

BONDERITE M-FE 7760

Known as Duridine 7760
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PRODUCT DESCRIPTION

BONDERITE M-FE 7760 provides the following product characteristics:

Technology	Cleaner - coater
Product Type	Acid 1-2-components
Application	Spray
Concentration	10 to 30 g/L
Temperature	45 to 60°C

BONDERITE M-FE 7760 is a liquid product based on acidic phosphates and a combination of highly efficient surfactants.

BONDERITE M-FE 7760 degreases and cleans steel, galvanized steel and aluminium.

On cold rolled steel and iron it simultaneously generates a uniform iron phosphate layer with a coating weight of 0.2 g/m² up to 0.4 g/m².

The iron phosphate layer provides an excellent adhesion for organic coatings and improves the corrosion resistance.

Also on galvanized steel and aluminium surfaces the adhesion of organic coatings is improved by BONDERITE M-FE 7760. When parts out of aluminium or galvanized steel are treated in the same line at a high amount (> 10 %), BONDERITE M-AD 338 should be added to avoid a distortion of the iron phosphating process.

BONDERITE M-FE 7760 is used in spray applications.

BONDERITE M-FE 7760 can also be used in high pressure equipment.

Iron phosphating baths can be controlled by measuring the pH value or the conductivity.

Application Areas:

BONDERITE M-FE 7760 is used in spray- and spray/immersion processes. It must be combined with a suitable cleaning booster.

Pre-painting treatment of spare parts in automotive, appliances, metal furniture industries and, in general, on all plate pieces which are not much exposed to corrosive agent aggression (humidity, atmospheric conditions, etc.). Modification of the following data may be necessary due to specific needs of the phosphating line.

Process components

BONDERITE M-FE 7760

BONDERITE M-AD 565

BONDERITE M-AD 338 or BONDERITE M-AD 339 L, if needed.

DIRECTIONS FOR USE

Preliminary Statement:

Prior to use it is necessary to read the **Material Safety Data Sheet** for information about precautionary measures and safety recommendations. Also, for chemical products exempt from compulsory labeling, the relevant precautions should always be observed. Please also refer to the local safety instructions and contact Henkel for analytical support.

Operation:

Total Acid	3.1 to 9.3
pH-value	4.5 to 5.5
Temperature, °C	45 to 60
Time for the spray process, min	2 to 3
Spray pressure, bar	1 to 2

Bath make-up:

Fill the bath with water and heat it to operating temperature. Add with running circulating pump the correct amount of BONDERITE M-FE 7760. Please note that BONDERITE M-FE 7760 generates foam when the spray equipment starts working at temperatures below 45 °C.

Build-up for 1,000 L solution:

BONDERITE M-FE 7760	10 to 30 kg = 7.7 to 23.1 L
BONDERITE M-AD 565 to adjust the pH-value	

Remarks:

A BONDERITE M-FE 7760 bath with a concentration of 10 g/L in deionized water has a pH-value of 3.2. The pH-value depends on the concentration and the hardness of the water. With addition of BONDERITE M-AD 565 the pH-value increases. At the same time, the "total acid" pointage decreases.

The correct amount of BONDERITE M-AD 565 has to be determined on site. A start pH-value of 4.5 to 4.8 is recommended.

Bath Monitoring:

The BONDERITE M-FE 7760 bath can be checked by titration of "total acid" or by pH-measurement.

Titration of Total Acid:

- Pipette a 10 mL sample into a 150 mL beaker and dilute with about 50 mL deionized water.
- Add 3 to 5 drops of indicator phenolphthalein. .
- Titrate with 0.1 N sodium hydroxide from colorless to the development of a permanent pink color.
- The mL of 0.1 N sodium hydroxide required indicates the "total acid" value in points.

It is also possible to titrate the "total acid" with a pH-electrode. The consumption of mL 0.1 N sodium hydroxide until a pH-value of 8.5 is the "total acid" pointage.

Replenishing of the bath:

To increase 1 point of "Total Acid" add per 1,000 L bath:

BONDERITE M-FE 7760 3.2 kg = 2.5 L

Classification:

Please refer to the corresponding **Material Safety Data Sheets** for details on:

Hazards identification

Transport information

Regulatory information

Storage:

Recommended Storage Temperature, °C	-5 to +40
Shelf-life, months	36

ADDITIONAL INFORMATION**Disclaimer****Note:**

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Reference 0.1