



**STANNOL**

THE WORLDWIDE  
**1<sup>ST</sup> GREEN**  
PRODUCT LINE



**greenconnect**

responsible soldering products



# greenconnect

responsible soldering products

## ENVIRONMENTAL ASPECTS BECOME MORE AND MORE IMPORTANT

THE INCREASING SOCIAL RELEVANCE OF ENVIRONMENTAL ASPECTS CAN BE SEEN ON ALMOST ALL LEVELS OF LIFE:

WHETHER PLASTIC BAGS IN THE SUPERMARKET, COFFEE CUPS AT THE GAS STATION OR THE DEMONSTRATIONS OF “FRIDAYS FOR FUTURE” – CONSUMERS’ ENVIRONMENTAL AWARENESS HAS INCREASED RAPIDLY. AND THAT REGARDLESS OF AGE, EDUCATIONAL STATUS AND OTHER SOCIAL CHARACTERISTICS.

The environment is no longer seen as a niche, the ecological reorientation encompasses all areas of our everyday life: personal purchasing decisions, social values and corporate strategies. This megatrend is not only reorienting values in global society, it is also changing entrepreneurial thinking and acting in German industry.

Stannol is worldwide the first manufacturer in the field of soldering technology to offer a complete ecological friendly product range: **greenconnect**.

In the past there had been only two criteria to purchase tin: quality and price. Due to the strong demand for raw materials

we can find inhumane working and living conditions in almost all mining areas. The environment suffers severely from the uncontrolled and partly illegal extraction of raw materials. As early as 2014, in cooperation with Fairlötet e.V., we launched a solder wire on the market that is produced in emerging countries without exploiting people or destroying the environment.

### THE HISTORY OF GREENCONNECT

After the great success of this product, we went one step further in 2016 and launched the Fairtin project. For this project we exclusively use tin from suppliers who, firstly, protect the environment, secondly, fulfil their social responsibility for

employees and people on site and, thirdly, act transparently – beyond the legal minimum. In this way, we enable our customers to go one step further towards sustainable and ecological production.

The fact that several large, well-known industrial companies are now purchasing products from us that bear the Fairtin label shows us that we can feel confirmed with our sustainable orientation.

This includes a flux in which the previous main component isopropanol (IPA) is replaced by bio-ethanol. Bio-ethanol consists of renewable raw materials such as straw and can be produced completely without fossil fuels via a fermentation process, which results in a significantly better CO<sub>2</sub> balance. Extensive tests have proven that a 1:1 exchange is possible without changing the process parameters.

With Stannol's solder pastes, too, sustainable aspects are now in the foreground. A solder paste consists of 90% solder metal powder, which is largely made of tin.

As a result of its cooperation with a solder powder supplier, Stannol will also be able to offer a solder paste bearing the Fairtin label from November 2019.

#### THE FOUR AREAS OF GREENCONNECT

The new green connect product range will then initially consist of the following four areas:

- different **solder bars** (Fairtin)
- different **solder wires** (e.g. Kristall 600 and 611 FAIR)
- different kinds of **fluxes** (at least 97 % from renewable raw materials) and
- **solder pastes** (metal powder made of Fairtin).



#### FAIR TO THE ENVIRONMENT



#### FAIR TO THE EMPLOYEES



#### FAIR DUE TO TRANSPARENCY

The high quality demands placed on our own products ensure that all materials can be used in the manufacturing process without costly re-qualification, which enables our customers to provide transparent information about the soldering material used.

*It is planned to use only 100 % recycled plastic spools for solder wires, in the medium term.*

*(Marco Dörr, Managing Director of Stannol GmbH & Co. KG)*

“When it comes to the topic of plastic usage, we also asked ourselves: What can we do as company to minimize our impact? And the answer has been found a few weeks ago: It is planned to use 100 % recycled plastic spools for solder wires, in the medium term.” (Marco Dörr, Managing Director of Stannol GmbH & Co. KG)



As proof of your commitment, you will receive a personalised, batch-related certificate



## HALOGEN ACTIVATED WIRE FLUX KRISTALL 611 FAIRTIN

Kristall **611 FAIR** is a halogen-activated solder wire with a wide process window. Reduced flux spitting in combination with outstanding wetting properties on poorly solderable surfaces are the highlights of this new product.

### PRODUCT ADVANTAGES

- The alloys are made of Fairtin
- Very low spitting
- Only lightly colored residues
- Fast soldering
- No-clean residues
- Chemically modified resin that reduces the health risks associated with the use of rosin-based fluxes.
- Mild odor

### APPLICATION AREAS

Designed for manual rework and automated soldering, this product enables the different production needs in a modern electronics manufacturing to be met. The flux complies with J-STD-004B standards and is classified as a REM1 flux.



## FAIRTIN SOLDER BARS IN VARIOUS ALLOYS

**FAIRTIN** alloys are only made of tin from manufacturers who pay particular attention to environmental protection, comply with national and international laws and fulfil their social responsibility when extracting ore and processing it.

### PRODUCT ADVANTAGES

- the tin used in our alloys complies with valid current norms and quality standards, therefore Fairtin does not have to be re-qualified
- you will receive a certificate as proof of your commitment and the use of our Fairtin products.

### APPLICATION AREAS

When switching from lead-free standard alloys to Fairtin alloys, all existing settings remain the same!



The illustrated products are examples.  
A large number of other greenconnect products are available on request. Please contact us:  
[info@stannol.de](mailto:info@stannol.de)

## NO-CLEAN FLUX EF350 BIO

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The halid-free activated No-Clean flux **EF350 BIO** guarantees excellent wetting on different surfaces (e.g. OSP, Ni/Au, HAL, chem. Sn and chem. Ag) both with lead-free and with lead-containing solder alloys. By using renewable raw materials, we can achieve a better ecological balance with consistently high quality.

### PRODUCT ADVANTAGES

- 70 % CO<sub>2</sub> saving per liter (compared to conventional fluxes)
- Universally applicable
- High solid content – fast wetting
- No-clean
- Electrically safe residues
- Excellent wetting properties

### APPLICATION AREAS

The EF350 BIO is a flux with a very wide working range. It can be used universally, for wave soldering as well as for selective soldering, for both spray and foam fluxers. Due to its excellent activity the EF350 BIO is also suitable for selective soldering.



## SOLDER PASTE SP2200 FAIR

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The **SP2200 FAIR** solder paste has been developed for high-volume, lead-free SMD electronics production. It contains a highly active L0 No-Clean flux. With a special formula for excellent wetting, it meets the wetting requirements for surfaces found in any series production today. The small amounts of residues after reflow are bright, transparent, electrically safe and do not need to be removed.

### PRODUCT ADVANTAGES

- The solder powder is extracted from our Fairtin series ([www.fairtin.de](http://www.fairtin.de))
- Fairtin can only be supplied by metal powder producers who are particularly committed to sustainability.
- Long open time of the printed PCB
- Reflow under air or nitrogen possible

### APPLICATION AREAS

Paste printing: The SP2200 FAIR solder paste was developed for stencil printing. With particle size 3 (25-45µm) and 4 (20-38µm) of alloys TSC405, TSC305 and TSC0307, the solder paste SP2200 FAIR can be used in all open and closed printing systems.





# STANNOL

## TRADITION AND INNOVATION

SINCE 1879 – MADE IN GERMANY



SOLDER WIRES



FLUXES



SOLDERING IRONS



SOLDER PASTES



ACCESSORIES



SOLDER BARS



# STANNOL

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