



Solder wire Aquasol 4002

INTERFLUX®
ELECTRONICS N.V.



Technical data Aquasol 4002

Ver: 3.11 23-09-15

Page 1

Lead-free, high activation, water soluble solder wire

Description:

Interflux® **Aquasol 4002** for lead-free alloys is a solder wire with water soluble flux residue. It is highly activated for increased wetting on surfaces that are difficult to solder or degraded and oxidised surfaces.

Aquasol 4002 residue must be cleaned. Cleaning is easily done with demi water of 35– 45°C (95°F– 114° F) with or without the aid of a saponifier.

Aquasol 4002 can be used in both hand soldering and automated soldering processes.

Aquasol 4002 solder wire contains halogens and is classified as OR H1 according to IPC and EN-standards.



Products pictured may differ from the product delivered



More information:

| | |
|-------------------|---|
| Work instructions | 2 |
| Handling | 2 |
| Test results | 2 |
| Packaging | 3 |

Key advantages:

- Water soluble flux residue
- High wetting power on surfaces that are difficult to solder.
- Suitable for automated soldering

Availability

Flux type: IF 4002
Flux content: 3% w/w

| alloy | melting point | diameters | | | | | | |
|---------------------------|---------------|------------------------------|------|------|------|------|------|--|
| | | 0,35 | 0,50 | 0,70 | 1,00 | 1,50 | 2,00 | |
| Sn99,3Cu0,7 | +/- 227°C | ● | ● | ● | ● | ● | ● | |
| Sn96,5Ag3,0Cu0,5 | +/-217°C | ● | ● | ● | ● | ● | ● | |
| Other alloys upon request | | Other diameters upon request | | | | | | |

● = available ● = upon request



Work instructions

Manual soldering

The advised working temperature is between 320°C and 390°C. For more dense metals like Nickel, the temperature may be elevated to 420°C.

The use of a good soldering station is important. Use a soldering station with a short response time and with enough power for your application.

er for your application.

Choose the correct soldering tip: to reduce the thermal resistance, it is important to create a large contact area with the surfaces to be soldered.

Heat up both the surfaces simultaneously. Slightly touch with the solder wire, the point where soldering tip

and the surfaces to be soldered meet (the small quantity of solder ensures a drastic lowering of the thermal resistance). Add subsequently without interruption, the correct amount of solder close to the soldering tip without touching the tip. This will reduce the risk on flux spitting and premature flux consumption!

Post solder residue needs to be cleaned. This can be done with demi water of 35–45°C (95°F– 114°F) with or without the aid of a saponifier.

Handling

Storage

Store the solder wire in a clean environment at ambient temperature.

Handling

To avoid spool and wire damage, handle package with care.

Test results

conform EN 61190-1-3(2007) and IPC J-STD-004(A)

| Property | Result | Method |
|-----------------------------|--|------------------------------------|
| Chemical | | |
| flux designator | OR H1 F-SW 25 2.1.2 | J-STD-004A DIN 8511 ISO 9454 |
| % halide content | >2% | |
| acid value | 7,1 ±1 mg KOH/g (25% solution) | J-STD-004A 2.3.13 |
| Environmental | | |
| SIR test | pass (cleaned) | J-STD-004 IPC-TM-650 2.6.3.3 |
| qualitative corrosion, flux | pass (cleaned) | J-STD-004A IPC-TM-650 2.6.15 |
| electro chemical migration | pass (cleaned) | J-STD-004A IPC-TM-650 2.6.14.1 |



Packaging

Spools of 100g, 500g and 1000g

Not all diameters are available on all spool sizes

Trade name: Aquasol 4002 Lead-free, Water Soluble Wire

D i s c l i m e r

Because Interflux® Electronics N.V. cannot anticipate or control the many different conditions under which this information and our products may be used, we do not guarantee the applicability or the accuracy of this information or the suitability of our products in any given situation. Users of our products should make their own test to determine the suitability of each such product for their particular purposes. The product discussed is sold without such warranty, either express or implied.

Copyright:
INTERFLUX® ELECTRONICS

Please consult the latest
version of this document
on:

www.interflux.com

This document in another
language?:

www.interflux.com