

General Application Advice

Dry Spray Mortar

Application Guidelines

Application Conditions

It is possible to apply one or several layers. The second and all further layers are applied to each previously sprayed layer, which must have stiffened but not yet completely dry. If the previous layer has dried out completely, it must be pre-wetted before application. Please refer to the application information in the official test certificate.

Machine Technology

Standard dry-spraying machines with rotor delivery are suitable for application. To ensure a consistent delivery of the spraying material, we advise the use of the machine technology listed in Table 1.

Water-/Oil separator

To ensure an optimal delivery, an additional sufficiently large water-oil separator must be attached between the compressor unit exit and the spraying nozzle.

Water Boosting Pump

To prevent possible pressure fluctuations in the water delivery, which may lead to insufficient wet-

ting of the dry-spraying material, it is absolutely necessary to employ a pressure-raising pump.

Rebound Behaviour

The rebound behaviour must be considered individually for each object, as it depends on position and accessibility of a structural part and on the skills of the nozzle-operator. Please refer to the nozzle-operator manual published by the Industrial Association German Construction Chemicals. The rebound values listed in Table 2 are experience values which take all parameters into account.

Definition: Rebound

Rebound is the part of the spraying material which rebounds from the surface and falls to the ground. Rebound is not the additional loss of material due to a possible subsequent treatment (finishing, levelling over a height gage) of the sprayed layer.

Auxiliary Form Work

When re-profiling supports, pillars and beams suitable form work must be installed. When concrete covers are increased over larger areas, height gages must be installed to achieve an even height.

Table 1: Machine Technology

Configuration	Technology 1 (Velco)	Technology 2 (Aliva)
Dry-spraying machine	Velco Rotamat 25 tb with a 48 rotor	Aliva 237 with a 0.7 litre rotor
Spraying Nozzle	Cast iron nozzle 32/18 mm	Aliva Vulcollan nozzle 32/18 mm
Delivery Hose	Length: 40 m Ø interior/exterior 48/32 mm	Length: 40 m Ø interior/exterior 52/32 mm
Water-pressure raising pump	Adjusted to 6 bar water pressure	Adjusted to approx. 12-15 bar water pressure
Compressor Capacity	5-6 m ³ /minute	5-6 m ³ /minute
Delivery air pressure at the spraying machine	approx. 1.4-1.5 bar	approx. 1.4 bar
Delivery Capacity	approx. 800-1200 kg/h	approx. 300-400 kg/h

Table 2: Experience Values for Rebound

Direction of Application	vertical		overhead	
	10-20	20-50	10-20	20-50
Layer thickness (mm)	10-20	20-50	10-20	20-50
Rebound in %	20-25	15-20	25-35	20-25

Note: The information on this data sheet is based on our experiences and correct to the best of our knowledge. It is, however, not binding. It has to be adjusted to the individual structure, application purpose and especially to local conditions. Our data refers to the accepted engineering rules, which have to be observed during application. This provided we are liable for the correctness of this data within the scope of our terms and conditions of sale-delivery-and-service. Recommendations of our employees which differ from the data contained in our information sheets are only binding if given in written form. The accepted engineering rules must be observed at all times.

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