

**BRIDGE OWNERS' FORUM
17 JANUARY 2006**

**THE CODE OF PRACTICE FOR THE MANAGEMENT OF HIGHWAY
STRUCTURES AND RESEARCH OPPORTUNITIES**

The Code of Practice for the Management of Highway Structures (the Code) was launched in September 2005. It was the first comprehensive document to deal with bridge management issues to be published in the UK.

The Code contains 80 recommendations to enhance the management of highway structures. The Code recognises that it will not be possible to action all of these recommendations simultaneously. Consequently, the Code has divided the recommendations into three milestones as follows:

Milestone	Number of Recommendations	Category	Implementation Date
One	31	Safe for Use	March 2006
Two	32	Fitness for Purpose	March 2007
Three	17	Good Management Practice	March 2008 to March 2010

The County Surveyors Society is currently reviewing progress on the implementation of the Code. The Code itself recommends that users score each recommendation on a scale of 1 to 5 (1 poor to 5 very good). The average scores for one authority are as follows:

Milestone	Rating Range	Number of Ratings (2 or less)	Average Rating
One	3 to 5	None	4.09
Two	2 to 5	10	3.21
Three	1 to 5	7	2.94

The results in the table are to be expected. The more advanced milestones have lower average ratings. This authority is not yet in a position where they can say that, in accordance with the recommendations of the Code, they have a ***Safe for Use*** management system. There is also significant work required to achieve a ***Fitness for Purpose*** management system. Further analysis of the ratings is given in the following table.

Typical quotations from the CSS survey from other authorities are as follows:

‘We comply with Milestone One, with only a few gaps left to be filled. We partially comply with Milestone Two. We do not comply with Milestone Three’.

‘We are just completing our first attempt at a transportation asset management plan, and we will now begin to look at the areas where we have gaps in our data and management systems e.g. valuation, prediction models, whole life costing and some aspects of performance monitoring.’

Average Ratings for Sections of the Code (one authority)

Section	Topic	M'stone One	M'stone Two	M'stone Three
2	Management Context	4.12	3.3	3.67
3	Asset Management Planning	5	3	2
4	Financial Planning and Resource Accounting	4	4	3
5	Maintenance Planning and Management	4.2	2.71	2.75
6	Inspection, Testing and Monitoring	4	4.75	4
7	Assessment of Structures	3	3.33	4
8	Management of Abnormal Loads	4	2	2
9	Asset Information Management	4.17	2.5	3
10	Framework for a Bridge Management System	5	2	1

A decision support tool to help with the development of Bridge Management Systems is already being promoted. The development of the ESDAL system will assist with the management of abnormal loads. The engineering processes (Sections 6 and 7) are well established and implementation is resource dependent.

Therefore, the three sections that would currently benefit from further research are:

3. Asset Management Planning
4. Financial Planning and Resource Accounting
5. Maintenance Planning and Management

In particular, the following topics should be considered for further research and guidance:

- Lifecycle planning
- Depreciation curves
- Whole life costing
- Asset management planning

The review of the implementation of the Code is not yet complete. Therefore, the conclusions of this paper are only indicative at this stage. However, future research topics are unlikely to depart significantly from the list given above. A more detailed analysis of each of these topics will be brought back to a subsequent meeting of the Bridge Owners' Forum.

Graham Cole
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