Dryzone Vienna Report Summary

This report gives a short summary of the OFI External Report no. 403.275 regarding the test application of Dryzone to a Primary School at Hietzinger Hauptstrasse 166, 1130 Vienna. The full report is available to interested parties from Safeguard Europe.

The report is summarised as follows;

1. OFI-Technologie & Innovation was commissioned to determine the moisture values in the cellar and ground floor of the primary school and determine the efficacy of using Dryzone as a horizontal retrofitted damp proof course.

2. A detailed study of moisture and salt contents was undertaken. Measurements were made at different heights in 13 locations giving a total of 38 test points.

3. Moisture contents in the brickwork were found to vary between 1.1 and 24.1 weight % in the extreme cases. This is against a maximum saturation of 25.3 wt% of the brick. Hence the highest degree of saturation observed was 95% (namely 24.1/25.3).

The general pattern of the data was that moisture contents were greatest at lower floor heights, consistent with the existence of rising damp.

4. Salts were also prevalent. Sulphates were widespread with values typically at 0.2 wt% whereas chlorides were approximately 0.01 – 0.02% and nitrates 0.02%.

5. The effectiveness of the Dryzone treatment was measured according to the Austrian Standard Ö-NORM B 3355.

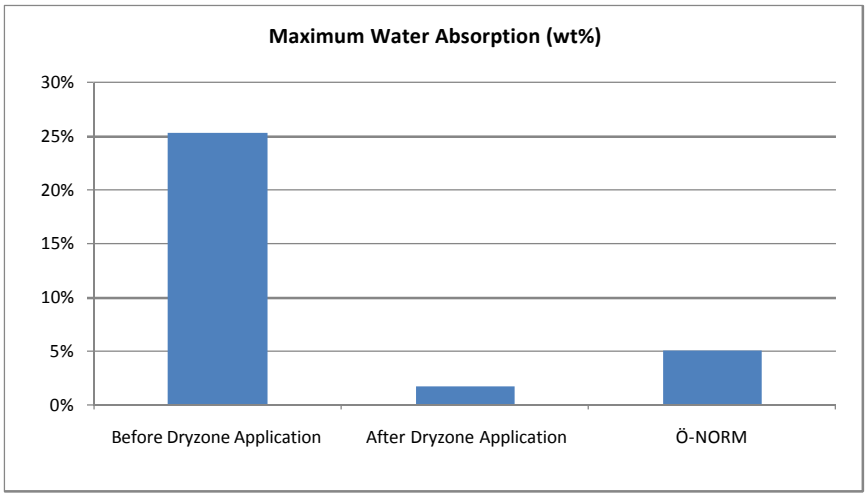
The maximum water uptake potential was found to be reduced from 25.3% to 0.3 - 4.0% depending on the location as shown in the Table below.

Table: Reduction of Maximum Moisture Saturation Value after Dryzone Treatment

Location	*Degree of Water Saturation before Dryzone Applied (%)*	*Maximum Moisture Uptake **before** Dryzone applied (wt%)*	*Maximum Moisture Uptake **after** Dryzone applied (wt%)*	
			Near injection holes	*Between injection holes*
PS1	*95%*	*25.3%*	*0.5%, 0.9%*	*1.0%, 3.2%*
PS2	*-*	*25.3%*	*0.3%, 4.0%*	*0.8%, 0.7%*
PS3	*53%*	*25.3%*	*1.2%, 3.9%*	*0.3%, 2.1%*

See the graph on the following page;

6. The average maximum moisture content of the Dryzone treated areas was found to be 1.6 wt%. This represents **6.2%** of the original value of 25.3 wt%. Hence Dryzone is observed to pass the Austrian Standard Ö-NORM B 3355 which has a maximum requirement of **20.0%** of the original value.



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