



Bonneagar Iompair Éireann
Transport Infrastructure Ireland

TII Publications



Method of Measurement for Road Works Series MM 200 - Site Clearance

CC-RMP-00200
December 2010

About TII

Transport Infrastructure Ireland (TII) is responsible for managing and improving the country's national road and light rail networks.

About TII Publications

TII maintains an online suite of technical publications, which is managed through the TII Publications website. The contents of TII Publications is clearly split into 'Standards' and 'Technical' documentation. All documentation for implementation on TII schemes is collectively referred to as TII Publications (Standards), and all other documentation within the system is collectively referred to as TII Publications (Technical). This system replaces the NRA Design Manual for Roads and Bridges (NRA DMRB) and the NRA Manual of Contract Documents for Road Works (NRA MCDRW).

Document Attributes

Each document within TII Publications has a range of attributes associated with it, which allows for efficient access and retrieval of the document from the website. These attributes are also contained on the inside cover of each current document, for reference. For migration of documents from the NRA and RPA to the new system, each current document was assigned with new outer front and rear covers. Apart from the covers, and inside cover pages, the documents contain the same information as previously within the NRA or RPA systems, including historical references such as those contained within NRA DMRB and NRA MCDRW.

Document Attributes

TII Publication Title	<i>Method of Measurement for Road Works Series MM 200 - Site Clearance</i>
TII Publication Number	<i>CC-RMP-00200</i>

Activity	<i>Construction & Commissioning (CC)</i>
Stream	<i>Requirements for Measuring and Pricing (RMP)</i>
Document Number	<i>00200</i>

Document Set	<i>Standards</i>
Publication Date	<i>December 2010</i>
Historical Reference	<i>Series MM 200</i>

NRA DMRB and MCDRW References

For all documents that existed within the NRA DMRB or the NRA MCDRW prior to the launch of TII Publications, the NRA document reference used previously is listed above under 'historical reference'. The TII Publication Number also shown above now supersedes this historical reference. All historical references within this document are deemed to be replaced by the TII Publication Number. For the equivalent TII Publication Number for all other historical references contained within this document, please refer to the TII Publications website.

Series 200: Site Clearance

- 1 Unless otherwise stated in the Contract the items in this Series shall include for the removal of superficial obstructions down to existing ground level. With the exception of items measured under paragraph 7 and those including for the removal of stumps and roots, work below existing ground level in the demolition and removal of foundations, drains and sewers specified in Appendix 2/2, chambers, cellars, ground slabs, carriageways, kerbs, pavings, backfilling and the like shall be measured under Series 600: Earthworks. Lowering of carriageway levels shall be measured under Series 700: Pavements.

The measurement of General Site Clearance includes for the removal of superficial obstructions down to existing ground level. If no General Site Clearance item is measured and the contract requires items to be taken to Tip, these shall be measured within paragraphs 8-11 Take Up or Down and Set Aside or Re-use or Remove to Store or Tip off Site.

Site Clearance

Units

- 2 The units of measurement shall be:
- (i) general site clearance hectare.
 - (ii) demolition of individual or groups of buildings or structures item.
 - (iii) partial demolition of individual structures.....item.

Measurement

- 3 The measurement of general site clearance shall be the plan area. No deduction shall be made for buildings, structures, carriageways and the like.

Itemisation

- 4 Separate items shall be provided for site clearance in accordance with Chapter II paragraphs 3 and 4 and the following:

Group	Feature
I	1 General site clearance
	2 General site clearance of separate sections
	3 Demolition of individual or groups of buildings or structures
	4 Partial demolition of individual structures.

General Site Clearance

Item Coverage

- 5 The items for general site clearance shall in accordance with the Preambles to Bill of Quantities General Directions include for:
- (a) demolition, breaking up and removal;
 - (b) tree felling;
 - (c) grubbing up and blasting stumps and roots including backfilling and compaction;
 - (d) uprooting of bushes, small trees and hedges;

- (e) credit value of materials;
- (f) disposal of material (as Series 600);
- (g) making good severed ends of existing fences, hedges and walls;
- (h) branch lopping;
- (i) disconnecting, removing and sealing services and supplies;
- (j) reinstatement and making good;
- (k) preservation of individual or groups of trees, shrubs and the like;
- (l) treatment of hazardous materials.
- (m) temporary fencing
- (n) marking of trees
- (o) services of an arboriculturist

**Demolition of Individual
or Groups of Buildings
or Structures**

6 The items for demolition of individual or groups of buildings or structures shall in accordance with the Preambles to Bill of Quantities General Directions include for:

Item Coverage

- (a) blasting, breaking up and removal;
- (b) credit value of materials;
- (c) disposal of material (as Series 600 paragraph 39);
- (d) disconnecting, removing and sealing services and supplies.
- (e) treatment of hazardous materials.

**Partial Demolition of
Individual Structures**

7 The items for partial demolition of individual structures shall in accordance with the Preambles to Bill of Quantities General Directions include for:

Item coverage

- (a) demolition of individual or groups of buildings or structures (as this Series paragraph 6);
- (b) cutting and trimming;
- (c) saw cutting;
- (d) cutting through reinforcement, removal, disposal, protecting cut ends with treatment, de-bonding existing reinforcement;
- (e) working between and behind reinforcement and other obstructions;
- (f) marking of surfaces;
- (g) preparation to receive new works;
- (h) measures in respect of specialist demolition techniques;
- (i) protection of unaffected parts of the structure.

**Take Up or Down and Set Aside for Reuse or Remove to Store or Tip
off Site**

8 The units of measurement shall be:

Take up or down and set aside for reuse or remove to store or tipoff Site the following:

- (i) blockwork and stonework cubic metre.
- (ii) paved areas and the like, brickwork square metre.
- (iii) kerbs, channels, edgings, combined drainage and kerb blocks, linear drainage channel systems, fencing, safety barriers , vehicle parapets, transitions, terminals, pedestrian guardrails and pedestrian parapets and the like, copings, string courses and the like linear metre.
- (iv) cable linear metre.
- (v) road lighting columns, brackets and wall mountings, traffic signs, reflecting road studs, gates, stiles, street furniture, feeder pillars, communications cabinets, posts, brackets, signal indicators, shelves, racking, frames, electronic units and the like number.
- (vi) chamber covers and frames, gully gratings and frames and the like number.
- (vii) individual blocks, features or stones number.

Measurement

- 9** The measurement for take up or down and set aside for reuse or remove to store or tip off Site of blockwork, stonework, paved areas and the like, brickwork, kerbs, channels, edgings, combined drainage and kerb blocks, linear drainage channel systems, fencing, safety barriers , vehicle parapets, transitions, terminals, pedestrian guardrails and pedestrian parapets and the like, copings, string courses and the like, cable, road lighting columns, brackets and wall mountings, traffic signs, reflecting road studs, gates, stiles, street furniture and the like; feeder pillars, communications cabinets, posts, brackets, signal indicators, shelves, racking, frames, electronic units and the like; chamber covers and frames, gully gratings and frames and the like; individual blocks, features or stones shall be the volumes, areas, lengths or numbers stated in the Contract.

Itemisation

- 10** Separate items shall be provided for take up or down and set aside for reuse or remove to store off Site in accordance with Chapter II paragraphs 3 and 4 and the following:

Group	Feature
I	1 Take up or down and set aside for reuse
	2 Take up or down and remove to store off Site
	3 Take up or down and remove to tip off Site.
II	1 Blockwork and stonework
	2 Paved areas and the like
	3 Brickwork
	4 Kerbs, channels, edgings, combined drainage and kerb blocks, linear drainage channel systems, fencing, safety barriers vehicle parapets, transitions, terminals, pedestrian guardrails and pedestrian parapets and the like
	5 Copings, string courses and the like
	6 Cable

	7	Road lighting columns, brackets and wall mountings, traffic signs, gates, stiles, street furniture, reflecting road studs and the like
	8	Feeder Pillars, Communications cabinets, posts, brackets, signal indicators and the like
	9	Shelves, racking, frames and the like
	10	Electronic units and the like
	11	Chamber covers and frames, gully gratings and frames and the like
	12	Individual blocks, features or stones
III	1	Different types and sizes
IV	1	Different arrangements

Take Up or Down and Set Aside for Reuse or Remove to Store Off Site

Item Coverage

- 11 The items for take up or down and set aside for reuse or remove to store off Site shall in accordance with the Preambles to Bill of Quantities General Directions include for
- (a) excavation of acceptable material (as Series 600);
 - (b) excavation of unacceptable material (as Series 600);
 - (c) excavation in Hard Material (as Series 600);
 - (d) breaking up foundations;
 - (e) detensioning, dismantling and extracting posts;
 - (f) cleaning, stacking, protecting and labelling;
 - (g) transport and handling;
 - (h) disconnecting, removing, disposing of and sealing of services and supplies;
 - (i) sand and warning tape to cables where one or more are to remain in a shared trench;
 - (j) backfilling and compaction;
 - (k) making good to severed ends of existing walls, hedges and fencing;
 - (l) disposal of material (as Series 600);
 - (m) reinstatement and making good;
 - (n) storage facilities;
 - (o) replacing items damaged during the foregoing operations.
 - (p) multiple handling of materials.
 - (q) treatment of hazardous materials.



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