Hot Mix Asphalt

**Hayden Brett**

Created Tue, 16 Jan 2024, 3:47 PM (UTC+11)

**Subcontractor( if applicable)**

**ITP Details:**

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| **Client** | **Construction Process** | **Contract Number:** | **Speciﬁcations** | **Structure / Component** | **Prepared By** | **Approved By** |
| *Regional Roads Victoria* | **Hot Mix Aspahlt** |  | VicRoads Sections 407 Hot Mix Asphalt (2014) & AS2150 (2005) Hot Mix  Asphalt – A Guide to Good Practice | *Asphalt Pavements* |  |  |

**Project Location Lot no.**

**Lot Details**

**Lot size/qtys**

**Date** Start: - End: -

**Asphalt Layer**

**Text Legend:**





1. **Preliminary Works**

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| **Task/Activity Description** | **Acceptance Criteria** | **Reference Document s** | **Method & Record of conformity** | **Signature 1** | **Photos** | **Comments** |
| **1.1** Site Inspection and Base Conditions  **Frequency** | Surface on which asphalt is to be placed is essentially dry and free from surface water.  All manhole and valve covers have been raised or lowered to the new  surface level of the pavement. | Vicroads std sec 407.14  AS2150 10.1 | **Responsibility:**  WP - Site supervisor  **Method**: Visual Inspection |  |  |  |
| Prior to commencing paving. |  |  | **Record**: Signed ITP |

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| **1.2** Ambient Conditions for Asphalt Placement | Asphalt shall not be placed if the majority of the surface area is below: | Vicroads std sec 407.13 | **Responsibility:**  IP - Project Engineer/Site supervisor |  |  |  |
| **Frequency**  Prior to commencing paving. | Base & Intermediate Courses: 5°C for conventional binders or 10°C for PMBs & Class 600 |  | **Method**: Calibrated thermometer |
|  |  |  | **Record**: Signed ITP |
|  | Wearing Courses: 10°C for conventional binders or 15°C for PMBs. |  |  |
| **1.3** Surface Preparation  **Frequency** | The area to be paved is free of all loose and deleterious material | Vicroads std sec 407.14, | **Responsibility:**  WP - Project Engineer/Site Supervisor |  |  |  |
| Prior to commencing paving. |  | AS2150 10.3 | **Method**: Sweep Clean and Inspect |
|  |  |  | **Record**: Signed ITP |

1. **Construction works**

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| **Task/Activity Description** | **Acceptance Criteria** | **Reference Document s** | **Inspection method & Record of conformity** | **Signature 1** | **Photos** | **Comments** |
| **2.1** Application of Tack Coat  **Frequency**:Prior to commencing paving | Tack coat to be sprayed in a uniform ﬁlm over the surface area at a rate of 0.15-0.30 L/m2 of residual binder (60% bitumen). This rate is to be doubled on joints and chases. Tack coat must be allowed to turn from brown to black before paving. NOTE: Tack coat is not required on clean, freshly placed asphalt or primed surfaces or when the layer to be placed exceeds 50mm unless directed by the Client | Vicroads std sec 407.15  AS2150 11 | **Responsibility:**  WP - Project Engineer/Site Supervisor  **Method**: Visual Inspection & photo evidence  **Record**: Signed ITP/Spray Record |  |  |  |
| **2.2** Planned Joints  **Frequency**:Prior to commencing paving | A site speciﬁc paving plan shall be generated by the contractor prior to asphalt commencement to adhere to the following: Transverse Joints: Oﬀset from layer to layer by at least 2m Longitudinal Joints: Oﬀset from layer to layer by at least 150mm and be within 300mm of the lane line or centre of lane. Wearing course shall be on lane lines. Where new pavement abuts an existing pavement, the existing pavement shall be removed in steps to achieve an oﬀset from layer to layer of not less than 150mm. | Vicroads std sec  407.17 (b)  & (c) | **Responsibility:**  WP - Project Engineer/Site Supervisor  **Method**: Measure and mark out runs and submit Paving Plan to Client if requested  **Record**: Signed ITP/Job Sheet |  |  |  |

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| **2.3** Commencement of Placing  **Frequency**:Prior to commencing Paving | The placement of asphalt on the sub- base or granular base for a new pavement or for an overlay of an existing bituminous surfaced pavement shall not commence until the consent to proceed is obtained from the Vicroads Superintendent. | VcRoads Std Specs 407.18 | **Responsibility:** HP - SWA Project Engineer  **Method**:  Visual Inspection  **Record**: Signed ITP |  |  |  |
| **2.4** Delivery of Mix  **Frequency**:Each Load | Asphalt is not segregated, binder is not separated or does not contain uncoated particles and the temperature from mixing plant is not more than 175°C. | VcRoads Std Specs 407.16  Table 407.081 | **Responsibility:**  WP - Project Engineer/Site Supervisor  **Method**: Visual Inspection & Delivery Docket  **Record**: Signed ITP & Production Dockets |  |  |  |
| **2.5** Traceability  **Frequency**:Each Load | Ability to locate asphalt test results placed in three dimensions i.e. start/end chainage, oﬀset/lane and layer | Fulton Hogan Quality Plan | **Responsibility:**  IP - Project Engineer/Site Supervisor  **Method**: Measure and Record on Daily Lot Record  **Record**: Signed ITP & Traceability |  |  |  |

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| **2.6** Layer Thickness and Level Control  **Frequency**:Regularly during paving | Thickness of asphalt layer conforms to asphalt thickness on drawings or speciﬁcations | VcRoads Std Specs 407.20 | **Responsibility:**  WP - Project Engineer/Site Supervisor  **Method**: Dips, string line, measurements oﬀ kerb  **Record**: Signed ITP & Traceability |  |  |  |
| **2.7** Paver Stoppages  **Frequency**:If paver stops | A transverse joint shall be constructed if the asphalt in front of the screed cools to below 120°C  Asphalt should be ramped down by constructing a temporary wedge of dense graded or cold mixed asphalt. Max ramp grade:  40km/h – 20-1  60km/h – 30-1  80km/h – 40-1  >80km/h – 50-1 | VcRoads Std Specs  407.20 (c) | **Responsibility:**  WP - Project Engineer/Site Supervisor  **Method**: Thermometer  **Record**: Signed ITP & Traceability |  |  |  |

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| **2.8** Surface Finish of Wearing Course  **Frequency**:During paving and after ﬁnal roll | The ﬁnished surface of asphalt wearing course shall be of uniform appearance, free of dragged areas, cracks, open textured patches and roller marks | VcRoads Std Specs  407.23 (a)  (i) | **Responsibility:**  WP - Project Engineer/Site Supervisor  **Method**: Visual Inspection  **Record**: Signed ITP & Traceability |  |  |  |
| **2.9** Kerb and Channel  **Frequency**:During paving and after ﬁnal roll | The edge of the wearing course shall be either ﬂush with or not more than 5 mm above the lip of the channel unless otherwise speciﬁed | VcRoads Std Specs  407.23 (a)  (ii) | **Responsibility:**  WP - Project Engineer/Site Supervisor  **Method**: Visual Inspection & Measurement  **Record**: Signed ITP & Traceability |  |  |  |

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| **Task/Activity Description** | **Acceptance Criteria** | **Reference Document s** | **Inspection method & Record of conformity** | **Signature 1** | **Photos** | **Comments** |
| **2.10** Alignment of layers not placed against concrete edge  **Frequency**:During paving and at completion of work | The edge of asphalt layers shall not be more than 50mm inside nor more than 100mm outside, the designed oﬀset from centreline or design line.  The rate of change of oﬀset of the edge of layer shall not be greater than 25mm in 10m | VcRoads Std Specs  407.23 (a)  (iv) | **Responsibility:**  SCP - Client Surveyor, Project Engineer, Site Supervisor  **Method**: Alignment as marked by Surveyor and measured  **Record**: Survey Report |  |  |  |
| **2.11** Width of layers not placed against concrete edge  **Frequency**:During paving and at completion of work | The width of asphalt layers shall not be less than the design or speciﬁed width of layer by more than 50mm or greater than the design or speciﬁed width by more than 100mm. | VcRoads Std Specs  407.23 (a)  (v) | **Responsibility:**  IP - Project Engineer/Site Supervisor  **Method**: Measurement  **Record**: Survey Report |  |  |  |

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| **2.12** Traﬃcking of Asphalt & Paving of multiple layers  **Frequency: During** paving and at completion of work | Traﬃcking of asphalt or placement of asphalt over freshly laid asphalt layer is not permitted unless the majority of the asphalt has a surface temperature lower than 50°C | VcRoads Std Specs  407.23 (a)  (v) | **Responsibility:**  IP - Project Engineer/Site Supervisor  **Method**: Measurement or suﬃcient time has lapsed  **Record**: This ITP |  |  |  |

1. **Testing Requirements**

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| **Task/Activity Description** | **Acceptance Criteria** | **Reference Document s** | **Inspection method & Record of conformity** | **Signature 1** | **Reports** | **Photos** | **Comments** |
| **3.1** Compaction  **Frequency**:Per Lot (6 shot test) | For layers <50mm, if characteristic density ratio is:  95.0% or greater Accept lot | Vicroads std sec Table 407.221 | **Responsibility:**  TP - Fulton Hogan Laboratory Technician Veriﬁed by Project  Engineer |  |  |  |  |
|  | 94.9% to 93.0% Lot may be accepted at reduced rate |  | **Method**: Compaction Testing |
|  | 92.9% or less Remove and replace asphalt |  | **Record**: Asphalt Field Compaction Report |
|  | For layers ≥50mm, if characteristic thickness is: |  |  |
|  | 96.0% or greater Accept lot |  |  |
|  | 95.0% to 94.0% Lot may be accepted at reduced rate. |  |  |
|  | 93.9% or less Remove and replace asphalt |  |  |
| **3.2** Surface Levels  **Frequency**:Each lot as required | Individual departures from design not to exceed ±5mm with a standard deviation of no greater than 8mm (Scale A) | Vicroads std sec Table 407.222 | **Responsibility:**  SCP - External Surveyor Project Engineer to verify |  |  |  |  |
|  |  |  | **Method**: Survey |
|  |  |  | **Record**: Signed ITP & Survey Reports |

**Final Notes: Photo and video**

**Final Inspection:**

The signature below veriﬁes that this ITP has been completed in accordance with the Fulton Hogan’s Quality system Procedures and veriﬁes lot compliance with speciﬁcations.

**Project Team signature** -

**Photo and video**

**Final Inspection:**

The signature below veriﬁes that this ITP has been completed in accordance with the Fulton Hogan’s Quality system Procedures and veriﬁes lot compliance with speciﬁcations.

**Project Engineer Signature** -