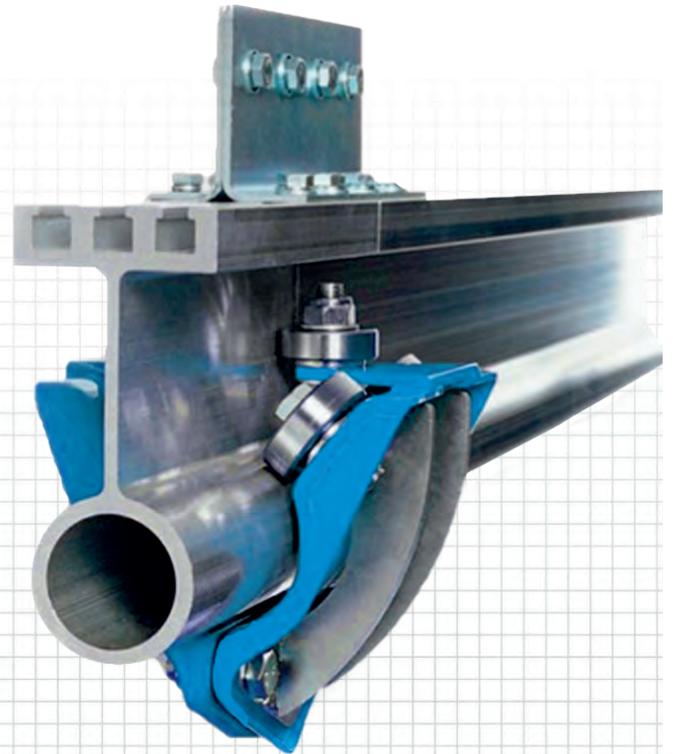
Lean machine for metal fiber laser with revolutionary technology that provides the freedom and flexibility to work starting from coil or standard sheet, up to 40 ft long with the maximum precision.

ALTRAC CRANE SYSTEMS

at FABTECH for the first time

- JIB CRANES
- GANTRY CRANES
- MONORAIL CRANES
- MOBILE CRANES

Custom designed to get the most efficiency out of your manufacturing facilities



•MODULAR •STRONG •VERSATILE •LIGHTWEIGHT

With a 30 year history of improving manufacturing, an Altrac crane system is a proven way to increase throughput



Visit us at FABTECH Booth A6368
or contact us for more information

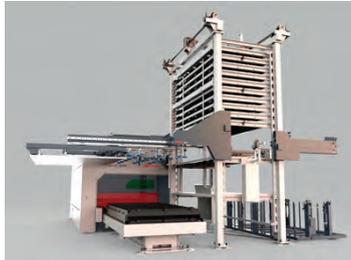
• 844 902 5278 • www.AltracUSA.com

Lasers

Durma North America Inc/Durmazlar/DURMA

Booth A2934

Fiber Laser Machine with Ten Table Tower



Fast cutting and energy efficiency capabilities. Easy to use and easy to maintain and service.

KNUTH Machine Tools USA Inc

Booth A3150

ACE Laser



The KNUTH ACE Laser 3015 2.0 has a 5' x 10' cutting table, 2 kW IPG fiber laser source, Precitec cutting head, CypCut CNC control software with nesting function and automatic shuttle table.

Lasermet Inc

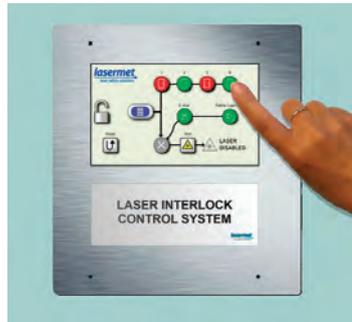
Booth A1247

Falcon Active Speed Door with Active Laser Guards



A fast, industrial, laser safe, roller shutter door fitted with "Laser Jailer" Active Laser Guarding. The interlocked laser is enabled only when the door is closed. Any laser strike on the door is immediately stopped.

SLIC - Screen-operated Laser Interlock Controller



The SLIC is the latest touch screen operated laser interlock control system that connects to the main interlock controller (ICS-7-SP) via an RS232 link. The interlock will only enable the laser to fire once all switches and doors are closed.

Lumentum

Booth A3399

CORELIGHT® YTK High-Power Fiber Laser Systems



CORELIGHT Series high-power fiber laser systems feature exceptional brightness enabling high-quality and high-speed cutting performance of mild steel, stainless steel, aluminum, copper, brass, and many other materials.

Mate Precision Tooling

Booth A3168

Laser Accessory Products



Over 500 laser accessory products for the rapidly growing fiber and CO2 laser market.

Mazak Optonics

Booth A4202

OPTIPLEX FIBER III 10kW



OPTIPLEX FIBER 10kW utilizes Mazak's PreviewG control and high-performance drive package that provides higher productivity through high-speed and high-accuracy. Also equipped with intelligent functions that simplify operation and reduce operator dependency.

MC Machinery Systems Inc

Booth A2923

EX-F 8kw



All-in-one Zoom Cutting Head design provides adaptable, automated focus lengths between 3.75 and 10 inches and automatic beam diameter alignment, and comes standard on the 6kw and 8kw. Cut thin and thick materials with ease, including up to 1-inch mild steels, without setup.

SR-F 4kw



The small footprint fiber laser. Motion Cut technology features the beam on/off time and axial movement simultaneously to eliminate the need for the axes to stop.

Mestek Machinery Inc

Booth A3975

Laser-Max 1.5 with Coil Feed



The next evolution in the Vulcan cutting systems featuring a premier fiber laser cutting system, the Laser-Max 1.5 creates a clean, quality cut with minimal heat affected zone on the cut edge.

Murata Machinery USA Inc

Booth A4901

LS3015GC 8.0kW Fiber Laser



This laser can cut ferrous and non-ferrous materials alike. The LS3015GC features a small footprint, upgraded drive system and the power of an 8.0kW fiber.

Piranha \ MegaFab

Booth A4924

PIRANHA M-Series Fiber Laser



Piranha M-Series laser cutting machines are designed to run a wide range of material types and thicknesses. Available in 4 kW or 6 kW cutting heads, the M-Series fiber laser is a highly productive tool for a variety of applications.

Thermacut Inc

Booth B19062

EX-TRABEAM® PRO

Fiber laser cutting head with low-drift regulation and auto focus features for optimal cutting results.

TRUMPF Inc

Booth A2904

TruLaser 5030 Fiber



The TruLaser 5030 fiber introduces several innovative features for improving productivity and cut quality, Smart Nozzle Automation with QuickSwap and Active Speed Control.

Lubrication

Unist Inc

Booth D46339
 Unist SmartFlow™ Controller



Easy-to-use controller allows for simple setup, advanced control integration, fluid usage tracking, process monitoring, diagnostic and maintenance tools. Pair with Unist applicator for an intelligent lubrication system.

Machining/EDM

Uelner Precision Tools & Dies

Booth D46273
 OKK MCV 1260 Cat 50 35HP CNC Mill

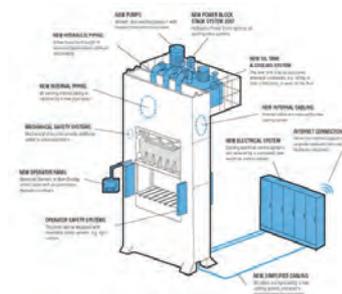


With the addition of the OKK CNC mill, Uelner is now able to machine almost all die sets in-house in one setup.

Maintenance & Repair

Hydraulic AS

Booth D45664
 Hydraulic Press Upgrade/Refurbishment



Complete or partial press upgrades, within just three weeks on virtually any kind of hydraulic press.

HydraulicLink

A digitalized solution allowing best-in-class maintenance and placing Hydraulic as a potential service partner, no matter the brand of hydraulic presses.

PFERD INC

Booth B31017
 VICTOGRAIN®



VICTOGRAIN® precision-formed abrasive grain is used to make grinding products.

NEW PRODUCTS

A large advertisement for Corona nLIGHT Programmable Fiber Lasers. The background is a close-up of a person's hands in brown leather gloves holding a blue laser-cut metal part. The text 'nLIGHT' is in a dark blue box. At the bottom, the Corona logo and 'Programmable Fiber Lasers 3-15kW' are displayed. Contact information for FABTECH Booth A3550 and www.nlight.net is provided.



Programmable Fiber Lasers 3-15kW

FABTECH Booth A3550
www.nlight.net

Material Handling/ Marking

Altrac USA

Booth A6368

Altrac Gantry Crane



A modular, lightweight system that adapts to any environment. No need to upgrade existing structures to achieve handling loads up to 1 ton and the extendable systems can grow with business.

Blue Water Engineering Pty Ltd

Booth A5033

Forklift Vaclift FVL500PT



Vacuum lifter to enhance safety when lifting or moving material. Design features, significant modifications and advancements to the vacuum system include an internal self diagnostic vacuum checking and component identification system.

InfoSight Corporation

Booth A3555

KettleTag®PLUS



Galvanizing tags with text and bar codes that survive the entire galvanizing process.

LabelLase® 1000



Laser-powered metal tag printer that is durable, reliable, versatile and easy to use.

LabelLase® 30XX Tag Printer



Prints more tags in less time. Its speed makes it especially valuable when production lines increase speeds, or more data is needed on tags.

LabelLase® 4000 Tag Printer



High speed desktop metal tag printer with sharp, clear text, bar codes, logos, graphics, and user selectable fonts.

PaintTag™



Tracking cast or heat numbers. ProAcid clean, then paint start to finish traceability. PaintTag is ideal for tracking work pieces through acid prep and painting operations.

ShotTag™



Acid rinse then bead blast with one tag for the entire process. ShotTag is designed to withstand bead and steel shot blasting applications.

Mestek Machinery Inc

Booth A3975

Iowa Precision Coil Feed



A highly integrated Coil Feed system with wireless capabilities to eliminate the need to load material by hand for the upload and reloading of coil production for either a plasma or laser-cutting tables.

MetalForming Inc

Booth A2162

Böckelt Flexible Storage and Logistics System



The intelligent storage, inventory, and production management system offers customers reduced set-up times, increased productivity and machine uptime, and lower operating costs.

Other Machinery/ Equipment/Parts/ Products

Daubert Cromwell

Booth D46253

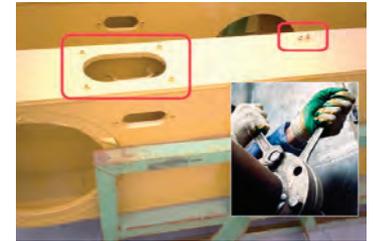
Clear Pak® 5000 Film

Environmentally friendly film protects steel, aluminum and copper. Bio-based, nitrite and amine-free. Internationally approved for industries such as automotive, electronics, aerospace and precision machined parts manufacturing.

Premium Metal-Guard® VCI Bubble Bags

Flexible, adhesive-top bubble bags that protect metal parts from physical damage and corrosion during storage and shipment.

Safecote® CLV



Rust preventive liquid protects internal threads on machinery stored outdoors. Low VOC, does not require removal. Ideal for rental equipment and heavy duty construction machines where long-term corrosion prevention is critical.

FENN

Booth D46456

Fully Automated Turn-Key Swaging Solution



Fully integrated turn-key rotary swaging solution complete with robotics, a sound enclosure, a hydraulic feeder table, and a FENN 3F swager. Benefits include improved equipment safety, reduced set up time and reduced operating costs.

Hydraulic AS

Booth D45664

Electronic Shimming Plate System



Patented Electronic Shimming Plate™ offers extreme blankhold control and short start-up time in monoblock deep drawing. With deep drawing, material flow changes significantly during drawing, often causing problems with wrinkles and cracks.

Midwest Automation

Booth A3179

Niagara Wet Dust Collectors



Niagara Wet Dust Collectors from Midwest Automation designed to efficiently clean or filter contaminated air in a variety of operations that create metal dust and other abrasive media residue. Available in three new series and fifteen different models.

Newcastle Systems Inc

Booth A3178

QC Series Mobile Powered Workstation



QC Series Mobile Powered Workstations designed for mobile quality testing, measurement and inspection as well as other processes requiring vast storage capabilities.

TAB Industries LLC

Booth A3384

TAB Wrapper Tornado Smart Controls



The Smart Control package uses a position encoding system to automatically set the dispensing unit at its home location in the wrapping ring, apply the plastic film, then cut it, holding onto the stretch-wrap for the next pallet load.

"LOOK FORWARD TO SEEING YOU IN CHICAGO"



Lisa Johnson
COLE-TUVE, Inc.
Owner

AFFORDABLE PRODUCTIVITY

We offer a complete line of Metal Fabricating Machines. Our professional sales team can help you find the right machine at the right price. You'll enjoy working with us!

FABTECH BOOTH A4574

LARGE, IN-STOCK INVENTORY

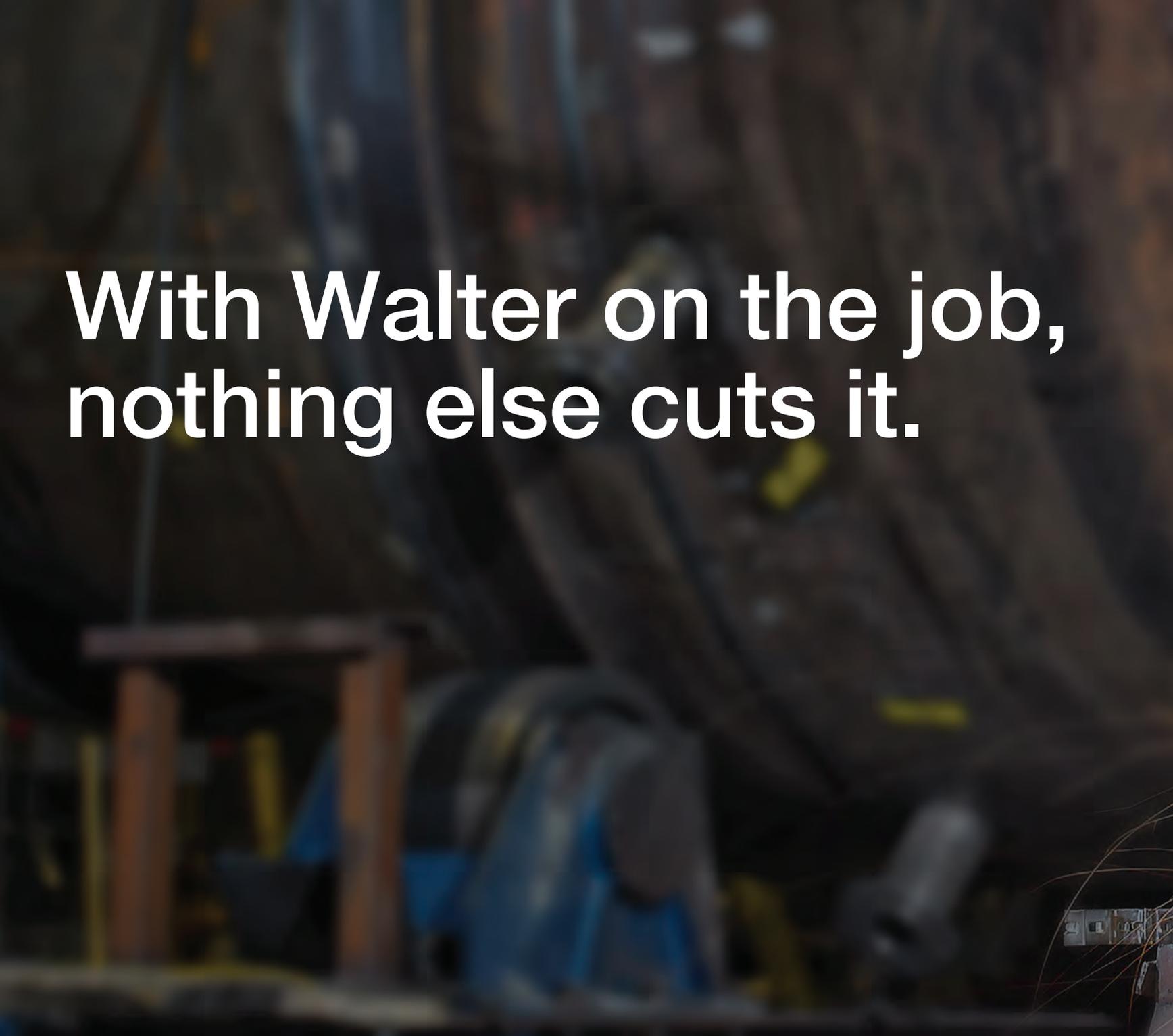
(877) 989-0700
sales@coletuve.com
coletuve.com



**SHEET & PLATE BENDING ROLLS • ANGLE & SHAPE BENDING ROLLS
FLANGING MACHINES • PRESS BRAKES • PRESSES • TRIM/BEAD MACHINES**

Exclusive North American Distributor for 25 Years





With Walter on the job, nothing else cuts it.

Zip Wheel™

THE INDUSTRY'S LEADING AND MOST TRUSTED CUT-OFF WHEEL

Some might be satisfied with good. And some might settle for better. But when the only option is the best, it's got to be the Zip Wheel™ from Walter Surface Technologies. The Zip Wheel™ is engineered to deliver the most cuts in the industry. And only Zip Wheel™ features a patented rib design that cools the surface and reduces friction. That means no cut-off wheel cuts straighter, sharper, smoother, faster — or safer.

For more information, visit walter.com/zipwheel 1-800-522-0321

WALTER
 Surface Technologies
 Only the best.™



FABTECH

Visit us at booth B35035

Other Machinery/ Equipment/Parts/ Products

UltraLox

Booth D45868

ULTRALOX INTERLOCKING™ TECHNOLOGY



ULTRALOX INTERLOCKING™ TECHNOLOGY produces durable, cost effective, attractive pre-assembled aluminum railing and fence products within minutes.

Plate & Structural Fabricating

VOORTMAN USA

Booth A2169

Voortman V807



Voortman V807 robotic thermal profile processor brings the versatility and capabilities of robotic plasma and oxy-fuel processing into a footprint reduced by more than 50%.

Press Brakes

Accurpress

Booth A2980

Accurpress Heavy Duty Press Brake



The Accurpress Heavy Duty Press Brake line offers solutions for jobs requiring maximum flex-

ibility for specialized plate forming jobs. With massive builds and optional accessories, the Accurpress is built for any advanced forming challenge.

Amada America Inc

Booth A2103

EG 4010 All-Electric Press Brake



The EG 4010 is a compact press brake solution to produce small sheet metal components that demand a high degree of precision.

HRB 1003



Very latest press brake technology to be built in High Point, NC.

HRB 1003 ATC



Very latest press brake technology with automatic tool changer to be built in High Point, NC.

Durma North America Inc/Durmazlar/DURMA

Booth A2934

Electric Press Brake Series



The drive system is simplified yet stronger and does not require oil to generate press power, works for a long time on the same calibration, and provides high-energy usage savings solutions while keeping the fast speed, efficient production, and quality.

Press Brake Machine



Specially designed to operate in excellence and built with high quality components making them fast, reliable, and precise Press Brakes.

ErmakUSA/Ermaksan

Booth A2954

ERMAKSAN FX Series Servo Electric Press Brake



Press brake offering fast and green bending solutions. Belt technology eliminates the need for crowning on the bed and comes with 3D graphical touchscreen controller and offline software.

MC Machinery Systems Inc

Booth A2923

BB306



Diamond BB Series Electric Press Brake with AC Servo motor and ball screw mechanism for high-speed productivity and repeatability ($\pm 0.001\text{mm}$).

BB6020 with Videre



Diamond BB Series Electric Press Brake features 100 percent Mitsubishi electronics, motors and servo drives.

BH13530 with Automatic Tool Changer



Diamond BH Series Hybrid Press Brake features Dual Drive system controls high-speed up and down movement with a ball screw and bending movement by hydraulic piston.

MVD Makina Sanayi A.S.
Booth A5350
Servo Electrical Press Brake



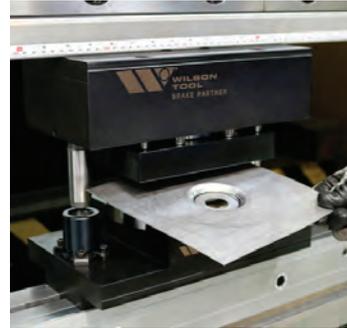
Press brake featuring up to 50% less energy consumption, up to 30% more productivity, noiseless, accurate positioning, clean environment without hydraulic oil, a recall and save bendings with barcode scanning system and ergonomic design.

Piranha\MegaFab
Booth A4924
PIRANHA T-Series Press Brake



The T-Series Press Brake is a machine that fits well in applications that do not need sophisticated control or back gauge options. Available in models ranging from 35-280 tons, this machine comes with standard X-Axis back gauge and a simple CNC control.

Wilson Tool International
Booth A3114
Brake Partner™



Brake Partner™ lets shops use punch press tooling to make forms in the press brake. This innovative solution can help lower costs and reduce lead times, thanks to the streamlining of equipment and machine flexibility it offers fabricators.

Xtreme Lift



With its easy-glide rollers and hand-pump hydraulics, the Xtreme Lift is one of the safest and least strenuous options to help operators load tools into a press brake.

Pacific Press Technologies
Booth A3979
Pacific Blaise 175-ton Press Brake



The competitively priced Blaise press brake includes intuitive software, a heavy-duty frame, and .0004" precision accuracy. Part programming is a breeze with the user-friendly interface and on-screen help buttons of the Delem HMI Machine Controller.



Chillicothe, Ohio USA 45601
+1-740-642-3600
www.infosight.com
sales@infosight.com

Identification and Traceability Solutions for Galvanizers and Fabricators











Booth A3555
Chicago, IL November 11-14, 2019



Booth 4154
New Orleans, LA November 19-21, 2019

Punching

Durma North America Inc/Durmazlar/DURMA
Booth A2934
TP Punch Press Series



Provides high quality, precise forming, fast turret, upgraded hydraulics, and three automatic indexing stations, a movable table, unloading hopper, automatic clamps, cad-cam software, and a main control system.

Mate Precision Tooling

Booth A3168
Mate QCT™ Quick Change Tooling Line



Mate QCT™ tool-less punch retention system now includes Metric QCT™, AMX QCT™ for Amada air blow systems and MXT QCT™ for Wilson Series 90 systems.

TRUMPF Inc

Booth A2904
TruMatic 1000 Fiber with SortMaster



The TruMatic 1000 fiber increases the range of automated production with the SortMaster Compact. The SortMaster Compact removes, sorts and stacks individual parts up to 24" x 16" and up to 33 lbs.

Robotics

Abicor Binzel
Booth B19062
TH6D-GF



Optical seam tracking sensor using a combination of laser lines and cameras allowing the course of the welding seam to be tracked and corrected in real-time on the Y and Z axis.

xFUME ROBO



Fume extraction kit for robotic welding features a patented design that allows for source capture of welding smoke in a robotic application directly at the arc to a cleaner plant environment.

ATI Industrial Automation

Booth B29074
ATI Compliant Deburring Blade



The pneumatically-actuated Compliant Deburring Blade excels in light and medium deburring, chamfering, and scraping operations. Both axial and radial compliance reduces robot programming time and enables consistent contact forces throughout the process.

Lasermet Inc

Booth A1247
Laser Castle V8



The Laser Castle V8 is the latest version of the modular, rapid-build laser safety cabin designed and certified to prevent the escape of high energy laser radiation.

Peddinghaus Corporation

Booth A2147
PeddiAssembler



The PeddiAssembler is a robotic steel beam assembly and welding machine which can achieve up to 15,000 tons of completed members per year.

Yaskawa America Inc

Booth B27056
Yaskawa Motoman AR-Series Arc Welding Robots



AR-series 6-axis arc welding robots offer optimized acceleration/deceleration control for all robot axes, resulting in overall improved productivity. Five models are available with 8-25 kg payload capacity to support a wide variety of sensors and torches.

Safety & Environmental

Keller USA Inc
Booth A5127
DustOff Gust



DustOff Gust is manufacturing's clean-air partner; a cabin for employees to safely "DustOff" at breaks without sending hazardous particles into the air.

Saws & Cut-off Machines

Universal Tube & Rollform Equipment Corp

Booth D46963
3.5" (89 mm) High-Speed Flying Cold Saw



High-Speed Flying Cold Saw equipped with motion controls, length control system, hydraulic clamp system, 325 FPM maximum speed, .160" (4 mm) maximum wall thickness.

Debuting at FABTECH 2019 Loewer BeltMaster

Best of both worlds with small part finishing and large part graining in one machine.

The innovative K4TD BeltMaster allows the utility of multiple machines with a single unit.



Flexibility to process small parts
Lower operation costs
Touch screen interface
German built quality

BOOTH A3126

www.ammachinerysales.com



Territories Available

AM MACHINERY SALES, Inc.

Solutions for Deburring, Belt Grinding, Polishing, Buffing & Micro-Finishing

Software & Machine Controls

ITEC - Innovative Tube Equipment Corporation

Booth D46559

TubeWorks 3D Tube Process Development Software



The TubeWorks plug-in for SolidWorks and powerful stand alone tool is designed to reduce the pre-production design time to only a matter of minutes.

Kyntronics

Booth D45249

Single Cylinder HSHF Next Generation Actuator



An 'all-in-one' solution (controller and programming included), in a scalable, modular, 'power-on-demand' machine platform. The design is self-contained with no hoses.

Lantek Systems Inc

Booth A3521

Lantek 360

Lantek 360 is a suite of cloud-based manufacturing applications that give users access to incredible capabilities enabling visibility and processing of large amounts of real-time and historical data for better decision making with greater efficiency.

MachineMetrics

Booth A5060

MachineMetrics - Cloud Application for Production

MachineMetrics is the industry's AI-driven machine monitoring and predictive analytics platform for discrete manufacturers and machine builders.

MachineMetrics Health - Maintenance Software

A predictive analytics application on the MachineMetrics Industrial IoT platform that allows maintenance teams to monitor and manage equipment health in real-time.

MachineMetrics Production

MachineMetrics Production features simple "self-install" IIoT connectivity, fully automated cloud machine monitoring and OEE software connects to all machine types to provide visualizations of real-time manufacturing production data.

Nederman LLC

Booth B31074

Nederman Insight



Industrial air filtration system monitoring technology that provides manufacturers with a real-time, mobile view of their system performance - complete with a robust visual dashboard, auto-generated alerts and notifications.

ProManage

Booth A3652

ProManage AR



Become a factory of the future and see what is beyond equipment with ProManage Augmented Reality.

ProManage IIoT based MES/MOM System



MES/MOM system fully integrated with Artificial Intelligence (AI) and Augmented Reality (AR) technologies. ProManage helps to improve business results of a manufacturer automatically.

ProManage Predictive Maintenance Management



Integration with the ProManage Production Module, ensures that maintenance operations are planned according to production volumes and automatically executed to reduce the number of breakdowns and shorten repair time.

ProManage Predictive Quality Management

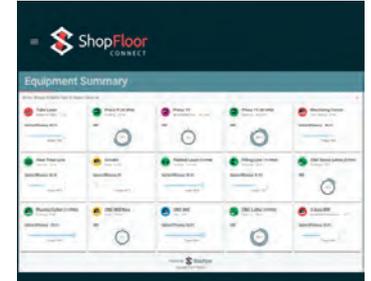


Manage quality to increase competitiveness by preventing losses before they occur, accessing interactions instantly and tracking results and analyses regularly.

Wintriss Controls Group LLC

Booth D45133

ShopFloorConnect® Version 6.0 OEE/ Data Collection



ShopFloorConnect® Version 6.0 has several enhancements including a fresh design format for fast, easy access to all data, offering more robust, user-friendly reporting and dashboard customization, flexible scheduling capabilities and much more.

Stamping

Alma Machinery Co

Booth D46331

Alma Machinery Used Press Warehouse

60,000 SF of additional space to total 170,000 SF of used presses and press room equipment in MI and TN.

AMADA ORII AMERICA INC

Booth D45533

AMADA ORII SDE-GORIKI



Advanced direct drive servo press offering a highly rigid solid-column frame and full length center-gib with a wide slide. Ranges in size from 150 - 300 mt.

Carell Corporation

Booth A5743

T100 DIGI Dual Axis Horizontal Press**"Digi-T100"
Horizontal Press**

with "SIMplylogik" NC Dual Axis Programmable Controls

T100 Dual axis horizontal press with digital programming has a powered back gauge. This hydraulic press will bend, fold, crimp, punch and form a variety of materials in flat, square, round, tubular and special shapes.

Tool & Die**Quality Wire EDM Inc**

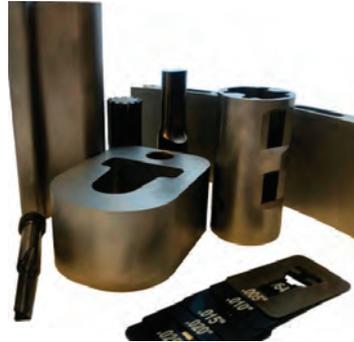
Booth D45252

1 & 2 Day Emergency Tool Repair Service

1 and 2-day emergency tool and die repair service with hardened certified materials on hand and around the clock operation.

Precision Cut Shims

Shim sets start at .005" and go to 1/16" thick.

Say Goodbye to Press Down Time

Keep those mission critical jobs running. All wear and consumable tool parts are fabricated and stocked at the facility.

STEINEL Normalien AG

Booth D45266

Smart Nitrogen Cylinder

The patented nitrogen cylinder features integrated pressure and temperature sensors and wireless or cable data interface. This allows continuous monitoring, increase in productivity and product lifetime prediction.

Uelner Precision Tools & Dies

Booth D46273

Makino PS-95 High Speed CNC Mill

High-speed machining with PS-95 Makino for the tool room.

Tooling**Michigan Pneumatic Tool Inc**

Booth B19092

MP-2312 Angle Grinder

The MP-2312 is a powerful and rugged, 2.3 hp governed grinder designed for the demanding applications in foundries, and metal fabrication. It features durable beveled gearing, a spindle lock, and is also available in 20 grinder and sander models.

Tube & Pipe Fabricating or Welding**Abicor Binzel**

Booth B19062

Spool Welding Robot SWR

A collaborative welding machine designed specifically for pipe, small pressure vessel, and other types of roll welding. It is capable of welding flanges, tees, elbows, reducers, and more.

Alpine Bender Machinery

Booth D46768

Work Cell with Programmable Pick/Place Unloading

CNC tube bending work cell that demonstrates automatic loading and programmable unloading without the use of a robot. Utilizes X, Y, and Z pick and place

unit. This unit is programmed via the bender controller.

AMOB SA

Booth D46559

AMOB - eMob 150 - 6"

All electric 10-axis multistack boosted CNC bending machine with an extremely large variety of included options.

Carell Corporation

Booth A5743

ETM-90HD Digital Heavy Duty 3" Pipe Bender**ETM90HD
Digital HMI**

Rotary pipe and tube non-mandrel bender constructed from solid steel plate, no castings, 3" pipe and 3.5" tube capacity. Digital Touch Screen HMI with 40 programs x 5 bends each includes auto capacity material calculator.

Dynobend BV

Booth D46559

CB76 MR 3D

All-electric, rotary-draw and 3D freeform bending machine for bending and rolling of tubes and profiles, offers through its unique design an extremely large amount of freedom around the bending head.

Tube & Pipe Fabricating or Welding

ITEC - Innovative Tube Equipment Corporation

Booth D46559

MTS Tube Punching and Forming Tools and Machines



The MTS tube punching and forming units, work plates and machines when combined in work cells can utilize the combination of standard machinery for an almost endless variety of applications such as cutting, single or twinhead bending, punching, forming, flattening, coping, milling and drilling.

Universal Tool & Engineering

Booth D46568

CNC Tube Bending Work Cell and Servo PDA Boost



Demonstrates automatic loading, robot unloading, and complex shape inspection and will feature programmable Servo Pressure Die Assist, which will reduce set-up time and operator skill level, as well as control wall thinning and deformation of bend.

Tube & Pipe Producing

BLM Group

Booth A2153, D46532

LT7 Lasertube



Fiber laser processing machine for tubes and profiles that assure the best cut accuracy at the highest productivity.

Trilogy Machinery Inc

Booth A4968

BSP Tube Punching Systems



Customized BSP Systems tube punching machines with a wide range of tube, pipe and profile punching possibilities including automatic loading and unloading features.

Universal Tube & Rollform Equipment Corp

Booth D46963

3.125" (80 mm) Complete Tube Mill Line



Complete Tube Mill Line equipped with (all new): Kent Corporation Entry Equipment, 300 KW Solid State High Frequency Welder, SFM Forming and Sizing Mills, UCG High-Speed Flying Cold Saw and 3 Motor Drive System.

COR-MET®

SPECIALTY CORED WIRE
COATED WELDING ELECTRODES
TOOL STEEL MIG & TIG



Visit COR-MET
at FABTECH
Booth #B32077

- COBALT
- NICKEL
- HARDFACE
- STAINLESS
- ALLOY STEEL
- TOOL STEEL
- MAINTENANCE
- FORGE ALLOYS

12500 Grand River Road
Brighton, MI 48116
(810) 227-3251 or
(800) 848-2719
www.cor-met.com

Waterjet

OMAX Corp

Booth A5731
GlobalMAX



A value-focused waterjet starting at \$54,950.

Welding Consumables

**voestalpine Bohler
Welding USA Inc**

Booth B27068



Avesta ER308Si/308LSi

Solid wire, high-alloyed, austenitic stainless. Very good wetting and feeding characteristics with excellent weld metal toughness down to -320°F. Application temperature max. 660°F.

Avesta ER309Si/309LSi

Solid wire, high-alloyed, austenitic stainless. Ideal for special applications joining unalloyed and low-alloyed steels, cast steel grades, stainless heat resistant Cr-steels and cast steel grades to austenitic steels and cast steel grades.

FOXcore 46 MC

Metal-cored high-efficiency wire for semi-automatic and fully automatic joint welding of unalloyed and fine-grained constructional steels and service temperatures from -4 °F to +840 °F.

FOXcore 52 RC

All position rutile flux-cored wire with fast freezing slag system. Excellent mechanical properties, low spatter loss, smooth, finely rippled bead surface, X-ray quality.



diamondspark 46 MC

Seamless all positional metal cored wire for semi-automatic and fully automatic joint welding of unalloyed and fine-grained constructional steels. High resistance to porosity, good wetting behavior as well as low hydrogen contents.

diamondspark 52 RC

Seamless rutile flux cored wire especially suitable for ship building, structural steel work or wherever good bead appearance is required. Excellent weldability, high performance weld speed, very low spatter.

**Welding Machines/
Equipment**

Abicor Binzel

Booth B19062
xFUME VAC ADVANCED



Powerful fume extraction technology made for high-vacuum fume extraction welding needs. Two 0.8 KW motors and high fume extraction capacity with more than 20,000 PA vacuum.

RHINO CART
MOBILE FIXTURING STATION

Cut, clamp, fixture, and weld accurately with the RHINO CART® MOBILE FIXTURING STATION.

NEW Folding PLASMA CUTTING TRAY now available!

Folds down when not in use.

FABTECH
Booth# B35038

StrongHandTools®

Toll Free : 800.989.5244
www.stronghandtools.com

Welding Machines/ Equipment

Abicor Binzel

Booth B19062

xFUME VAC FLEX



Welding fume extraction solution ideally suited for mobile use at changing individual welding stations.

Lincoln Electric Co

Booth B19030

POWER MIG® 140 MP®



A lightweight, portable multi-process welder that connects to 120 volt power. This machine is capable of MIG, Stick and Flux-Cored welding out of the box, and with the addition of a TIG Torch and Foot Pedal, you can add DC TIG to its list of capabilities.

RANGER® 330MPX™ Welder/ Generator



The Ranger® 330MPX™ welder generator is equipped with a 25 horsepower Kohler® engine to supply incredible power for every job. A digital user interface makes set-up easy while offering 10kW of clean AC continuous power. Use CrossLinc® Technology to adjust settings remotely.

Strong Hand Tools

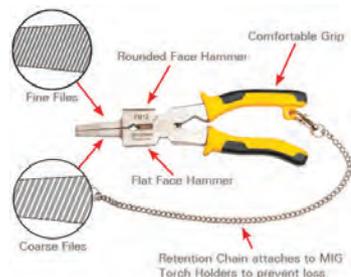
Booth B35038

Deluxe Magnetic Grasshopper



The Deluxe Magnetic Grasshopper locates and holds steel stock in the vertical position for tack welding. The spring-loaded Grasshopper arm delivers positive, self-adjusting holding pressure with a copper spindle for grounding contact.

Deluxe MIG Pliers



Deluxe MIG Pliers have both fine and coarse files for welding gun maintenance, rounded and flat hammer faces, and a side pull v-notch for grasping wire or nuts. A retention chain helps prevent loss and attaches to the ReadyRest™ MIG Rests.

Plasma Cutting Tray Attachment for Rhino Cart®



Cut, clamp, fixture and weld on one convenient work surface by adding the Plasma Cutting Tray attachment to the Rhino Cart® Mobile Fixturing Station.

Ready Rest™ Adjustable TIG, MIG Torch Rests



The ReadyRest™ line of adjustable, fully articulated TIG, MIG Torch Rests are height and angle adjustable for setting at the ideal position for easy access. Increase efficiency and productivity, and prevent torch damage.

ReadyRest™ Articulated Arm Rest



Maximize comfort, productivity and safety in welding with the ReadyRest™ line of Wrist and Arm Rests. The articulated Arm Rest supports the extended arm for greater weld control and complete freedom in positioning.

ReadyRest™ Grinder Rest



ReadyRest™ Grinder Rest holds 6" or 7" grinders. Store a grinder on this rest to prevent damage, maximize valuable space and create an organized work area.

Taylor-Winfield Technologies Inc

Booth B28098

Capacitive Discharge Welder



Capacitive Discharge (CD) power supplies equipped with Multi-Capacitor Source (MCS) system.

KNOWLEDGE INNOVATION EXPERIENCE



AT WILSON TOOL INTERNATIONAL

we make the tools that make the parts that make the things that matter. And it starts with a box addressed to our customers. It's what's in the box that counts.



©2019 Wilson Tool International. All Rights Reserved.



Connect @ FABTECH



FABTECH is not just an event, it's a year-round experience. Connect and engage with other industry professionals and show attendees on FABTECH's social media sites — during and after the event!

Be sure to use **#FABTECHexpo** or **#FABTECH19** in your posts!



FABTECH *Bistro*



Reserve a seat at the FABTECH Bistro and you will always have a convenient place to eat, meet and network.

The Bistro offers assorted menu options including fresh and healthy lunch options, all at a reasonable price.

Pre-purchase your individual lunch tickets to avoid the lines. Find the daily menu, pricing and order tickets at **fabtechbistro.com**.

TUESDAY, NOVEMBER 12 | 5:30 PM – 7:30 PM

Lakeside Center, McCormick Place

 **FABTECH**
INDUSTRY NIGHT
CHICAGO
BLUES
& BREWS



Advance tickets for FABTECH attendees available now!
Register today at fabtechexpo.com/industryntight.

EVO

THE BENDING EVOLUTION...



...BEGINS ON EVO-HAEUSLER.COM
MEET US AT  **FABTECH**

SPECIAL EVENTS

There are a lot of great events happening this year at FABTECH.

You won't want to miss the keynotes, expert panel discussions, Smart Manufacturing Hub and much more.

All events are free and open to all attendees unless otherwise noted.

MONDAY, NOVEMBER 11

KEYNOTE PRESENTATION

8:30 AM - 9:45 AM

FABx TECH TALKS

In honor of Veterans Day, this year's FABx will feature a powerful lineup of visionary veterans. These are heroes with incredible stories who have gone on to excel in leadership, business, advanced manufacturing, and workforce development. Drawing on their unique experiences, speakers will captivate and inspire audiences with their frontline stories focused on motivation, team building, innovation, and how to achieve excellence in the business battlefield.

FEATURED SPEAKER:



CHAD HENNINGS

Through a nine-year NFL career and three Super Bowl Championships, 45 successful combat missions with the Air Force, and as one of the most decorated college football players in NCAA history, Chad represents the philosophy that he lives by — that excellence is not a destination, but an identity.

FABx SPEAKERS:

- **Hernán Luis y Prado**, Founder and CEO, Workshops for Warriors
- **Jason T. Ray**, Co-Founder and CEO, Paperless Parts Inc.
- **Shelly C. Rood**, Educational Consultant, Mission Ambition LLC
- **Michael Walton**, Industry Solution Executive (Manufacturing), Microsoft

LEADERSHIP EXCHANGE

12:30 PM - 1:30 PM

EMERGING & ADVANCED TECHNOLOGIES FOR MANUFACTURING 2020

Advanced manufacturing is transforming the economy and jobs, using cutting-edge technology and new manufacturing processes to accelerate innovation. Learn how companies are using advanced technologies to stay at the forefront of manufacturing.

MODERATOR: Dave O'Neil, Vice President, SME Media

PANELISTS:

Chandra Brown, CEO, MxD

Jason T. Ray, Co-Founder and CEO, Paperless Parts Inc.

Michael Walton, Industry Solution Executive (Manufacturing), Microsoft

TUESDAY, NOVEMBER 12

KEYNOTE PRESENTATION

8:30 AM - 10:00 AM



FRANK ABAGNALE, Cybersecurity Expert, Best-selling Author and Subject of *Catch Me If You Can*

Renowned international cybersecurity and fraud-prevention expert Frank Abagnale — known as one of the world's most famous con men — will present a two-part keynote. During the first part of his speech, appropriately titled *Catch Me If You Can*, Abagnale will provide entertaining insight into his life as the notorious imposter of the 1960s. He will then instruct attendees on how to protect themselves and their businesses from fraud during the second part titled the *Art of the Steal*.

LEADERSHIP EXCHANGE

12:30 PM - 1:30 PM

STATE OF THE INDUSTRY: AUTOMATION IN MANUFACTURING

Innovations in robotics and automation have catalyzed the fourth industrial revolution. This panel will explore how automation is changing the manufacturing landscape and cover both the role of technology and people in the future of manufacturing. Experts will share their perspective on the impact of robotics on human workers and the facts vs. fiction of worker replacement. They will discuss identifying key challenges to implementing automation and developing a pipeline to de-risking technology and implementing it on the factory floor.

NETWORKING EVENT

5:30 PM - 7:30 PM Lakeside Center, McCormick Place

INDUSTRY NIGHT

Enjoy a fun-filled evening of food, drinks, and networking during our Industry Night Party! The **Chicago Blues & Brews** themed event will include live blues music, local craft beer tasting, and much more. We expect this to be a sold-out event so be sure to register early. **Advance ticket price: \$50**

MONDAY, NOVEMBER 11 & TUESDAY, NOVEMBER 12

AWS WELDING COMPETITION

Participants will go head-to-head as they complete and clean a single-pass fillet weld in just 5 minutes. Speed and accuracy count, and weldments will be evaluated to the current AWS D1.1 standard by a panel of Certified Welding Inspectors. Those interested in competing must be 18 years or older and weld for a living. Learn more about how to participate in the competition at aws.org/events/detail/aws-welding-competition.



SPECIAL EVENTS

WEDNESDAY, NOVEMBER 13

7:45 AM - 10:00 AM

WOMEN OF FABTECH BREAKFAST

Join us for a networking breakfast celebrating the importance of women in the manufacturing sector. This event aims to foster relationships and dialogue between supporters and practitioners in the field. A breakfast buffet is included. **Price: \$25**

PRESENTATIONS

KEEPING UP WITH TECHNOLOGY

MODERATOR:

Dan Davis, Editor-in-Chief, *The FABRICATOR*®

SPEAKERS:

Susanne Lauda, Director, Global Advanced Manufacturing Technology, AGCO Corporation

Gretchen Zierick, President, Zierick Manufacturing

STARTING A WOMEN'S INITIATIVE WITHIN YOUR ORGANIZATION

SPEAKERS:

Monica Silliman, Manufacturing Engineering Manager, Combine Final Assembly, John Deere Harvester Works

Erin Welken, Manager, Business Process Improvement, Global Agriculture and Turf Supply Management Organization, John Deere

KEYNOTE PRESENTATION

8:30 AM - 9:30 AM



GRANT IMAHARA, Former Host on Discovery's "Mythbusters" and Animatronics Engineering Expert

On stage, Grant provides a behind-the-scenes look at his work on various sets and productions while also touching on the importance of advancing the engineering/manufacturing industry. Grant has credits on numerous blockbusters including *The Matrix* sequels, *A.I.*, *Galaxy Quest*, *Terminator 3*, *Van Helsing*, and *Star Wars: Episodes 1-3*.

LEADERSHIP EXCHANGE

12:30 PM - 1:30 PM

THE IMPACT OF DISRUPTIVE TECHNOLOGY AND THE FUTURE OF MANUFACTURING

The pace of innovation is incredibly fast and new things are being discovered daily. As technology has advanced and becomes embedded in plants, warehouses, and throughout the supply chain, businesses have needed to adapt to stay competitive. Many already have, but the path toward digital transformation is different for every company. Come hear our panel of experts cover disruptive technologies from 5G and IoT to AI and robotics and automation, share case studies, and help manufacturers understand and explore the challenges and benefits that implementing these technologies entails.

MODERATOR:

John R. Brandt, CEO and Founder, The MPI Group

PANELISTS:

Mohamed (Mo) Abuali, Ph.D. Managing Partner, IoTco

Dave Beck, Founder and Managing Partner, Foundry 45

Greg Mark, CEO and Founder, Markforged

Tim Weber, Global Head of 3D Metals, HP 3D Printing

THURSDAY, NOVEMBER 14

LEADERSHIP EXCHANGE

11:00 AM - 12:00 PM

21ST CENTURY WORKFORCE: BUILDING TOMORROW'S WORKFORCE

Manufacturers in the 21st century must make it a precedence to have a workforce that is educated, diverse, and motivated. Organizations need to produce a more globally competitive workforce that can meet the demands of an evolving digital economy and adapt to the trends and challenges of managing a multi-generational workforce. Come hear our experts share their strategies and some actions to address the challenges for the future.

MODERATOR:

Kord Kozma, Global Director of HR, Nidec Press & Automation

PANELISTS:

Hernán Luis y Prado, Founder and CEO, Workshops for Warriors

Rob Tessier, National Director of Advanced Fabrication Technologies, Airgas

Dean Steadman, CNC Education Program Manager, FANUC America

MONDAY, NOVEMBER 11 - THURSDAY, NOVEMBER 14

SMART MANUFACTURING HUB

The Smart Manufacturing Hub will feature several advanced manufacturing technologies, including automation, advanced materials, 3D printing, the Industrial Internet of Things (IIoT), 3D scanning, and more. Technical presentations from industry-leading smart technology providers will provide insight on recent developments in this rapidly evolving field.

Sponsored by:



SPECIAL EVENTS

2019 PRICING CHART

EXHIBITS ONLY

Registration is FREE through November 8.

Beginning November 9, the cost to attend the exhibits is \$50. AWS, FMA, SME, PMA, and CCAI members may always attend the exhibits for FREE with proof of membership.

SPECIAL EVENTS

TUESDAY, NOVEMBER 12 • INDUSTRY NIGHT AT McCORMICK PLACE

Advance ticket price for attendees is \$50 and includes food and drinks, networking, entertainment, and more.

WEDNESDAY, NOVEMBER 13 • WOMEN OF FABTECH BREAKFAST

Price for FABTECH Attendees is \$25 and includes a breakfast buffet.

EDUCATION PROGRAMS

3D/Additive Manufacturing, Automation, Cutting, Finishing, Forming & Fabricating, Laser, Lean, Management, Marketing & Sales, Smart Manufacturing, Stamping, Welding Fabrication, Workforce Development Tracks

Packages (Buy More and SAVE!)	Member	Non-member
1 Session	\$195	\$220
2 Sessions	\$330	\$385
3 Sessions	\$450	\$540
4 Sessions	\$550	\$660
Full Conference: (5 or more sessions) BEST VALUE!	\$750	\$900

NOTE: The rate for the 1/2-Day Laser Welding Workshop (Session AWF100) and Leadership Skills & Development Workshop (Session F216) is \$365 for Members and \$465 for Non-members.

WELDING TRACK

	Member	Non-member ^a
AWS Educational Sessions	\$25	\$50
1/2-Day Seminar	\$345	\$430
1-Day Seminar	\$565	\$665
2-Day Seminar, Conference or RWMA School	\$795	\$895
Career Path Workshops	\$50	\$75
1-Day Professional Program	\$175	\$225
4-Day Professional Program	\$395	\$495
Student Professional Program	\$85	\$110 ^b
AWS Awards Luncheon	\$30	\$30
AWS Prayer Breakfast	\$15	\$25

^a Non-member price for AWS Sessions only includes a one-year AWS Individual Membership.

^b Non-member Student Professional Program price includes a one-year AWS Student Membership.

CONFERENCE CANCELLATION POLICY:

Cancellations and refund requests (for paid conference registrations) must be made in writing to Attn: Betsy Bonnell: FABTECH Conference Cancellation or sent to bbonnell@sme.org no later than October 28, 2019, to receive a full refund minus a \$50 administrative fee. Cancellations received after this date are non-refundable. Substitutions allowed.

MONDAY, NOVEMBER 11

Schedule-at-a-Glance

TECHNOLOGY	8:00 AM – 9:30 AM	10:00 AM – 11:30 AM	12:00 PM – 1:30 PM	2:00 PM – 3:30 PM	
3D/ADDITIVE MANUFACTURING	NEW! F10: Application Discovery - Evaluating Real Use Cases for In-Office Metal 3D Printing	NEW! F20: 3D Printed Tools for Additive Manufacturing Environments	NEW! F30: The Ultimate Guide to Metal Additive: Mapping the Process from Discovery to Production	NEW! F40: Metal 3D Printing for Fabrication Shops	
AUTOMATION	NEW! F11: Move to the 21st Century: The Pro's and Con's of Adding Automation to Your Process	F21: Getting Started with Robotics: A Journey to the World of Robotics	NEW! F31: Leading and Preparing an Industry 4.0 Organization and Workforce	NEW! F41: Industrial Internet of Things (IIoT) for the Job Shop	
CUTTING		NEW! F22: Cutting for Advanced Materials		NEW! F42: Automated Processes in Hybrid Induction & Oxy-Fuel Cutting	
FINISHING		C20: ABCs of Infrared		NEW! C40: It's Your Money - Control Your Costs	
		NEW! C21: I Want to Powder Coat, Now What?		C41: Powder Coating Basics	
		NEW! C22: Corrosion Basics and Prevention		NEW! C42: Understanding the Basics of Pretreatment	
FORMING & FABRICATING	F13: Press Brake for Engineers	F23: Machine Safeguarding	NEW! F33: Material Handling	F43: Advanced Press Brake Technologies	
	F14: Coil Processing: Slitting HSS Materials	F24: Roll Forming: Basics and Lubricants	F34: Roll Forming: Tooling and Trouble Shooting	F44: Advanced Solutions for Tube and Pipe	
LASER		NEW! F25: Lasers for Joining Development and Control	NEW! F35: Remote Laser Joining & Interface Applications	F45: Lasers and Laser Systems for Advanced Manufacturing	
LEAN	NEW! F16: Lean Principle: Getting Started with Your Lean Journey	NEW! F26: Lean Tools: Flow & Pull in High Variety Environment	NEW! F36: Lean Principle: OEM Quality Excellence: 6 Practical Steps to Becoming an Award-Winning Supplier	F46: Lean Principle: Strategic Planning and Hoshin Kanri - How to Achieve the Future You See	
MANAGEMENT	NEW! F17: Choosing the Best Source of Growth Capital for Your Manufacturing Business	NEW! F27: Planning for the Present & Paving a Strategic Roadmap	F37: Job Shop Costing, Estimating and Scheduling for Complex Jobs	NEW! F47: Hands-on Workshop - Cultivate & Value Your Leadership	
MARKETING & SALES	NEW! F18: Supercharge Your Networking & Inbound Marketing	NEW! F28: Your Schematic for Assembling a Powerful Digital Marketing Machine	NEW! F38: Build a Sales Strategy & Model for Scalable Growth	NEW! F48: Deliver Superb Customer Service & Build a Customer-Centric Culture	
SMART MANUFACTURING	NEW! F19: Current State of Smart Manufacturing & The Connected Viewpoint	NEW! F29: SMART Manufacturing Basics to Get Started in The Digital World	NEW! F39: Industrial IoT Case Study - Real World Implementation	NEW! F49: Smart Manufacturing and Workforce Ready!	
STAMPING		NEW! S20: Understanding Servo Metal Stamping Presses - Proper Usage, Troubleshooting and Maintenance	S30: ANSI Z224.1 & OSHA 1910.147 Applications of Alternative Methods for Hazardous Energy Control	NEW! S40: Application of Real-Time Visual Monitoring Tool in Stamping	
		S21: Lubricants-1		NEW! S41: Lubricants-2	
WELDING FABRICATION		NEW! W200: The Welding Economy		NEW! W400: Robotic Welding for Job Shops	
WORKFORCE DEVELOPMENT	NEW! F200: Practicing Emotional Intelligence for Workplace Success	NEW! F211: The Future of Talent: Attracting and Retaining The Top Talent for the 21st Century	NEW! F212: Creating Career Path Programs That Empower & Engage	NEW! F213: Pushing Your Envelope: How Smart People Overcome Self-Doubt and Live with Bold Enthusiasm	
WELDING					
CAREER PATH WORKSHOPS	W17: Getting Started in Underwater Welding			1:00 PM	3:00 PM
	W18: Creating a WPS in 60 Seconds			1:00 PM	3:00 PM
PROFESSIONAL PROGRAM	W23: SESSION 1: Additive Manufacturing I			1:40 PM	5:00 PM
	SESSION 2: Modeling			1:40 PM	5:00 PM
	SESSION 3: Arc Welding			1:40 PM	5:00 PM
SPECIAL PROGRAMS	W30: AWS Prayer Breakfast			7:00 AM	8:30 AM

Detailed Education Program session descriptions, speakers, pricing, room locations and more can be found at fabtechexpo.com/edu.

■ = Basic
 ■ = Intermediate
 ■ = Advanced

TUESDAY, NOVEMBER 12

Schedule-at-a-Glance

TECHNOLOGY	8:00 AM – 9:30 AM	10:00 AM – 11:30 AM	12:00 PM – 1:30 PM	2:00 PM – 3:30 PM	
3D/ADDITIVE MANUFACTURING		■ F60: Fundamentals of Additive Manufacturing	■ NEW! F70: Small & Large Format Printers for Additive Manufacturing	■ NEW! F80: How Additive Manufacturing Can Accelerate and Advance Your Design	
AUTOMATION		■ NEW! F61: Estimating and Job Costing for Industry 4.0 - The Science of Costing and the Art of Pricing	■ NEW! F71: The Full Potential of Automation and Lights-Out!	■ F81: IIoT Solutions to Better Manage Your Assets	
CUTTING		■ F62: Optimization of Cutting Metals with Fiber and Plasma Machining		■ F82: Comparative Cutting Innovations with Tech Tour	
FINISHING	■ NEW! C50: Lean and Green Cleaning	■ NEW! C60: Mother Earth Still Needs Our Help		■ C80: Identifying and Solving Finishing Defects - See It, Touch It, Fix It	
	■ NEW! C51: Powder System Design for Success	■ NEW! C61: How It's Made: Knowing Where Your Powder and Equipment Come From		■ C81: Lean and Mean - Making Powder Systems Work	
	■ NEW! C52: 1K, 2K, New K and Fluid Delivery Methods	■ NEW! C62: Oven Selection Solved		■ C82: Make Safety a Priority	
FORMING & FABRICATING		■ F63: Effective Safeguarding Risk Assessment	■ NEW! F73: Dust Collection for Fabrication Processes	■ F83: Sheet Metal Design and Press Brake Automation	
		■ F64: Coil Processing: Blanking Techniques and Handling Solutions	■ NEW! F74: Roll Forming: Design and Welding Techniques	■ F84: Roll Forming: Justification and In-Line Punching, Cutoff Dies	
LASER		■ NEW! F65: Quality & Control for Laser Joining Systems	■ NEW! F75: Accelerated & Combination Lasers for Sheet Metal	■ NEW! F85: Traditional & Fiber Laser Cutting for High Performance	
LEAN	■ NEW! F56: Lean Principle: Leadership and the Lean Journey	■ F66: Lean Tools: VSM Addressing Differences Between the Office and Shop Floor	■ F76: Lean Tools: A3 Thinking- Developing People & Solving Problems	■ F86: Lean Tools: Standard Work for Quality and Improvement	
MANAGEMENT	■ F57: Building a Competitive Advantage: Know What Your Business is Worth and Tax Credit Advantages	■ NEW! F67: The Dark Cloud Behind the Silver Lining: Economy in 2020	■ NEW! F77: Planning for the Future: The New Dawn of Manufacturing and Technology	■ NEW! F87: ERP Systems: Selection & Avoiding the ERP Technology Grim Reaper	
MARKETING & SALES	■ NEW! F58: Customer Experience for Manufacturers to Create Digitally-Powered Journeys That Help People Grow	■ NEW! F68: Sustainable Social Media Strategies	■ F78: Stngthen Your Marketing Through The Power of Story & Grow Your Revenue & Grow Your Team		
SMART MANUFACTURING	■ NEW! F59: Productivity, Performance & Quality Management for Smart Manufacturing	■ NEW! F69: Quit Making Excuses and Close the Loop - Now is the Time to Digitize	■ NEW! F79: From Rust-Belt to High-Tech: Transform, Ignite and Disrupt	■ NEW! F89: Artificial Intelligence for Machine Learning & Streamlining Quoting Process	
STAMPING	■ NEW! S50: Materials-1	■ NEW! S60: Materials-2		■ NEW! S80: Materials-3	
	■ NEW! S51: Connectivity-1	■ NEW! S61: Connectivity-2		■ NEW! S81: Connectivity-3	
WELDING FABRICATION		■ NEW! W600: Resistance & Arc Welding For Better Weldability and Hazard Reduction		■ NEW! W800: Improving Light-weight Materials Joining Through Friction Welding	
WORKFORCE DEVELOPMENT	■ NEW! F214: Engaging Manufacturing's Next Generation Through Full Contact Innovation	■ NEW! F215: Conflict & Communication For Strong Leadership	■ NEW! F216: Leadership Skills & Development Workshop (12:00 PM - 4:30 PM)		
WELDING					
SEMINARS	■ W11: AWS Educational Overview of Welding Codes and Standards - Day 1			8:00 AM	5:00 PM
	■ W12: Applied Welding Metallurgy			8:00 AM	4:00 PM
	■ W13: WPS's for Weld Inspection and Test-Taking Tips			8:00 AM	12:00 PM
CONFERENCES	■ W16: 5th International Electron Beam Conference - Day 1			8:00 AM	5:00 PM
PROFESSIONAL PROGRAM	■ W24: SESSION 4: Solid-State Processes			8:00 AM	12:00 PM
	■ SESSION 5: Surfacing & Dissimilar Joining			8:00 AM	12:00 PM
	■ SESSION 6: Welding Metallurgy I			8:00 AM	12:00 PM
	■ SESSION 7: Neural Networks & Machine Learning			1:40 PM	5:00 PM
	■ SESSION 8: Additive Manufacturing II			1:40 PM	5:00 PM
RWMA SCHOOL	■ W22: RWMA Resistance Welding School - Day 1			8:00 AM	5:00 PM
EDU. SESSIONS	■ W29: AWS/Weld-Ed Education Conference - Using Advanced Waveforms in Welding Education			9:00 AM	4:30 PM
SPECIAL PROGRAMS	■ W31: AWS Awards/AWS Foundation Luncheon			12:00 PM	2:00 PM

SCHEDULE-AT-A-GLANCE

Detailed Education Program session descriptions, speakers, pricing, room locations and more can be found at fabtechexpo.com/edu.

■ = Basic ■ = Intermediate ■ = Advanced

WEDNESDAY, NOVEMBER 13

Schedule-at-a-Glance

SCHEDULE-AT-A-GLANCE

TECHNOLOGY	8:00 AM – 9:30 AM	10:00 AM – 11:30 AM	12:00 PM – 1:30 PM	2:00 PM – 3:30 PM	
3D/ADDITIVE MANUFACTURING	■ NEW! F90: The ROI of 3D Printing: Analyze the Cost of Implementing 3D Printing for Your Business	■ NEW! F100: Impact and Quality Considerations for Additive Manufacturing	■ F110: Lasers and Additive Manufacturing Processes	■ NEW! F120: Safely Adopting Additive Manufacturing on The Production Floor	
AUTOMATION	■ NEW! F91: Effective Automation for Joining in Emerging Technologies	■ NEW! F101: Integrating Robotic Automation into Your Process	■ NEW! F111: Which Robot Application is Right for Your Needs?	■ NEW! F121: Automating the Material Handling Process - Why Now is the Time	
CUTTING		■ F102: Advantages of Waterjet Cutting Machining Technology			
FINISHING	■ C90: Architectural Coatings - Today and Future	■ NEW! C100: Conveying Effectively		■ NEW! C120: Quality Still Counts	
	■ C91: Optimizing Powder Operations	■ NEW! C101: Mastering Batch Powder Coating Operations		■ NEW! C121: Powder Coating Troubleshooting	
	■ NEW! C92: Creative Finishing Solutions	■ NEW! C102: Choose Your Weapon - Finding the Right Liquid Applicator		■ NEW! C122: Automation Roadmap for Liquid Finishing Operations	
FORMING & FABRICATING	■ NEW! F93: A Modular Approach to Turning Non-Value-Added Time on a Press Brake into Productive Time	■ F103: Press Brake Safety	■ NEW! F113: Alternative Forming Processes	■ NEW! F123: Press Brake Hurdles	
	■ F94: Roll Forming: Press Tonnage Rating and Welding Systems	■ F104: Tube & Pipe Lubricants, Bending and Case Studies in Tube Field Failures	■ NEW! F114: Alternative Techniques for Annealing, Testing and Grinding Abrasives	■ F124: Coil Processing: Slitting Thin Materials, Leveling & Deburring	
LASER	■ AWF100: Laser Welding Workshop (8:00 AM - 12:30 PM)			■ NEW! F115: The Use of Additive and Subtractive Lasers in Applications	
LEAN	■ NEW! F96: Lean Principle: Go to Gemba	■ NEW! F106: Lean Tools: Lean Production Shop to a Job Shop			
MANAGEMENT	■ F97: Ensuring Tomorrow: How to Effectively Choose and Prepare Your Successor	■ NEW! F107: Win the Inner Game: Free Yourself of Overwhelm and See Your Highest Potential Come True	■ NEW! F117: Diagnose Your Business: How to Free Yourself from Budget Limitations by Finding and Unlocking Hidden Money in Your Operations	■ F127: Enable the Transition to Next Gen - Family Business	
MARKETING & SALES	■ NEW! F98: Digital Recruiting Strategies & Data for Continuous Improvement	■ F108: Business Builders: Make Business Development a Competitive Advantage	■ F118: Protecting Original Design: The Importance of IP in Metal Forming	■ NEW! F128: A Marketing Framework: From Lead to Sale - Tools & Tips for Fabricators & OEMs	
SMART MANUFACTURING	■ NEW! F99: The Smart Factory & Feasibility with Case Studies	■ NEW! F109: A.I. for Predictive Manufacturing: Zero-Downtime, Zero-Defects	■ NEW! F119: Prevent Digital Failure and Benchmark Your Performance	■ NEW! F129: Smart Manufacturing on Predictable ROI	
STAMPING	■ NEW! S90: Stamping-1	■ NEW! S100: Stamping-2		■ NEW! S120: Stamping-3	
	■ NEW! S91: Sensors-1	■ NEW! S101: Sensors-2		■ NEW! S121: Quality & Tooling	
WELDING FABRICATION		■ NEW! W100: Optimization of Welding Documentation and Continuity Efficiency Using Computer Software			
WORKFORCE DEVELOPMENT	■ NEW! F217: Operational Excellence for Significant and Sustained Performance With Incentive Pay		■ NEW! F219: Leading Innovation & Change Initiatives in Your Organization	■ NEW! F220: Manage, Mentor and Develop Your New Workforce & Staff for The Future	
WELDING					
SEMINARS	■ W11: AWS Educational Overview of Welding Codes and Standards - Day 2			8:00 AM	5:00 PM
	■ W14: "Welding" Don't Be Afraid to Ask			8:00 AM	4:00 PM
	■ W15: Stainless Steel Welding D1.6 Structure			8:00 AM	4:00 PM
CONFERENCES	■ W16: 5th International Electron Beam Conference - Day 2			8:00 AM	5:00 PM
CAREER PATH WORKSHOPS	■ W19: Development of a New Standard for Metal Additive Manufacturing: AWS D20.1/D20.1M, Specification for Fabrication of Metal Components Using Additive Manufacturing			9:00 AM	11:00 AM
PROFESSIONAL PROGRAM	■ W25: SESSION 10: Plenary Session			8:00 AM	9:30 AM
	■ SESSION 11: In-Situ Measurement Techniques			9:40 AM	12:00 PM
	■ SESSION 12: Honorary Symposium for Prof. D. Olson I			9:40 AM	12:00 PM
	■ SESSION 13: Industrial Technology I			9:40 AM	12:00 PM
	■ SESSION 14: Process Sensing & Control			1:40 PM	5:00 PM
	■ SESSION 15: Honorary Symposium for Prof. D. Olson II			1:40 PM	5:00 PM
RWMA SCHOOL	■ W22: RWMA Resistance Welding School - Day 2			8:00 AM	5:00 PM

Detailed Education Program session descriptions, speakers, pricing, room locations and more can be found at fabtechexpo.com/edu.

■ = Basic ■ = Intermediate ■ = Advanced

THURSDAY, NOVEMBER 14

Schedule-at-a-Glance

TECHNOLOGY	8:00 AM - 9:30 AM	10:00 AM - 11:30 AM	12:00 PM - 1:30 PM	2:00 PM - 3:30 PM
3D/ADDITIVE MANUFACTURING	■ NEW! F130: How MES Transfers Data Efficiently Through The Additive Manufacturing Value Chain & Business Case Method			
AUTOMATION	■ NEW! F131: Sensors, Maintenance and Platforms for Leveraging Technology			
FINISHING	■ NEW! C130: Power Up and Hang On for Efficiency and Savings			
	■ NEW! C131: Using the Dirty Dozen to Optimize Your Powder Coating			
	■ C132: Test for the Best - Best Practices and Measurement Methods for Quality			
LEAN	■ NEW! F136: Lean Principle: Science of Lean Culture and Case Studies			
MANAGEMENT	■ F137: Making Better Decisions as a Business Leader & Tools for Management Success	■ NEW! F147: Financing to Enable Growth & Achieve Project Improvement		
SMART MANUFACTURING	■ NEW! F139: Smart Manufacturing to Successfully Implement the Trifecta; All in Real Time			
WORKFORCE DEVELOPMENT	■ NEW! F221: How to Win With Personalities & Team Engagement			
WELDING				
CAREER PATH WORKSHOPS	W20: Starting a Welding Inspection Business		8:00 AM	10:00 AM
	W21: Becoming a Certified Welding Accredited Test Facility for Testing Certified Welders		8:00 AM	11:00 AM
PROFESSIONAL PROGRAM	W26: SESSION 17: High-Energy Density Processes		8:00 AM	12:00 PM
	SESSION 18: Industrial Technology II		8:00 AM	12:00 PM

Detailed Education Program session descriptions, speakers, pricing, room locations and more can be found at fabtechexpo.com/edu.

EXPERIENCE LEVELS

Use this key along with the Schedule-at-a-Glance to find the education level that meets your needs.

- **Basic**..... Recommended for the attendee who is new to the industry or needs a refresher on the topic.
- **Intermediate**... Designed for the attendee who already has a basic understanding of the subject matter.
- **Advanced**..... For the attendee with several years of experience who is seeking more in-depth information.



LESS LABOR MORE THROUGHPUT



NEW! AUTOMATED SCRAP REMOVAL

#SeeToBelieve
FABTECH BOOTH **A2923**





NORTH AMERICA'S LARGEST METAL FORMING,
FABRICATING, WELDING AND FINISHING EVENT

CHICAGO
NOV 11-14

SAVE \$50

Register Today at
fabtechexpo.com

Use the **Promo Code** next to your
address when registering online.

Fabricators & Manufacturers
Association, International
2135 Point Blvd., Elgin, IL 60123

DON'T MISS THESE FABTECH EVENTS IN 2020



 **FABTECH**
Mexico City, Mexico | May 12-14

 **FABTECH**
Toronto, Canada | June 16-18

 **FABTECH**
Las Vegas NV, USA | Nov 18-20