

THE JOURNAL OF THE CONCRETE REPAIR ASSOCIATION

ISSUE NO. 20

'CONCRETE RENOVATION CLINIC' AT CIVILS 2007



his year's Civils 2007 event, scheduled to take place at Earls Court, London, between November 20th and 22nd will, for the first time, feature three concrete restoration related organisations joining forces to create a new concept entitled 'The Concrete Renovation Clinic'.

The 'Clinic', to be found on Stand Number E15, will be manned by specialists from the Concrete Repair Association (CRA), the Corrosion Prevention Association (CPA) and the Sprayed Concrete Association (SCA).

Throughout the three-day period, each Association will have experienced personnel manning the stand to enable engineers, designers, specifiers, main contractors and specialist consultants to discuss technical/practical matters relating to specific projects, materials and/or problems regarding the repair, reinstatement and refurbishment of concrete.

See you there!

TONY HANSARD ELECTED CRA CHAIRMAN

ony Hansard of Bedfordshire based specialist product manufacturer Weber has been elected Chairman of the UK Concrete Repair Association (CRA).

Previously Deputy Chairman of the Association, he becomes the first manufacturer member to hold the position since the Association's inception.

Tony Hansard is 53 years old and married with three sons. Educated at St. Phillips Grammar School, Edgebaston, Birmingham and thereafter studied at the University of London for a BA in Modern European Studies. He has spent 31 years in the construction industry, the last 22 as National Key Accounts Manager with Weber (formerly SBD). He has been involved with the CRA for the past 10 years, seven of which he has served on the Executive Committee.

He is the thirteenth individual to Chair the Association and assumed the position from Andrew Muirhead of specialist contractor Structural Renovations Ltd, at the Association's recent Annual General Meeting. The post is held for a two-year period. His primary aim, during his two year tenure, is to extend the CRA's influence within the construction industry



The Chairman serves as part of a nine-man CRA Executive Committee, which includes the Deputy Chairman, Dave Burgess of Concrete Repairs Ltd, Vince O'Malley of Renocon Ltd, Tom King of Alfred Bagnall & Sons Ltd, Tim Ellis of Gunite (Eastern) Ltd, Jim Mortlock of Quickseal Specialist Contractors, Brian Dargan of Laser Special Projects Ltd, Charles Ellins of BASF Construction Chemicals and Jonathon Thurlbeck of Remmers (UK) Ltd.

CRA TO EXPLAIN NEW BS EN 1504 AT CIVILS 2007

he new 'British Standards for Concrete Repair' (BS EN 1504) will be the subject of a special presentation by the Concrete Repair Association at this year's Civils 2007 event at Earls Court, London.

Civils 2007 will take place between November 20th and 22nd, with the one hour CRA presentation scheduled to begin at 12.45am on Wednesday 21st, in the Blue Seminar Theatre. There is no delegate fee for the event and interested individuals can either attend at random, or pre-register by emailing: lauren.fairley@cra.org.uk

This is the first time the UK concrete repair industry has had a comprehensive set of standards both for the process of concrete repair and the majority of the products it uses. Now that the

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Investigating an accident

New concrete repair publication

Heritage Renovation

Industry Develop

Industry Developments



CRA TO EXPLAIN NEW BS EN 1504 AT CIVILS 2007

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Standards are in place as BSI publications, the clock is ticking on the introduction of CE marking. Whilst not applicable to the UK (since they have not previously existed) all conflicting standards throughout Europe are to be withdrawn before the end of 2008.

As of January 2009 CE marking will be mandatory in most parts of Europe. Materials intended for export (excepting to Finland, Portugal and Ireland) are to be CE marked. Those intended for UK consumption need not be CE marked, but must comply with the Construction Products Directive (CPD) as a legal requirement. There are six essential requirements that construction products need to satisfy and in simple terms, products are to be demonstrably fit for purpose. In practice this is easily demonstrated by compliance with the British Standard and hence CE marking.

As clients become aware of the standards, they will expect them to be used as the basis of the work to

be carried out. This means that they will want products and specifications that meet the standard and that they will expect manufacturers, engineers, designers, specifiers, contractors and specialist consultants to follow the various parts from design through to site execution of concrete repair works.

The responsibilities of the various players in the concrete repair market will be fully explained by the presentation.

As the industry gains experience of the standards it is almost inevitable that some problems may emerge. The CRA intends to monitor the market to assess how it approaches the new British Standards for Concrete Repair. The Association is represented on the BSI Committee by a manufacturer's representative and a contractor's representative and as such, it is ideally placed to bring evidence of problems to the fore and additionally to put forward appropriate solutions.

PROTECTION AND REPAIR OF CONCRETE



COMPREHENSIVE NEW PUBLICATION ON CONCRETE REPAIR STANDARDS

s is well known, deterioration and premature failure of concrete structures is a major problem.

The new European Standards provide, for the first time, a comprehensive set of standards covering all aspects of protection and repair of concrete. They will affect everyone involved in the repair industry, providing an opportunity and at the same time a challenge to further improve concrete repair practices and adapt to the standards as they come into use.

A new book (January 2008 - 256pp) entitled 'Protection and Repair of Concrete - A practical guide to the European Standards' sets out the basic principles of concrete deterioration and

repair and provides a practical guidance and a comprehensive introduction to the new Standards. Written by Hywel Davies, the UK delegate to the European Standards committee, it also explains the interaction between the standards and the European Construction Products Directive.

'Protection and Repair of Concrete' is a must-have guide for specifiers, designers and repair practitioners across Europe. It will also be relevant in the Pacific Rim and other areas where standards are widely modelled on the European approach.

The new publication (catalogue ID: SPON 43, price: £75.00) can be ordered on-line from the Concrete Society at: www.concretebookshop.com

INVESTIGATING - THE IMPLICAT

In a follow-up to his article in the last issue of Cracking Matters, Paul Verrico of Eversheds LLP, provides an insight as to how best to approach an accident report

very employer, regardless of size, faces the prospect of having to carry out different kinds of investigations. Sometimes these relate to employment issues and may follow an accusation of misconduct; others relate to investigations carried out in the aftermath of a health and safety incident. Let's consider health and safety incidents in the context of you being asked to perform an investigation. As we all know the construction industry carries inherent risks to employees, contractors and 'innocent' third parties. So the principles distilled below may, at some point in the future, be of real use to you.

Companies like Eversheds often get involved with accident investigations following serious injuries, fatalities or environmental calamities; sometimes right from the word go and on other occasions, after the investigation has begun. When misfortune strikes, you will be amazed at the number of stakeholders beating a path to your door. Directors, regulatory inspectors, staff, the press, concerned locals, family members and, possibly, the police may all get involved. The police and regulators will likely be on site to investigate possible criminal offences. The issue for you is how to balance the need to co-operate with the authorities while also protecting your own interests. You may be expected to write an internal investigation report and if you have never written one before, you may be wondering where to start!

A good accident report

- 1. Should be compiled on the instruction of lawyers so that it has legal professional privilege attached
- 2. Should be completed by somebody who does not have a personal stake in the outcome
- 3. Should examine both the immediate causes and the wider underlying factors that led to the incident
- 4. Should be able to refer to witness statements that have been taken as soon as possible after the incident, thus avoiding memory fade
- 5. Should be as factual as possible, avoiding unsubstantiated opinion
- 6. Should make suggestions on actions to improve if something is obviously dangerous, early conclusions should be communicated to those affected immediately
- 7. Should identify any subcontractors, equipment suppliers or other third parties involved in the incident, with contact details where relevant
- 8. Should have a defined circulation list.

CRISIS CONSTRUCTION!



Health and safety at work – overseas style. Whilst a hard hat does not appear compulsory on this site, this worker seems to appreciate the value of some protection!

GANACCIDENT CIONS

When interviewing witnesses, many investigators fall into the trap of using closed questions to try and get a witness to agree with the conclusions the investigator has already formed. This is the wrong approach. A good investigator asks open ended questions. Think about putting Kipling's "6 Faithful Serving Men" to work. You may remember the poem ...

"I keep 6 honest serving men (they taught me all I knew)
Their names are what and why and when and how and where and who"

Asking questions that start with one of those words should hopefully give you sufficient scope to establish what happened. As you ask the questions, make a mental note to assess the credibility of any statements made by the witness.

Once the initial site investigation is completed, you then need to consider background information. RIDDOR reports, health and safety committee minutes, company policies, inspection reports and policies will all be relevant. Try and collate these in a manageable format, indexing documents for use if a later prosecution is brought. Of course, these are just a few practical tips on

managing the investigation process. Every Health & Safety Manager fears the day when all of their training will be tested following a major incident. For many managers, that day will never occur. If it does, stay cool and collected and bear the above in mind as you begin the investigatory process.

NOTE FROM ED.

Eversheds handle around 100 accident investigations every year; everything from near misses to incidents involving multiple fatalities such as Buncefield, Potters Bar and Dreamspace. The company is running a series of courses during the autumn. They will look at the powers of the investigators, practical issues when preparing an internal investigation, witness interviews (the thin line between proofing and interference), dealing with whistleblowers and making recommendations at the end of an investigation report. A 10% discount on the course fees will apply to readers of Cracking Matters. For further information contact paulverrico@eversheds.com or telephone 0845 498 4084. Quote reference PVCM1.

Alternatively, tick ENQUIRY NO: 2001, complete and return the Fax-Back.



Use the enclosed Reader Enquiry form to obtain more information

PROFESSIONAL BUILDING AND INFRASTRUCTURE SURVEY

CRL Surveys, an acknowledged expert in the field of testing, inspection and investigation of buildings and structures, has just updated its brochure describing the company's extensive surveying services.

The company provides a unique and independent service, which not only identifies the defects and dilapidations, but can also prepare costed options for remedial works and where required, tender documents, thus enabling clients to quickly appreciate problems, allocate budgets and issue tenders.

Services include, Condition Assessments, Corrosion investigations, Structural detailing and special investigations, Load testing, Fire and accidental damage assessments at all levels (Full, Statistical, Indicative and Palliative) and applicable to all structural types, including reinforced, in-situ and pre-cast concrete; steel framed, brickwork, masonry and clad structures.

For a copy of the new brochure telephone: 020 8288 4848, or email: mail@concrete-repairs.co.uk

ENQUIRY NO: 2002



PROFESSIONAL HERITAGE REFURBISHMENT

To carefully maintain delicate structures classified as 'Heritage buildings' and to ensure their long-term durability, refurbishment work often demands a sympathetic approach, carried out by experienced tradesmen using traditional materials and methods, such as those provided by specialist main contractor **Concrete Repairs Limited** (CRL).

CRL services includes: Condition surveys, Feasibility studies and trial repairs, Full external façade renovation, Façade cleaning, Concrete repairs to match the existing colour/texture, Masonry/stonework repairs, Precast unit replacement, Protective coatings, Corrosion inhibitors, Cathodic protection systems and Window refurbishment.

To illustrate its specialist renovation services in this sector, CRL has just published a brand new brochure. For a copy telephone: 020 8288 4848, or email: mail@concrete-repairs.co.uk



ENQUIRY NO: 2003

HERITAGE RENOVATION - have the venetians got it right?

Trecently visited Venice for a long weekend - any more and I would have been writing this article from the modern equivalent of Debtors Prison. Certainly when the waiter performs a credit check before serving you with two cappuccini (I got told off for saying cappuccinos), you know that you are in for a financially rough ride.

However, in an attempt to get the distaff-side of the operation, away from the designer outlets, I did book myself and my partner onto a walking tour of the City.

Much of Venice is fighting back against the threat of sinking and this has resulted in a whole industry being developed to service this renovation and restoration sector of the Venetian construction industry.

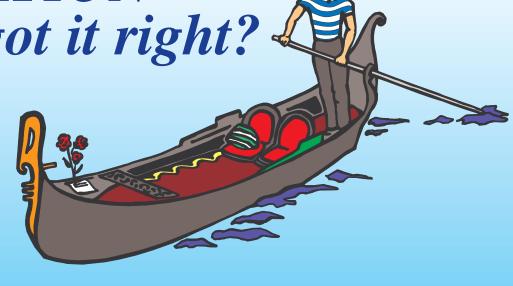
The Italian approach to restoration is very different from ours, with modern materials being used to bring back old buildings to some semblance of their former glory. Certainly, at the back of the library in San Marco's square the red triangle of Sika can be seen peeping out from under a tarpaulin.

Compare and contrast, to coin a phrase, this pragmatic attitude with that of English Heritage. I don't know where Tony Robinson gets those merry souls in bobble hats and big glasses on Time Team from, but they seldom turn up on construction projects. Having spent more than a year waiting for a project to start while English Heritage battles it out with the Health & Safety Executive as to whether safety takes precedence over 'authenticity' in the matter of replacing windows on a tower block, I am somewhat biased.

The point being, as we in the CRA involve ourselves in such things as the 'Concrete Renovation Clinic' at Civils 2007, we should be asking other questions such as "What do you want from this project" and "What is the best way to achieve this?"

We need to argue, as an industry, that renovation and repair should be done as well as possible, using the best technology and techniques available. What matters is the preservation of our heritage. They understand this in Venice and strangely, the same people that demand lime sand mortar in England will actively endorse what is being done in Italy.

Such disingenuousness (I have wanting to use this word for a long time!) has gone unchallenged for far too long with the result that a classic structure, like the West Pier at Brighton, is being further destroyed by the elements, rather than repaired using modern technology.



It's difficult, for all sorts of reasons, to be too strident when an individual company is in contract with a heritage-related organisation, so it's down to the CRA to argue the case for better, more logically based concrete renovation projects.

On the one hand this is a huge market for concrete repairers to tap into. On the other, we all live in this country and it is our heritage that is being 'done up'. We, the professionals, therefore, should have a voice in how it happens.

Note from Ed:

If you would like to respond to this subject, email: initialcontacts@ntlworld.com

On a lighter note ...

Morris, an 82 year-old, went to the doctor for a physical. A few days later the doctor saw him walking down the street with a gorgeous young woman on his arm.

He waved Morris over and said, "You're really doing great, aren't you?" Morris replied, "Just doing what you said Doc - get a hot mamma and be cheerful".

"No, no" replied the doctor. I said you've got a heart murmur; be careful".

Not strictly concrete repair...



... but amusing non-the-less. This picture has been flying around the internet recently. You may have seen it. We believe it has been creatively 'doctored', with some of the bollards cloned and suitably relocated. Any other comments?

HUGE DEMAND FOR ADVICE NOTE

ince the CRA published its Advice Note N0 6 'British Standards for Concrete Repair', the Association has experienced significant demand for copies. To obtain your free copy please complete and return the accompanying Reader Enquiry Form. For further information on the Standards and a full listing of the product standards and test methods, go to the Standards page on the CRA website at www.cra.org.uk



CRA CD-ROM, ROAD SHOWS AND MEMBERS DIRECTORY

Two audio-visual programmes entitled 'The route to a successful concrete repair' and 'Structural strengthening with composites', are included on a CD-ROM. The FREE OF CHARGE disk also includes a 'Word' version of the 'CRA Method of Measurement for concrete repair' document.



The CRA can arrange personalised FREE OF CHARGE CPD Seminars (covering the two audio-visual programmes listed above) in your office and at a time convenient to you, provided a minimum of 4 delegates are able to attend. Each programme is about one hour in duration.

The CRA's informative 62-page Members Directory, also available FREE OF CHARGE, includes information on each Association







DOUBLE WHAMMY FOR CRL

CRA member Concrete Repairs Ltd (CRL) swept the board at this year's 'Construction News' hosted, third annual 'Specialists in Construction Awards. It was a night of celebration as the company won not only the individual 'Concrete' category, but also the 'Special Award for Exceptional Performance', selected from the entire fifty-three companies that reached the finals of this year's event.



The reviewing panel, Chaired by Sir Michael Latham, was full of praise for CRL. When selecting the winner of the 'Special Award for Exceptional Performance', the judges praised the company for its commitment to providing a quality service, its sustained investment in research and for developing its School of Excellence training facility.

Concrete Repairs Ltd. Tel: 020 8288 4848

BROOKLANDS RACE TRACK REPAIR

In April 2007, CRA member Structural Renovations Ltd completed repair works to the Campbell circuit at the world famous Brooklands race track, in Surrey.

Traditional techniques were employed in repairing the now listed track, utilising a mix design similar to that used when it was first constructed in 1907. The track, once famous for Selwyn Edge's non-stop 24 hour driving record, now houses the new Mercedes-Benz World museum.

Structural Renovations Ltd. Tel: 01753 825511



'BENTS' STRAIGHTENED OUT

CRA member Concrete Repairs Ltd (CRL) has completed a complex concrete repair and cathodic protection scheme on the M6 Ray Hall Viaduct; the elevated section of the M6 that crosses the M5 slip road in the West Midlands.

The project included the repair of seven unsupported reinforced concrete crossbeam, panel walls and columns, known as 'bents', which form part of the substructure supporting the longitudinal steel beams and deck slab of the viaduct. Repairs involved hydro demolition preparation, reinstatement using flowable repair concrete, strengthening and the installation of a Cathodic Protection (CP) System.

Because the slip road passes diagonally underneath the M6 bents, all work was completed in phases in order to keep the M5 open.

Concrete Repairs Ltd. Tel: 020 8288 4848



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