Heat Staking Technology
In heat staking of thermoplastics, the material is plasticized by use of an electrically heated riveting die at the point of contact and is extracted and subsequently joined together under pressure. After this process the material is air cooled. The riveting die is heated by a heating cartridge with a temperature sensor for monitoring.

Heat staking enables
- The riveting of plastics
- The manufacture of large production lots
- Combining the most varied materials
- Joining Fixing of various materials such as metals to plastic

Equipment portfolio
FRIMO JoinLine – Machine series for heat staking
The equipment portfolio includes standard machinery for nearly every application, which can be equipped with a standardized tool-changing system as an option.

Additionally, smaller standard machines are part of the portfolio, which are more economical yet allow for a variety of uses. In the middle range of machines, equipment types are offered which allow for economical and highly productive welding.

Thanks to very compact riveting units, space-saving construction is possible. Depending on project and customer requirements, widely varying production layouts as well as combination and special solutions are feasible.

All JoinLine heat staking machines can also be combined with other joining processes.
Equipment from a Modular Construction kit – Simple and Quickly Available

Equipment technology

FRIMO offers innovative concepts for rapid tool change to allow for optimal handling and higher productivity.

- Modular system in the form of an interchangeable cassette
- Cassette usage guarantees optimal protection of welding units
- Rapid tool change possible within 3 minutes by only one operator
- Each machine can use multiple cassettes
- Tool change cart optional
- Depending on production conditions, tool change is possible on the front or back side of the machine

Benefits

- Simple and cost-effective process
- Low energy use
- Various material combinations
- Join of various materials such as metals to plastic
- Suitable for large production lots
- Short delivery times due to standard riveting units
- State-of-the-art equipped TechCenter for various application trials, process testing, and further development