

OFFICIAL TEST REPORT ON THE SUCCESSFUL TRIAL OF THE NMR PIPETECTOR

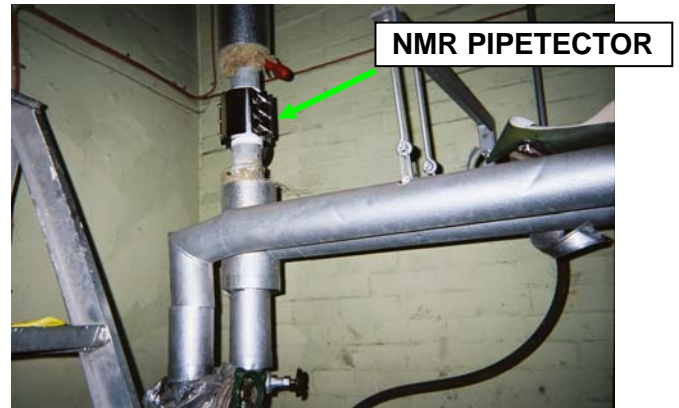
Anti-Corrosion Application, London Marriott Hotel Grosvenor Square,
located in London

NMR Corporation

*Appearance of Building and Installation Place



Appearance of the building



Header pipe of domestic hot water

< Installation Purpose and Result >

London Marriott Hotel Grosvenor Square is one of the prestigious hotels in the world, and it was built in 1964 and has 236 rooms. NMR Pipetector has been fitted onto the domestic hot water system that is steel galvanized pipe and supplies all the hot water to the main hotel kitchens.

For the protection of the hot water pipe work from corrosion, one NMR unit of 3 inch (PT-75DS) was installed onto the header pipe of the domestic hot water service that supplies the main hotel kitchens where the samples of water for analysis were taken from.

Only 9 days after the installation of NMR Pipetector, the Fe content considerably decreased from 5.28mg/l (before the installation of NMR Pipetector) to 0.033mg/l, and 35 days after the installation, the Fe content stayed at low of 0.032mg/l which is much lower than the British Government Standard for Drinking Water of 0.2mg/l. It means that new forming of corrosion (FeO(OH)) inside of the pipe work was immediately terminated, and the existing corrosion was reduced to magnetite (Fe₃O₄) which is not dissolved into the water and protects the inside of the pipe from corrosion.

< Installation Summary >

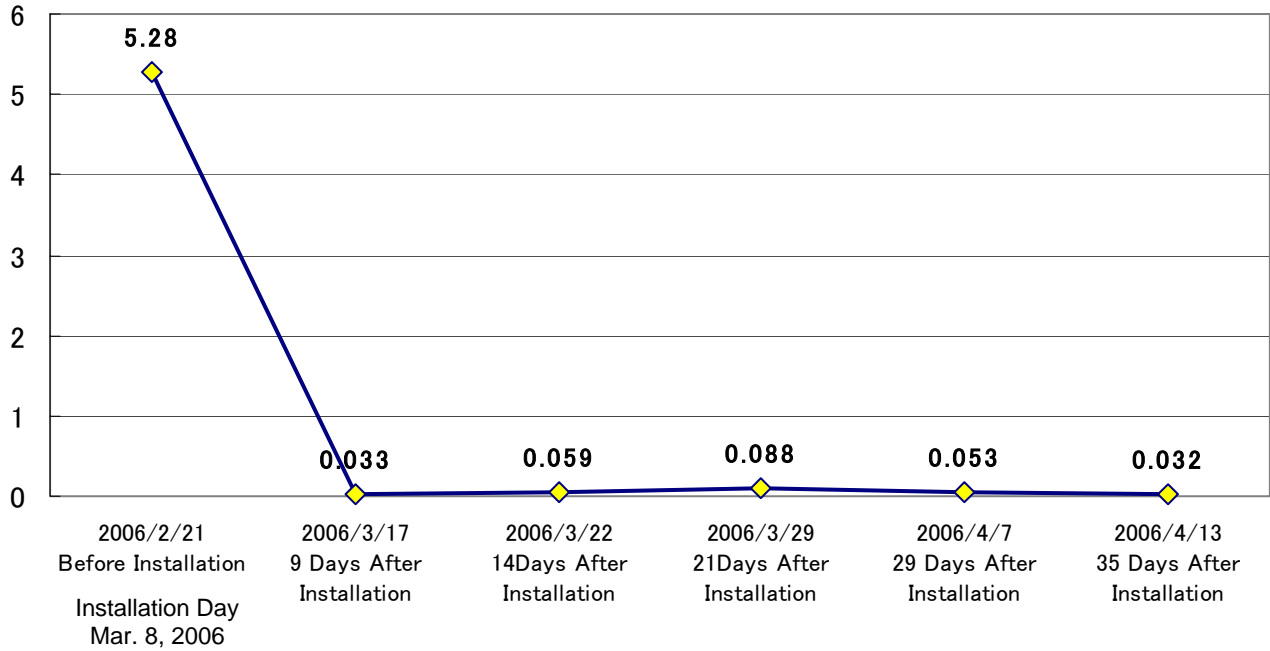
Name of Building :Address	London Marriott Hotel Grosvenor Square: 10-13, Grosvenor Square, London W1K 6JP, England
Building Summary	One of the prestigious hotels in the world. The hotel was built in 1964 and has 236 rooms.
Installation Place	Header pipe of domestic hot water service that supplies the main hotel kitchens.
Installation Day	March 8 th in 2006
Installation Place Number of installed NMR PIPETECTOR	3 inch header pipe of domestic hot water (SGP) PT-75DSx1unit

<Fe content in hot water (mg/l)>

	Before Installation Feb. 21, 2006	Installation Day Mar. 8, 2006	9 Days After Installation Mar. 17, 2006	14 Days After Installation Mar. 22, 2006	21 Days After Installation Mar. 29, 2006	29 Days After Installation Apr. 7, 2006	35 Days After Installation Apr. 13, 2006	British Government Standard for Drinking Water
Fe Content in Water	5.28 mg/l			0.033 mg/l	0.059 mg/l	0.088 mg/l	0.053 mg/l	0.032 mg/l

Fe Content in Water(mg/l)




Marriot Hotel Grosbenor Square
Change of Fe Content in Water(mg/l)



Before Installation

9 Days After Installation

Certificate of Analysis

1314
0897
1229
1510

Sample 1 Laboratory Number : **279107**
of 1 Report Number : **BR/328825/2006** Issue 1

Sample Source : **Cambridge Water Company**
Sample Point Description : **Cambridgeshire Water Company**
Sample Description : **PETER GOSLING MARRIOTT HOTEL KITCHEN**




Sample Date : **21 February 2006** Sample Received : **21 February 2006** Analysis Complete : **27 February 2006**

Test Description	Result	Units	Limit	Accreditation	Method
Iron, Total as Fe	5280	ug/l	200	B	SBC44

Accreditation Codes : * = Not UKAS accredited, B = Analysed at STL Bridgend, C = Analysed at STL Coventry, R = Analysed at STL Runcorn, L = Analysed at STL Midlands, S = Sub-contracted
For Microbiological determinands 0 or ND = Not Detected, DET = Detected, For Legionella ND=Not detected in volume of sample filtered. I/S = Insufficient sample

Signed : *R. Robins* Name : **R. Robins** Date : **28 February 2006**
Title : **Senior Chemist**

Certificate of Analysis

1314
0897
1229
1510

Sample 1 Laboratory Number : **314315**
of 1 Report Number : **BR/333867/2006** Issue 1

Sample Source : **Cambridge Water Company**
Sample Point Description : **Cambridgeshire Water Company**
Sample Description : **Marriott Hotel Grosvenor Square**

Sample Date : **17 March 2006** Sample Received : **17 March 2006** Analysis Complete : **21 March 2006**

Test Description	Result	Units	Limit	Accreditation	Method
Iron, Total as Fe	33	ug/l	200	B	SBC44




Accreditation Codes : * = Not UKAS accredited, B = Analysed at STL Bridgend, C = Analysed at STL Coventry, R = Analysed at STL Runcorn, L = Analysed at STL Midlands, S = Sub-contracted
For Microbiological determinands 0 or ND = Not Detected, DET = Detected, For Legionella ND=Not detected in volume of sample filtered. I/S = Insufficient sample

Signed : *T. Down* Name : **T. Down** Date : **22 March 2006**
Title : **Production Manager**

Marriott 3-5(080417)

14 Days After Installation

Certificate of Analysis


1314
0897
1229
1510

Sample 1 Laboratory Number : 320409
of 1 Report Number : BR/334715/2006 Issue 1

Sample Source : Cambridge Water Company
Sample Point Description : Cambridgeshire Water Company
Sample Description : Peter Gosloing Marriott Hotel Grosvenor Square
Sample Date : 22 March 2006 Sample Received : 22 March 2006 Analysis Complete : 27 March 2006




Test Description	Result	Units	Limit	Accreditation	Method
Iron, Total as Fe	59	ug/l	200	B	SBC44

Accreditation Codes : * = Not UKAS accredited, B = Analysed at STL Bridgend, C = Analysed at STL Coventry, R = Analysed at STL Runcorn, L = Analysed at STL Midlands, S = Sub-contracted
For Microbiological determinands 0 or ND = Not Detected, DET = Detected, For Legionella ND=Not detected in volume of sample filtered. I/S = Insufficient sample

Signed :  Name : T. Down Date : 28 March 2006
Title : Production Manager

21 Days After Installation

Certificate of Analysis


1314
0897
1229
1510

Sample 3 Laboratory Number : 331005
of 3 Report Number : BR/336194/2006 Issue 1

Sample Source : Cambridge Water Company
Sample Point Description : Cambridgeshire Water Company
Sample Description : Marriott Hotel Grosvenor Square
Sample Date : 29 March 2006 Sample Received : 29 March 2006 Analysis Complete : 05 April 2006

Test Description	Result	Units	Limit	Accreditation	Method
Iron, Total as Fe	88	ug/l	200	B	SBC44



Accreditation Codes : * = Not UKAS accredited, B = Analysed at STL Bridgend, C = Analysed at STL Coventry, R = Analysed at STL Runcorn, L = Analysed at STL Midlands, S = Sub-contracted
For Microbiological determinands 0 or ND = Not Detected, DET = Detected, For Legionella ND=Not detected in volume of sample filtered. I/S = Insufficient sample

Signed :  Name : T. Down Date : 06 April 2006
Title : Production Manager

Marriott 4-5(080417)

29 Days After Installation

Certificate of Analysis

Sample 1 Laboratory Number: **345420**
 of 1 Report Number: **BR/338302/2006** Issue 1

Sample Source: **Cambridge Water Company**
 Sample Point Description: **Cambridgeshire Water Company**
 Sample Description: **PETER GOSLING - MARRIOTT HOTEL**

Sample Date: **07 April 2006** Sample Received: **07 April 2006** Analysis Complete: **11 April 2006**



Test Description	Result	Units	Limit	Accreditation	Method
Iron, Total as Fe	53	ug/l	200	B	SBC44

Accreditation Codes: * = Not UKAS accredited, B = Analysed at STL Bridgend, C = Analysed at STL Coventry, R = Analysed at STL Runcorn, L = Analysed at STL Midlands, S = Sub-contracted
 For Microbiological determinands 0 or ND = Not Detected, DET = Detected, For Legionella ND=Not detected in volume of sample filtered. IS = Insufficient sample

Signed: *R. Robins* Name: **R. Robins** Date: **12 April 2006**
 Title: **Senior Chemist**

35 Days After Installation

Certificate of Analysis

Sample 1 Laboratory Number: **353695**
 of 1 Report Number: **BR/339523/2006** Issue 1

Sample Source: **Cambridge Water Company**
 Sample Point Description: **Cambridgeshire Water Company**
 Sample Description: **PETER GOSLING - MARRIOTT HOTEL**

Sample Date: **13 April 2006** Sample Received: **13 April 2006** Analysis Complete: **19 April 2006**

Test Description	Result	Units	Limit	Accreditation	Method
Iron, Total as Fe	32	ug/l	200	B	SBC44

Accreditation Codes: * = Not UKAS accredited, B = Analysed at STL Bridgend, C = Analysed at STL Coventry, R = Analysed at STL Runcorn, L = Analysed at STL Midlands, S = Sub-contracted
 For Microbiological determinands 0 or ND = Not Detected, DET = Detected, For Legionella ND=Not detected in volume of sample filtered. IS = Insufficient sample

Signed: *R. Robins* Name: **R. Robins** Date: **20 April 2006**
 Title: **Senior Chemist**