

NOTES TO SPECIFICATIONS FOR QUALITY ASSURANCE FOR CHIPSEALING AND HOT MIX ASPHALT

These notes are for the guidance of Transit New Zealand's staff and consultants, and must not be included in the contract documents

1. SCOPE

Transit New Zealand's quality assurance requirements are to be applied to all contracts which include surfacings work which are let after 1 July 1995 either by TNZ or local authorities that control state highways under agreement. TNZ Specifications Q/1 and Q/2 should be included in any future contract documents for this work.

Surfacings work is defined as including all reseals, first and second coat seals, and bituminous mixes. Contracts for pavement construction, shape correction, rehabilitation and seal widening will require evidence from tenderers of certification which covers the surfacing component. Activities carried out under general maintenance, eg sealing of patches, are excluded.

2. APPLICATION OF REQUIREMENTS

Evidence of certification will be required before tenders are accepted.

Compliance with the Specifications Q/1 or Q/2 is expected to be demonstrated either by reference within the system certification document itself, or by an additional scoping statement issued by the JAS-ANZ accredited agency for those suppliers who already hold NZS ISO 9002 certification. However, since TNZ only wishes to apply the quality assurance requirements to state highway contracts, contractors are at liberty to use the element Contract Review in their quality manuals to clarify that compliance with the technical requirements of Specifications Q/1 and Q/2 is only required by TNZ for state highway work.

3. TECHNICAL REQUIREMENTS

The technical requirements of the Specifications Q/1 and Q/2 have been prepared to define the key technical processes which must be addressed by the supplier **within the system itself**, and documented in the supplier's quality manual. The ISO 9000 Standards make provision for such specified requirements to be included by the customer.

The purpose of the technical requirements is to provide the client with confidence that the supplier is able to control the surfacings process adequately. The supplier is required to demonstrate to the systems auditor that the system includes a procedure for setting the limits for controlling the processes, and for ensuring that the supplier's own specified output requirements are being achieved.

4. AUDITING THE QUALITY SYSTEM

Auditing of the quality system will be carried out by the JAS-ANZ accredited agency. A Quality System Audit is performed in accordance with ISO 10011.1:1990.

The auditor will perform the system audit of the contractor's quality system for compliance with NZS ISO 9002 or TQS1. The auditor will also assess the system against the TNZ Specifications Q/1 and Q/2.

The JAS-ANZ accredited auditors are expected to include auditing of the element Contract Review and compliance with Specifications Q/1 and Q/2 at all review visits of surfacings contractors.

5. THE CONTRACT QUALITY PLAN

This is a contract specific requirement which will be requested by TNZ's consultant from the successful tenderer following award of the contract. The contract period should generally allow two weeks before permanent work must commence for production of the contract quality plan. The plan sets out the practices, resources and sequence of activities which are relevant to the contract, in accordance with the specified requirements of the contract documents.

5.1 General Requirements

Examples include: contractor's personnel, traffic control, construction plans, inspection and checklist procedures, records, and the like. In this respect the requirements are as per any contract quality plan for physical works. An example which sets out TNZ's minimum requirements can be found in Appendix C of TNZ Quality Standard TQS1:1994.

5.2 Technical Requirements for Surfacing

These require the supplier to address matters relating to surfacings. These will include: Testing and inspection frequency, acceptance criteria, and the like.

Until contractors gain experience in QA, the majority are expected to have standard inspection and testing frequencies for the finished product, based on the guidelines produced recently by the Bitumen Contractors Association.

6. THE ROLE OF THE CONSULTANT

To be effective the role of the consultant should complement the role of the JAS-ANZ accredited auditor rather than overlap to any great extent.

The management processes and key technical requirements, as specified in Q/1 and Q/2, are inspected by the JAS-ANZ accredited auditor. It should not be necessary for the consultant to re-examine the same areas of the contractor's business except on a very occasional basis or unless evidence of non-compliance within these areas become evident.

The consultant should examine the quality plan when it is presented, to assess its compliance with the contract specification and technical requirements, and issue a formal acceptance to permit work to commence. The consultant should not generally approve or endorse the plan. During the work stages the consultant should perform a technical audit of the supplier's performance against the accepted quality plan.

The consultant's role is expected to include quality surveillance (as per NZS 5604), rather than mere observation. The presence of the consultant during key operations (eg commencement of site sealing) is anticipated by TNZ. In the event of a significant non-conformance by the contractor, the consultant is expected to check that corrective action has been taken.

It would seem likely that under QA there will be some initial overlap between the two audit processes and the work areas of the two auditors. The JAS-ANZ accredited agencies will need to visit contracts which are in progress as part of the quality audit; whilst consultants will feel obliged to examine aspects of the contractor's quality system on an occasional basis. Only with time and confidence in quality assurance will this settle down to the point where the two parties are acting in a complementary manner.