SUNG WOON CORPORATION

Company profile

Driving us to an effective innovation solution Differentiating from others and valuing us

Sung Woon Corporation

www.swcinfo.com

Contents

1. About us

Company Profile

Certifications

Partners

2. What We Do

Business Area

Business Performance

3. Our Products

ΑII

Welding machine

Dissimilar material joining machine

Specialized joining machine

Others

4. Contact Us

01 About us

Company Profile

Certifications

Partners

1-1 Company Profile



Name	성운 (盛運) Sung Woon Corporation (SWC)
Date Established	2019. 4 .10
CEO	Lee Moonhee
Website	www.swcinfo.com
Email	sw.corp@swcinfo.com
Address	170, Sangbuk-ro, Sangbuk-myeon, Ulju-gun, Ulsan, Republic of Korea (44903)
TEL	+82 52-264-9309

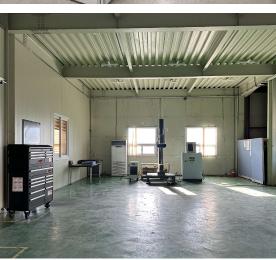


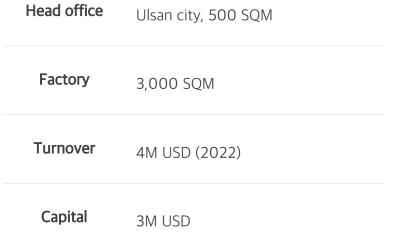


1-1 Company Profile











1-2 Certifications



2008. 3.8

Commendation by

The Small and Medium

Business Administration



2021. 12 .8

Commendation by

Ulsan Regional Small and

Medium Venture Business

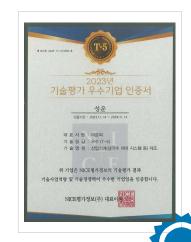
Administration



2022 .6 .17
Recognition of the department dedicated to R&D department



2022. 12. 6
Commendation by
Ulsan Metropolitan City Mayor



2023. 11.14
Certificate of
Excellence in
Technology Evaluation



1-3 Partners

Domestic Partners







Overseas Partners



























1-3 Partners

Customers







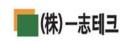




































02 What We Do

Business Area

Business Performance

2-1 Business Area



Accumulated Expertise



We offer consulting services on innovative joining equipment supply and technology.



01. Innovative joining and process improvement

We provide cutting-edge technologies for condenser welding, fastener joining, flush self-piercing riveting, clinching, electro magnetic pulse technology joining, crimping, plastic-metal joining, and enhancement of car body joining quality, along with innovative process improvement solutions.

O2. Technical Consultation, Joining Samples, and Test Data Provisions

We also provide consulting services on welding/mechanical joining, forming, and dissimilar joining technologies, along with support for sample joining tests.

03. Smart Water Control Systems

Our smart water control systems are designed to automate the management of cooling water in industrial settings, enhancing the efficiency of cooling operations.



2-1 Business Area



















2-2 Business Performance

*Project performance Only / Update : May 2024

Date	Project	Content
2020	Nawootec R&D	PEM SPR 1 SET
2020	SUr2 Project	Smart water cooling system 168 SET
2021	JK-EV Project	STOEGER FDS 10 SET
2021	Byton Project	PEM H/W Clinching 2 SET
2021	BN7r Project	Smart water cooling system 266 SET
2021	Tesla Project	HERON CD welder 8 SET
2022	ME Project	STOEGER BMS 1 SET
2022	BN7r Project	냉각수제어패키지 4 SET
2022	Tesla Project	HERON CD welder 8 SET
2022	KIST	STOEGER FDS 1 SET
2022	MV Project	STOEGER FDS 2 SET
2023	4MENG	STOEGER FDS 1 SET
2023	EVEREST Project	HERON CD welder 3 SET PEM H/W Clinching 6 SET
2023	MVA Project	HERON Clinching Forming 4 SET

Date	Project	Content
2023	ME Project	HERON Clinching Forming 14 SET PEM H/W Clinching 3 SET EPRESS UQ-FX 1 SET
2023	MEA Project	HERON Clinching Forming 5 SET EPRESS UQ-FX 1 SET
2023	Nawootec R&D	HERON Clinching Forming 1 SET EPRESS EFDS 1 SET EPRESS UQ-FX 1 SET
2023	IP display bracket Project	PEM H/W Clinching 1 SET
2023	KIA 2P EV Project	PARKER WRA 105 SET
2023	Everest Ancillary Project	PEM H/W Clinching 3 SET
2024	OPAL/GUSSET	MDS In die press 3 SET
2024	Ilji Tech	HERON CD welder 1 SET
2024	Ajin Industry	HERON CD welder 3 SET
2024	LUCID Project	PEM H/W Clinching 9 SET



03 Our Products

All

Welding machine

Dissimilar material joining machine

Specialized joining machine

Others

3-1 All











Welding machine

Condenser Projection
 Welding System

Dissimilar material joining machine

- BRS (Blind Rivet nut/bolt Setting System)
- H/W (Fastener) ClinchingSystem
- Clinching Forming System
- FSPR (Flush Self-Piercing Riveting System)

Specialized joining machine

- EMPT (Electro Magnetic Pulse Technology)
- hyJOIN (Thermal direct joining Technology)

Others

- Transformer
- WBB (Cooling water control module)
- WRA (Cooling water retract cylinder)
- PHAsisNEO (Ultrasonic inspection device)
- PHAsisBLU (Ultrasonic inspection device)
- Hand/Manual Tool



3-2 Welding machine - Condenser Projection Welding









Condenser Projection Welding System

: Projection welder for joining nuts and bolts to high strength and hot-stamping steel sheets

- · Small heat affected zone, lower energy consumption, electrode loss, cost saving
- When welding galvanized parts, the galvanized layer in the non-welding area can not be damaged,
 no grinding and post-treatment is required
- The welding process is not affected by grid fluctuations, especially welding of high-strength and thermoformed steels is very stable



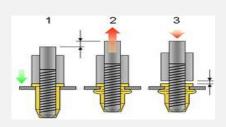
3-3 Dissimilar material joining machine - BRS



BRS (Blind Rivet nut/bolt Setting System)

: Install most rivet nut and stud

- Cycle time, 6 s for round rivet nut/stud, 7 s for hexagon rivet nut/stud
- PAC system, force, displacement real time monitor, and process control
- PEM design 3D camera for high-precision positioning
- Data storage locally and connect MES





3-3 Dissimilar material joining machine - H/W Clinching



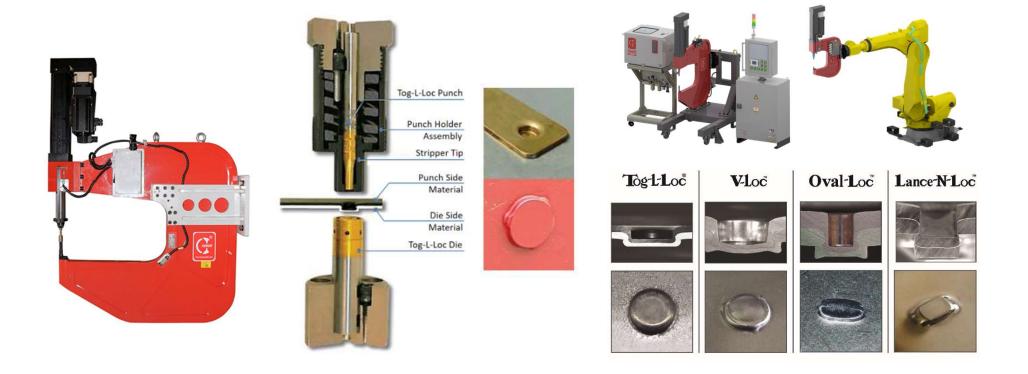
H/W (Fastener) Clinching System

: Hardware/fastener insertion system

- Air-Oil / Servo-Hydraulic Actuator type
- Universal program platform
- Modular design for frame, cylinder, servo pump and control system
- PMCS system (curve system)



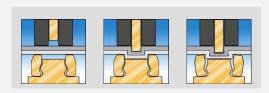
3-3 Dissimilar material joining machine - Clinching Forming



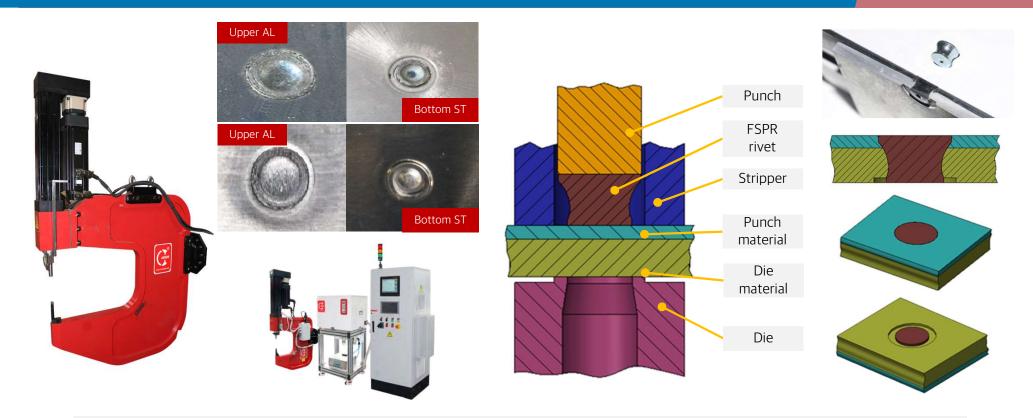
Clinching Forming System

: An innovative and proven system for dissimillar material without rivets or welding

- No welding fumes, no hazardous exhaust, no noise, Low energy consumption
- Cost effective, environmentally friendly
- Lightweight design containing customized servo drive and C-frame
- Reduce carbon footprint, save energy



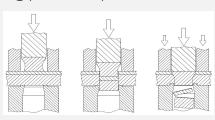
3-3 Dissimilar material joining machine - FSPR



FSPR (Flush Self-Piercing Riveting System)

: Automatically supplies special solid rivets to punches via pressure-based riveting

- Can rivet high-strength alloy, thermoforming steel, carbon fiber. Multi-layer riveting possible up to 9.1mm
- Punching and riveting can be completed at one time, without pre holes
- · Good molding effect, punch can be pre-painted or plated
- Stable shear force, tension force and riveting appearance
- Strong anti-rust ability, the longest can pass the salt spray test 480 hours





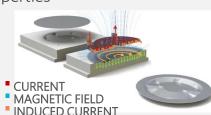
3-4 Specialized joining machine - EMPT



EMPT (Electro Magnetic Pulse Technology)

: Capable of High-strength welding, multi-material bonding without distortion, No heat loss

- High-strength welding and crimping without thermal-related loss of material properties
- · Crimping, forming, welding, cutting, EHF
- Easy integration into production lines and higher-level quality detecting systems
- Safe technology in accordance with legal regulations
- Low service and maintenance





3-4 Specialized joining machine - hyJOIN

















Tensile shear strength: 20 MPa

Heating time :

2,2 sec

1,1 sec

hyJOIN (Thermal direct joining Technology)

: Quick and reliable metal-thermoplastic technology without the need of any additional material

- · Stable connection without additional material
- Smart alternative to adhesive bonding
- Joining technology for complex components
- Flexibility through exchangeable heating modules
- Flexible integration into fully automated assembly lines





3-5 Others



Transformer

Water-cooled transformer for high-current applications in the DC and AC range

- Benefit from over 50 years of tradition and experience
- In addition to standard applications,
 specializes in individual support for
 customer requirements



WBB (Cooling water control module)

water block brass with all features integrated - manifold design

- Coolant flow & temperature monitoring
- Installation of check valves to allow complete shutdown
- Easy to manage by minimizing coolant piping connections



WRA (Cooling water retract cylinder)

Inhalation of coolant and 100% blocking of coolant discharge when replacing tip

- Different mounting methods (panel mounting, frame mounting, robot mounting, etc.)
- Ensure compatibility with all coolant fluids and long life
- Avoiding various potential hazards from coolant runoff



3-5 Others



PHAsisNEO (Ultrasonic inspection device)

Fast and precise inspection of welded joints in production

- housing with shock protection, replaceable display and passive cooling
- The swiveling handle with fixed locking positions guarantees the best view on the display
- Intuitive operation with touchscreen,
 keyboard or remote control



PHAsisBLU (Ultrasonic inspection device)

Fast and precise inspection of welded joints in production

- Especially for spot welds and short weld seams
- Ideal for thickness 0.6mm~5mm
- by using robot technology it can help reduce testing time as well as improve reproducibility



Hand/Manual Tool

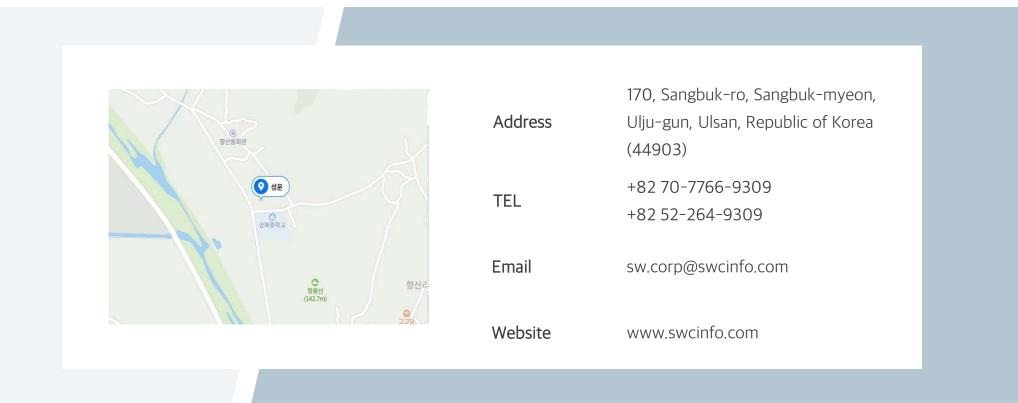
For Riveting, Clinching, SPR

- Easy to use
- Pneumatic/servo type
- Auto feeding (optional)
- Monitoring (optional)
- Mainly used for line maintenance



> 04 Contact us

4 Contact Us





THANK YOU!

Driving us to an effective innovation solution Differentiating from others and valuing us

Sung Woon Corporation www.swcinfo.com