



GARIS PANDUAN

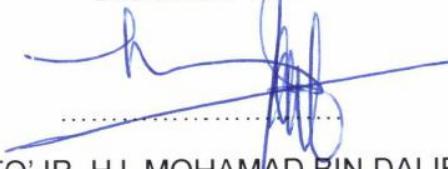
KELULUSAN JENIS KENDERAAN

(PINDAAN) 2015

DISEDIAKAN OLEH:

BAHAGIAN KEJURUTERAAN AUTOMOTIF
JABATAN PENGANGKUTAN JALAN

Diluluskan oleh:



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PENGARAH

BAHAGIAN KEJURUTERAAN AUTOMOTIF, JPJ

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1. PENGENALAN

Perkembangan teknologi automotif global menyaksikan pelbagai inovasi terbaru diperkenalkan oleh pengeluar-pengeluar kenderaan dalam usaha untuk menguasai pasaran automotif serantau. Inovasi ini juga bertujuan bagi mempertingkatkan tahap keselamatan dan prestasi kenderaan ke aras yang lebih tinggi.

Seiring dengan perkembangan tersebut, badan-badan organisasi antarabangsa bergiat aktif dalam memperkenalkan standard bagi memastikan kualiti produk automotif yang dihasilkan adalah memenuhi piawaian antarabangsa. Standard ini menjadi rujukan bagi negara-negara maju dan juga yang membangun bagi menentukan hala tuju industri automotif negara mereka.

Malaysia juga tidak ketinggalan dalam pembangunan industri automotif. Selaras dengan Dasar Automotif Nasional, pihak kerajaan menganggotai pertubuhan antarabangsa yang dikenali sebagai *World Forum for Harmonization of Vehicle Regulations* (WP29). Ahli kepada pertubuhan ini bertanggungjawab untuk mengadaptasi peraturan *United Nations* (UN) sebagai penanda aras bagi tahap kualiti produk automotif yang dipasarkan.

Di Malaysia, peraturan UN ini diwartakan secara berperingkat ke dalam Kaedah Kaedah Pengangkutan Jalan dan juga kepada Kaedah-Kaedah lain yang berkaitan. Peraturan ini dilaksanakan melalui proses Kelulusan Jenis Kenderaan (VTA) oleh Bahagian Kejuruteraan Automotif, Jabatan Pengangkutan Jalan Ibu Pejabat.

Proses Kelulusan Jenis Kenderaan (VTA) adalah satu proses yang dijalankan kepada semua model baru kenderaan sebelum proses pendaftaran dibenarkan. Proses ini diperkenalkan bagi mengawal identiti, dimensi, berat, ciri-ciri pembinaan dan spesifikasi sesebuah kenderaan agar menepati semua spesifikasi yang telah ditetapkan di bawah Akta Pengangkutan Jalan 1987 dan Kaedah-Kaedah Pengangkutan Jalan.



Bagi memastikan proses ini berjalan secara telus dan lancar, jawatankuasa yang dikenali sebagai Jawatankuasa *National Committee for Type Approval (VTA) and Homologation* telah ditubuhkan bagi menilai setiap permohonan Kelulusan Jenis Kenderaan yang dibuat bagi memastikan setiap aspek kenderaan tersebut adalah selaras dengan peraturan semasa yang ditetapkan. Jawatankuasa ini dipengerusikan oleh Ketua Pengarah Pengangkutan Jalan Malaysia dan dianggotai oleh pelbagai agensi kerajaan dan swasta yang berkaitan seperti berikut:

1. Kementerian Pengangkutan (MOT)
2. Kementerian Perdagangan Antarabangsa dan Industri (MITI)
3. Kementerian Perdagangan dalam Negeri, Koperasi dan Kepenggunaan (KPDNKK)
4. Suruhanjaya Pengangkutan Awam Darat (SPAD)
5. Jabatan Pengangkutan Jalan (JPJ)
6. Jabatan Alam Sekitar (JAS)
7. Jabatan Kastam Di Raja Malaysia (KASTAM)
8. Jabatan Standard Malaysia (DSM)
9. Jabatan Keselamatan dan Kesihatan Pekerjaan (DOSH)
10. *Malaysian Institute of Road Safety Research (MIROS)*
11. *Malaysian Automotive Institute (MAI)*
12. *Standards and Industrial Research Institute of Malaysia (SIRIM)*
13. Pusat Pemeriksaan Kenderaan Berkomputer (PUSPAKOM)

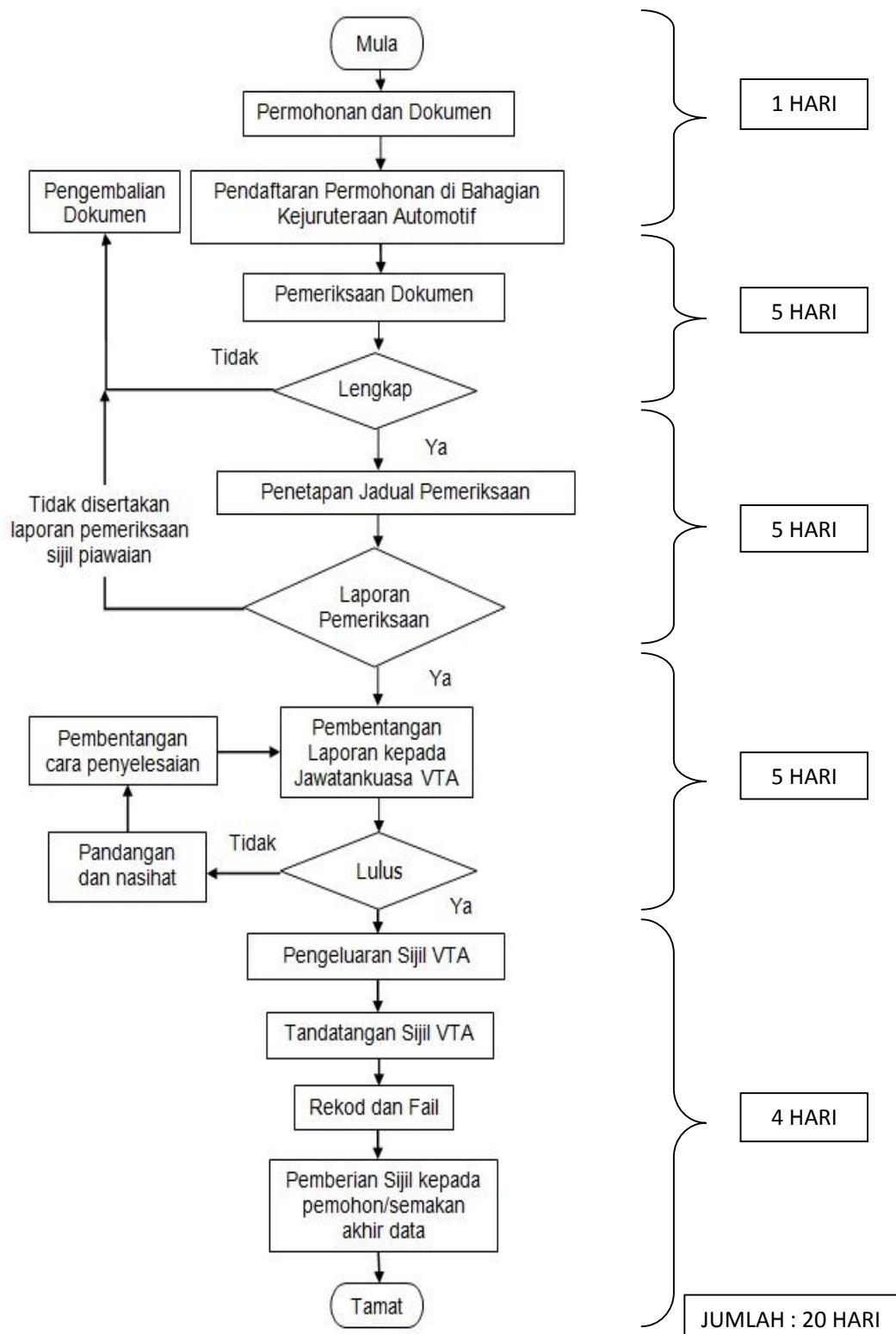


2. RUJUKAN UNDANG-UNDANG

- (i) Akta Pengangkutan Jalan 1987
 - a) Seksyen 10
 - b) Seksyen 12
 - c) Seksyen 66 (1) (*pp*)
- (ii) Kaedah-kaedah Kenderaan Motor (Pembinaan Dan Penggunaan) 1959
 - a) Kaedah 9A , 9B
- (iii) Kaedah-Kaedah Kenderaan Motor (Pembinaan Dan Penggunaan)
(Kenderaan Yang Membawa Hasil Petroleum) 1965
- (iv) Kaedah-Kaedah Kenderaan Motor (Tali Pinggang Keledar) 1978
- (v) Kaedah-Kaedah Kenderaan Motor (Pembinaan, Kelengkapan Dan Penggunaan)(Penggunaan Sistem Bahan Api Gas Petroleum Cair dalam Kenderaan Motor) 1982
- (vi) Kaedah-Kaedah Kenderaan Motor (Larangan Mengenai Jenis-Jenis Kaca Tentu) 1991.



3. CARTA ALIR PERMOHONAN





4. PANDUAN PERMOHONAN

4.1 Borang permohonan

(i) Setiap borang permohonan yang dikemukakan hendaklah mengandungi maklumat-maklumat seperti berikut :

1. Senarai semak permohonan – **LAMPIRAN 1**
2. Surat rasmi permohonan Kelulusan Jenis Kenderaan daripada pemohon – **LAMPIRAN 2**
3. Jadual I (*Schedule I*) – **LAMPIRAN 3 -7** seperti di para (ii)
4. Jadual II (*Schedule II*) – **LAMPIRAN 8**
5. Gambar kenderaan (pandangan hadapan, sisi dan belakang kenderaan) – **LAMPIRAN 9**
6. Penjelasan mengenai nombor casis (*Vehicle Identification Number*) dan nombor enjin kenderaan – **LAMPIRAN 10**
7. Sijil-sijil pematuhan dan laporan ujian (*test report*) bagi setiap perkara dalam Jadual I (*Schedule I*) – **LAMPIRAN 11**
8. Katalog / Brochure / Spesifikasi Teknikal (*Slide Presentation*) – **LAMPIRAN 12**
9. Surat Deklarasi Pemohon – **LAMPIRAN 13**
10. Borang Maklumat Sijil VTA – **LAMPIRAN 14**
11. Lukisan kejuruteraan yang menunjukkan dimensi keseluruhan kenderaan – **LAMPIRAN 15**
12. Salinan AP atau Laporan Kastam bagi kenderaan CBU – **LAMPIRAN 16**

(ii) Jadual I (*Schedule I*) yang perlu disertakan dalam dokumen permohonan adalah berbeza bergantung kepada jenis kenderaan seperti berikut :

1. Jadual I (*Schedule I*) bagi kategori L (Motosikal) – **LAMPIRAN 3**
2. Jadual I (*Schedule I*) bagi kategori M (Kenderaan Penumpang) – **LAMPIRAN 4**



3. Jadual I (*Schedule I*) bagi kategori G/N (Offroad/Kenderaan Perdagangan) – **LAMPIRAN 5**
 4. Jadual I (*Schedule I*) bagi kategori O (Treler/Semi Treler) – **LAMPIRAN 6**
 5. Jadual I (*Schedule I*) bagi kategori Kenderaan *Rebuilt* – **LAMPIRAN 7**
-
- (iii) Pemohon (syarikat) perlu mengisyihar pegawai yang layak untuk menandatangani dokumen permohonan sebagai wakil pihak syarikat seperti di **LAMPIRAN 17** ;
 - (iv) Semua permohonan hendaklah dihantar dalam bentuk *portfolio* sebanyak 2 salinan. Format *portfolio* ditentukan oleh Pegawai Pengangkutan Jalan (PPJ) daripada Bahagian Kejuruteraan Automotif, Jabatan Pengangkutan Jalan (JPJ) ;
 - (v) Pegawai Pengangkutan Jalan (PPJ) yang menerima permohonan bertanggungjawab untuk merekod dan memfailkan dokumen yang diterima serta menyerahkan kad penerimaan permohonan kepada pemohon.

4.2 Dokumen Yang Wajib Disertakan

- (i) *National Committee For Type Approval (VTA) And Homologation* berhak untuk menentukan senarai piawaian yang wajib dipatuhi oleh pemohon ;
- (ii) Setiap piawaian yang diisyiharkan hendaklah disertakan bersama salinan sijil pematuhan dan laporan ujian (*test report*) yang dikeluarkan oleh *Approval Authority (AA)* dan *Technical Service (TS)* yang diiktiraf oleh UN atau mana-mana agensi yang diiktiraf oleh JPJ. Dokumen-dokumen ini wajib disertakan bersama borang permohonan dalam bentuk *portfolio* ;
- (iii) Piawaian dan peraturan yang diterimapakai ialah yang dinyatakan dalam Jadual I (*Schedule I*) sahaja ;



- (iv) Setiausaha *National Committee For Type Approval (VTA) And Homologation* berhak mengarahkan pemohon mengemukakan sebarang dokumen tambahan bagi tujuan kelulusan ;
- (v) Setiausaha *National Committee For Type Approval (VTA) And Homologation* berhak mengarahkan pemohon untuk mendapatkan sebarang laporan pemeriksaan dan/atau sijil pematuhan piawaian tambahan daripada badan-badan kompeten seperti SIRIM dan PUSPAKOM ;
- (vi) Maklumat yang terdapat di dalam dokumen yang dikemukakan hendaklah benar dan tidak bercanggah dengan fizikal kenderaan yang dipohon untuk menjalani proses Kelulusan Jenis Kenderaan (VTA). Sekiranya didapati palsu / bercanggah dengan fizikal kenderaan, pihak Jabatan Pengangkutan Jalan (JPJ) berhak untuk membatalkan permohonan dan mengenakan tindakan kepada pemohon berdasarkan Akta Pengangkutan Jalan (APJ) 1987.

4.3 Verifikasi Dokumen

- (i) Dokumen yang dihantar oleh pemohon hendaklah disemak oleh Penolong Jurutera Jabatan Pengangkutan Jalan (JPJ) yang bertanggungjawab.
- (ii) Pengesahan dokumen hendaklah dilakukan oleh Jurutera / Timbalan Pengarah / Pengarah Bahagian Kejuruteraan Automotif.
- (iii) Dokumen adalah tidak sah sekiranya pengesahan tidak dilakukan.



4.4 Laporan Pemeriksaan Kenderaan / Sijil Pematuhan Piawaian

- (i) Pegawai Pengangkutan Jalan (PPJ) yang bertanggungjawab berhak menentukan tempat, tarikh dan masa pemeriksaan bagi kenderaan yang menjalani proses Kelulusan Jenis Kenderaan (VTA) ;
- (ii) Pemeriksaan kenderaan hendaklah dilaksanakan oleh sekurang-kurangnya **DUA** orang Pegawai Pengangkutan Jalan (PPJ) daripada Bahagian Kejuruteraan Automotif (KA) JPJ ;
- (iii) Bagi tujuan pemeriksaan, maklumat spesifikasi am kenderaan hendaklah di paparkan di cermin hadapan kenderaan dengan menggunakan kertas A4 seperti di **LAMPIRAN 18** ;
- (iv) Pemohon perlu memastikan **tangki bahan api diisi penuh** bagi kenderaan yang akan diperiksa bagi tujuan penilaian uji pandu oleh Pegawai Pengangkutan Jalan (PPJ) daripada Bahagian KA JPJ. Kenderaan tidak akan diterima sekiranya tangki bahan api tidak diisi penuh ;
- (v) Semua kos pemeriksaan (termasuk kos pengangkutan dan penginapan) perlu ditanggung oleh pemohon ;
- (vi) Pemohon wajib memastikan keadaan kenderaan adalah lengkap dan sempurna sebelum pemeriksaan dijalankan ;
- (vii) Pegawai Pengangkutan Jalan (PPJ) daripada Bahagian KA JPJ yang terbabit bertanggungjawab untuk menyediakan laporan pemeriksaan mengikut format seperti yang telah ditetapkan oleh Setiausaha *National Committee For Type Approval (VTA) And Homologation*.



4.5 Penerangan Spesifikasi Teknikal Kenderaan

- (i) Pihak syarikat bertanggungjawab untuk menjalankan pembentangan atau sesi penerangan kepada pegawai yang terlibat dalam pemeriksaan VTA berkaitan spesifikasi teknikal kenderaan sebelum pemeriksaan fizikal dijalankan.
- (ii) Antara intipati yang harus dititikberatkan di dalam pembentangan ini adalah termasuk spesifikasi enjin kenderaan, ciri-ciri keselamatan istimewa kenderaan dan langkah-langkah keselamatan bagi tujuan pemeriksaan kenderaan.

4.6 Pemeriksaan Kenderaan

- (i) Pemeriksaan kenderaan yang dijalankan terbahagi kepada dua bahagian iaitu pemeriksaan fizikal dan uji pandu kenderaan ;
- (ii) Pemohon hendaklah memberikan kerjasama sepenuhnya sepanjang proses pemeriksaan dan tidak berhak untuk menghalang sebarang jenis pemeriksaan kenderaan yang akan dilakukan ;
- (iii) Permohonan Kelulusan Jenis Kenderaan (VTA) akan digagalkan sekiranya Pegawai tidak dapat menjalankan mana-mana pemeriksaan kenderaan yang dianggap perlu bagi proses pembentangan laporan permohonan tersebut ;
- (iv) Pegawai bertanggungjawab merekodkan pemeriksaan fizikal yang dijalankan ke atas kenderaan tersebut ke dalam senarai semak yang telah disediakan ;



- (v) Semua sistem dan komponen kenderaan akan dinilai dari segi fungsi dan prestasi semasa sesi uji pandu kenderaan dijalankan oleh Pegawai terbabit ;
- (vi) Pegawai bertanggungjawab memaklumkan hasil pemeriksaan kenderaan kepada pemohon selepas selesai sesi pemeriksaan dijalankan ;
- (vii) Pemohon perlu segera memperbaiki kelemahan yang terdapat pada kenderaan jika ada maklumbalas berkaitan daripada Pegawai yang melakukan pemeriksaan tersebut dan menghantar kenderaan yang telah diperbaiki untuk dinilai semula.

4.7 Pembentangan Laporan Permohonan Kelulusan Jenis Kenderaan (VTA)

- (i) PPJ wajib mengemukakan semua laporan pemeriksaan kepada Setiausaha *National Committee For Type Approval (VTA) And Homologation* selewat-lewatnya **5 hari** masa bekerja sebelum mesyuarat jawatankuasa akan diadakan ;
- (ii) PPJ bertanggungjawab memaklumkan alasan kegagalan untuk mengemukakan laporan pemeriksaan kepada pemohon dan setiausaha (sekiranya berkaitan) ;
- (iii) Setiausaha *National Committee For Type Approval (VTA) And Homologation* berhak menangguhkan permohonan sekiranya laporan pemeriksaan tidak diterima dalam masa yang telah ditetapkan ;
- (iv) Setiausaha *National Committee For Type Approval (VTA) And Homologation* berhak menentukan sebarang format bagi tujuan pembentangan laporan pemeriksaan kenderaan dan rumusan permohonan Kelulusan Jenis Kenderaan (VTA).



4.8 Mesyuarat *National Committee For Type Approval (VTA) And Homologation*

- (i) Bagi tujuan mesyuarat, kehadiran 2/3 daripada jumlah ahli adalah diwajibkan. Kehadiran Setiausaha adalah diwajibkan bagi setiap mesyuarat ;
- (ii) Bagi tujuan kelulusan sesuatu permohonan, sokongan 2/3 daripada jumlah ahli tetap adalah diwajibkan ;
- (iii) Jawatankuasa berhak untuk mengubah, memperbaharui atau memperkenalkan sebarang keperluan bagi tujuan kelulusan permohonan.

4.9 Sijil Kelulusan Jenis Kenderaan (VTA)

- (i) Format sijil Kelulusan Jenis Kenderaan (VTA) akan ditentukan oleh *National Committee For Type Approval (VTA) And Homologation* ;
- (ii) Setiap pendaftaran baru model kenderaan hendaklah mengemukakan satu salinan sijil VTA bersama-sama surat kebenaran penggunaan sijil VTA daripada pemohon asal ;
- (iii) Sijil VTA akan dikeluarkan dalam tempoh 20 hari dari tarikh penyerahan dokumen permohonan, sekiranya ada kelewatan, Setiausaha *National Committee For Type Approval (VTA) and Homologation* akan memaklumkan kepada pemohon secara bertulis atau secara email.



4.10 Jangkamasa Permohonan

- (i) Setiap permohonan hendaklah dikemukakan kepada Jabatan Pengangkutan Jalan (JPJ) dalam tempoh sekurang-kurangnya 20 hari masa bekerja sebelum Mesyuarat *National Committee For Type Approval (VTA) And Homologation* diadakan ;
- (ii) Setiausaha *National Committee For Type Approval (VTA) And Homologation* berhak menangguhkan permohonan kepada mesyuarat seterusnya sekiranya syarat ini tidak dipatuhi.

4.11 Keaslian Maklumat Dan Dokumen-dokumen Yang Disertakan

- (i) Pemohon wajib memastikan semua dokumen yang dikemukakan adalah benar dan sanggup untuk menerima sebarang tindakan daripada pihak Jabatan Pengangkutan Jalan (JPJ) sekiranya didapati palsu ;
- (ii) Pemohon wajib memastikan semua maklumat yang dikemukakan ketika permohonan adalah sama / tidak bercanggah dengan maklumat pada fizikal kenderaan.

4.12 Kerosakan Terhadap Kenderaan Ketika Pemeriksaan

- (i) Sekiranya kerosakan terhadap kenderaan berlaku ketika pemeriksaan kenderaan dijalankan atas alasan-alasan ketidaksempurnaan kenderaan atau kerosakan teknikal kenderaan, kos pembaikan adalah menjadi tanggungjawab pemohon sepenuhnya.



4.13 Pemberitahuan Perubahan Maklumat

- (i) Pemohon bertanggungjawab untuk mengemukakan sebarang perubahan atau pengubahsuaian terhadap fizikal kenderaan berbanding dokumen yang dikemukakan dalam tempoh selewat-lewatnya **14 hari** selepas pengubahsuaian dilakukan secara bertulis (sekiranya berkaitan).
- (ii) Permohonan akan dikategorikan sebagai permohonan semula VTA dan kelulusan hanya akan diberikan selepas mesyuarat VTA pada bulan yang berikutnya bersidang bagi kes-kes berikut :
 - (a) sebarang pindaan maklumat selepas tempoh 14 hari ;
 - (b) terdapat perubahan pada Lampiran XXX setelah dokumen ditandatangani.

4.14 Pemanggilan Semula (*Recall*)

- (i) Pihak Jabatan Pengangkutan Jalan (JPJ) dengan kelulusan Jawatankuasa *National Committee For Type Approval (VTA) and Homologation* berhak untuk memanggil semula kenderaan yang didapati menghadapi masalah teknikal dan ini adalah termasuk kenderaan yang telah melalui proses Kelulusan Jenis Kenderaan (VTA) dan telah didaftarkan ;
- (ii) Semua kos Pemanggilan Semula (*Recall*) adalah ditanggung oleh pihak syarikat ;
- (iii) Prosedur Pemanggilan Semula (*Recall*) adalah seperti di LAMPIRAN 19.



4.15 ***Conformity of Production (COP)***

- (i) *Conformity of Production (COP)* bagi VTA bertujuan untuk memastikan spesifikasi kenderaan yang dikeluarkan dari kilang adalah sama dengan spesifikasi model kenderaan yang telah lulus VTA. Pemeriksaan semula kenderaan akan dilakukan secara rawak atau berkala sama ada di kilang atau di mana-mana pengedar yang sah yang dilantik oleh pemohon.
- (ii) Jika terdapat sebarang perubahan termasuk pemasangan aksesori bagi spesifikasi model kenderaan yang telah lulus VTA, pemohon hendaklah memaklumkan kepada Jabatan Pengangkutan Jalan (JPJ). Kegagalan pemohon berbuat demikian boleh menyebabkan COP gagal dan tindakan boleh diambil. Antara tindakan yang boleh dikenakan adalah:
- (a) Kelulusan VTA ditarik balik
 - (b) Larangan Pendaftaran Kenderaan
 - (c) Penalti di bawah Seksyen 12 dan Seksyen 117 APJ 1987
- (iii) Kekerapan pelaksanaan COP adalah seperti jadual di bawah:

Jumlah pengeluaran kenderaan / tahun (CKD + SKD + CBU)	Pelaksanaan <i>Conformity Of Production</i> (COP)
1000 unit dan ke bawah	2 tahun sekali
Melebihi 1000 unit	1 tahun sekali

- (iv) Pelaksanaan COP akan berkuatkuasa ke atas setiap model baru atau model sedia ada (CKD + SKD + CBU) kenderaan yang memperolehi Sijil Kelulusan Jenis Kenderaan (VTA) bermula 01 Januari 2015 ;
- (v) Carta alir proses COP adalah seperti di **LAMPIRAN 20**.



4.16 *Product Labelling*

- (i) *Product Labelling* bertujuan untuk pengenalan identiti model dan memudahkan proses penguatkuasaan. Setiap model kenderaan yang telah memperolehi Sijil Kelulusan Jenis Kenderaan (VTA) mempunyai nombor siri sijil VTA. Nombor siri sijil VTA tersebut wajib dipaparkan pada setiap kenderaan yang dikeluarkan bermula 01 Januari 2014 ;
- (ii) Plat atau pelekat (*sticker*) hendaklah digunakan bagi tujuan paparan nombor siri sijil VTA tersebut di mana-mana bahagian kenderaan yang dirasakan sesuai dan mudah untuk dilihat. Jika pelekat (*sticker*) digunakan, pelekat (*sticker*) tersebut hendaklah dari jenis *tampered proof* ;
- (iii) Contoh *Product Labelling* bagi kenderaan kategori M, N dan O adalah seperti di LAMPIRAN 21 dan bagi kenderaan kategori L (Motosikal) seperti di LAMPIRAN 22 ;
- (iv) *Product Labelling* telah menjadi item mandatori dalam pemeriksaan PUSPAKOM bermula 01 Julai 2014 (Pemeriksaan Awalan dan Pemeriksaan Khas bagi Kenderaan CBU) ;
- (v) Mulai **01 Januari 2017**, pelaksanaan format *Product Labelling* akan mengandungi maklumat-maklumat berikut :
 - (a) *Name of the Manufacturer* ;
 - (b) *Vehicle Type Approval (VTA) Number* ;
 - (c) *Vehicle Identification Number (VIN) / Chassis Number* ;
 - (d) *Gross Vehicle Weight (GVW) of the vehicle^{*1}* ;



(e) Gross Combination Weight (GCW), where the vehicle is used for towing^{*2}; and

(f) Axle load rating for each axle, listed in order from front to rear.

^{*1} GVW in this case = Berat Dengan Muatan (BDM)

^{*2} GCW in this case = Berat Gabungan Kasar (BGK)

(vi) Contoh format *Product Labelling* yang akan dikuatkuasakan bermula 01 Januari 2017 adalah seperti berikut:

NAMA PENGETAHUAN KENDERAAN
XXX/0001/17
NO CASIS KENDERAAN
2395 kg
4555 kg
1 – 1225 kg
2 – 1295 kg

5. PELAKSANAAN UN DAN KESANNYA KEPADA PERMOHONAN KELULUSAN JENIS KENDERAAN

Sebagai salah sebuah negara anggota *World Forum for Harmonization of Vehicle Regulations* (WP29) yang telah menandatangani Perjanjian 1958 dan Perjanjian 1998, Malaysia telah memberi komitmen untuk mengadaptasi peraturan UN ke dalam peraturan sedia ada iaitu Kaedah-Kaedah Pengangkutan Jalan.

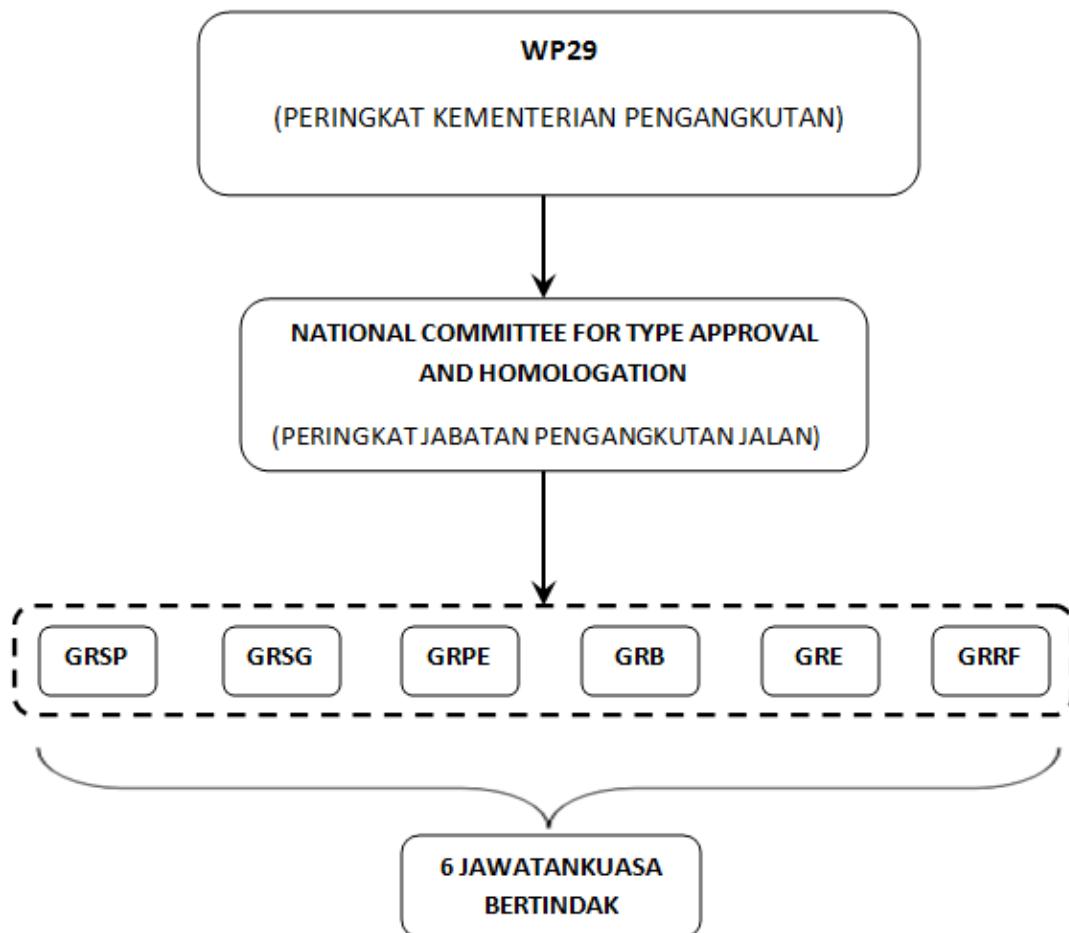
Perjanjian 1958 merupakan salah satu perjanjian di bawah WP29 yang mewajibkan proses pensijilan bagi setiap ujian yang dijalankan berdasarkan peraturan UN manakala Perjanjian 1998 pula merupakan salah satu perjanjian di bawah WP29 yang bersifat ‘self-declaration’ bagi setiap pematuhan piawaian *Global Technical Regulation* (GTR).



Di bawah Perjanjian 1958, terdapat 133 peraturan UN yang merangkumi aspek teknikal dan keselamatan kenderaan serta aspek pengawalan pelepasan asap dan bunyi dari kenderaan. Jumlah peraturan ini akan bertambah dari semasa ke semasa bergantung kepada keputusan WP29.

Bagi memudahkan pelaksanaan peraturan ini, Perjanjian 1958 telah dipilih di mana pemohon yang memohon Kelulusan Jenis Kenderaan (VTA) perlu mengemukakan sijil pematuhan peraturan UN dan laporan ujian bagi model kenderaan yang dipohon.

Bagi memastikan proses pelaksanaan peraturan UN dijalankan dengan efisien di Malaysia, beberapa jawatankuasa telah ditubuhkan iaitu Jawatankuasa WP29 (Peringkat Kementerian Pengangkutan), *National Committee for Type Approval (VTA) & Homologation* (Peringkat Jabatan Pengangkutan Jalan) dan 6 Jawatankuasa Bertindak (Peringkat Ahli-Ahli Jawatankuasa VTA).





Sehingga kini, Jabatan Pengangkutan Jalan (JPJ) di bawah Kementerian Pengangkutan (MOT) telah mewartakan 78 peraturan UN dan sebahagian peraturan tersebut meliputi bidang kawalan pelepasan asap dan bunyi dari kenderaan.

Senarai Peraturan UN yang **telah diwartakan (Sehingga Mac 2014)** iaitu melibatkan **78 Peraturan UN** adalah seperti berikut:

Telah diwartakan dan dikuatkuasakan bermula 01 Januari 2012

1. R3 : *Reflex Reflector*
2. R6 : *Indicator Performance*
3. R7 : *Brake Lamp Performance*
4. R13 : *Braking*
5. R13H: *Braking*
6. R14 : *Safety Belt Anchorages*
7. R15 : *Exhaust Emission (DOE)*
8. R16 : *Safety Belts*
9. R17 : *Seats*
10. R18 : *Protection Against Unauthorized Use*
11. R22 : *Protective Helmet & Visor for Motorcycle & Moped*
12. R24 : *Diesel Smoke (DOE)*
13. R25 : *Head Restraints*
14. R28 : *Audible Warning Devices*
15. R30 : *Pneumatic Tyres (Passenger Vehicle)*
16. R36 : *Construction Of Public Service Vehicles*
17. R39 : *Speedometer*
18. R40 : *Exhaust Emission (Motorcycle)*
19. R41 : *Noise Emission (Motorcycle)*
20. R43 : *Safety Glass*
21. R46 : *Rear View Mirrors*
22. R48 : *Installation Of Lights (for High Intensity Discharge (HID) only)*
23. R49 : *Diesel Emission (DOE)*



24. R50 : *Lights (Motorcycle)*
25. R51 : *Noise Emission*
26. R52 : *Construction Of Small Capacity Public Service Vehicle*
27. R53 : *Installation Of Lights (Motorcycle)*
28. R54 : *Pneumatic Tyres (Commercial Vehicles)*
29. R58 : *Rear Underrun Protection*
30. R62 : *Protection Against Unauthorized Use (Motorcycles)*
31. R66 : *Strength Of Superstructure (Large Passenger Vehicle)*
32. R69 : *Rear Marking Plates For Slow Moving Vehicles And Their Trailers*
33. R70 : *Rear Marking Plates For Heavy And Long Vehicles*
34. R73 : *Lateral Protection (Goods Vehicle)*
35. R75 : *Pneumatic Tyres (Motorcycle)*
36. R78 : *Braking (Motorcycle)*
37. R79 : *Steering Equipment*
38. R80 : *Seat (Large Passenger Vehicle)*
39. R81 : *Rear View Mirrors (Motorcycle)*
40. R83 : *Gaseous Pollutants*
41. R90 : *Replacement Brake Lining Assemblies*
42. R93 : *Front Underrun Protection*
43. R94 : *Protection Of The Occupants in the Event of a Frontal Collision*
44. R95 : *Protection Of The Occupants in the Event of a Lateral Collision*
45. R97 : *Vehicle Alarm System*
46. R98 : *Gas Discharge Headlamps*
47. R99 : *Gas Discharge Light Sources*
48. R100 : *Battery Electric Vehicles*
49. R104 : *Retro-reflective Markings for Heavy and Long Vehicles*
50. R108 : *Retreaded Pneumatic Tyres (Motor Vehicle)*
51. R109 : *Retreaded Pneumatic Tyres (Commercial Vehicle)*
52. R112 : *Headlamps (Asymmetrical)*
53. R113 : *Headlamps (Symmetrical)*
54. R116 : *Protection Against Unauthorized Use (Technical Prescription)*



Telah diwartakan dan penguatkuasaan bermula 01 Januari 2015

1. R4 : *Rear Registration Plate Lamp*
2. R10 : *Radio Interference Suppression*
3. R11 : *Door Latches and Hinges*
4. R19 : *Front Fog Lamps*
5. R21 : *Interior Fittings*
6. R23 : *Reversing Lamps*
7. R26 : *External Projection*
8. R34 : *Prevention of Fire Risks*
9. R37 : *Filament Lamps*
10. R38 : *Rear Fog Lamps*
11. R44 : *Child Restraint*
12. R45 : *Headlamp Cleaners*
13. R48 : *Installation Of Lights (for other lamps)*
14. R55 : *Mechanical Coupling*
15. R60 : *Driver Operated Control (Motorcycle)*
16. R61 : *External Projection*
17. R64 : *Temporary Spare Tyres*
18. R77 : *Parking Lamps*
19. R89 : *Speed Limitation Device*
20. R91 : *Side-marker Lamps*
21. R101 : *Emission of Carbon Dioxide and Fuel Consumption (Passenger Car)(EEV only)*
22. R117 : *Tyres with regard to rolling sound emission*
23. R119 : *Cornering Lamps*
24. R121 : *Hand Controls, Tell-tales and indications*



Setiap permohonan Kelulusan Jenis Kenderaan (VTA) perlu menyertakan salinan sijil pematuhan peraturan UN dan laporan ujian bagi komponen dan sistem yang berkaitan. Permohonan akan dikategorikan sebagai **GAGAL** sekiranya pemohon tidak dapat menyertakan salinan sijil pematuhan dan laporan pengujian tersebut.

6. PELAKSANAAN PENGKOMPUTERAN SEMULA (*REVAMP*) DAN KESANNYA KEPADA PERMOHONAN KELULUSAN JENIS KENDERAAN

Seiring dengan perkembangan semasa Teknologi Maklumat (IT), Jabatan Pengangkutan Jalan (JPJ) melalui Program Transformasi Kerajaan (GTP) telah beriltizam untuk memberi wajah baru kepada proses kerja Jabatan di mana semua urusan permohonan yang melibatkan Jabatan ini dengan orang awam akan dilakukan secara atas talian (*online*).

Sehubungan itu, proses permohonan Kelulusan Jenis Kenderaan (VTA) juga akan dilakukan oleh pemohon secara atas talian (*online*) dengan semua borang permohonan berkaitan telah disediakan. Pemohon perlu mengisi borang tersebut dan melampirkan (*upload*) salinan dokumen seperti salinan sijil pematuhan peraturan UN, laporan ujian dan dokumen lain yang berkaitan.

Kemudahan ini bakal menjimatkan penggunaan kertas di mana sebelum ini permohonan perlu dihantar ke kaunter Bahagian Kejuruteraan Automotif Ibu pejabat dalam dua salinan. Selain itu, ini juga akan menjimatkan masa pemohon yang tidak perlu lagi menghantar dokumen permohonan ke kaunter.



7. CONTOH SIJIL KELULUSAN JENIS KENDERaan

7.1 Sijil Kelulusan Jenis Kenderaan (2014)

No. Siri: XXX/0001/14


JABATAN PENGANGKUTAN JALAN MALAYSIA

SIJIL KELULUSAN JENIS KENDERaan
(VEHICLE TYPE APPROVAL)

National Committee For Vehicle Type Approval (VTA) And Homologation Bil. 12/2014 bertarikh 23 Disember 2014 meluluskan dan mengesahkan bahawa kenderaan berikut layak didaftarkan mengikut Seksyen 10 Akta Pengangkutan Jalan 1987.

Buatan	:	<input type="text"/>
Model	:	<input type="text"/>
Kod Model	:	<input type="text"/>
Model Tahun	:	2014
Jenis/Prefix Enjin	:	<input type="text"/>
8 Cylinder, 4 stroke		
Kuasa Enjin	:	3799 cc/ 478 kW
Bahanapi	:	Unleaded Petrol (RON 98)
Tempat Duduk	:	2
Transmisi	:	Automatik, 7 Speed
Jenis Badan	:	Motokar (MKR)
Kategori	:	M ₁
Kegunaan	:	Persendirian
Kod Buatan	:	<input type="text"/>
Negara Pembuat	:	United Kingdom (CBU)
Pemohon	:	<input type="text"/>

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DATO' IR.HJ.MOHAMAD BIN DALIB
Setiausaha National Committee For
Type Approval (VTA) And
Homologation

DATO' SRI ISMAIL BIN AHMAD
Pengerusi National Committee For
Type Approval (VTA) And
Homologation

Tarikh : 23 Disember 2014





7.2 Sijil Kelulusan Jenis Kenderaan (2015) – Existing & New Model

No. Siri: XXX/0001/15

↓

0 = Bagi model sedia ada

JABATAN PENGANGKUTAN JALAN MALAYSIA

**SIJIL KELULUSAN JENIS KENDERAAN
(VEHICLE TYPE APPROVAL)**

*National Committee For Vehicle Type Approval (VTA) And Homologation Bil. 1/2015
bertarikh 23 Januari 2015 meluluskan dan mengesahkan bahawa kenderaan berikut
layak didaftarkan mengikut Seksyen 10 Akta Pengangkutan Jalan 1987.*

Buatan	:	[Redacted]
Model	:	[Redacted]
Kod Model	:	[Redacted]
Model Tahun	:	2014
Jenis/Prefix Enjin	:	[Redacted]
Kuasa Enjin	:	6 Cylinder, 4 stroke 11596 cc/ 276 kW
Bahanapi	:	Diesel
Tempat Duduk	:	1
Transmisi	:	Manual, 10 Speed
Jenis Badan	:	Lori Rigid – Dumper/Tipper (LRD)
Kategori	:	N ₃
Kegunaan	:	Perdagangan
Kod Buatan	:	[Redacted]
Negara Pembuat	:	China (CBU)
Pemohon	:	[Redacted]

(*DATO' IR.HJ.MOHAMAD BIN DALIB*)
Setiausaha National Committee For
Type Approval (VTA) And
Homologation

(*DATO' SRI ISMAIL BIN AHMAD*)
Pengerusi National Committee For
Type Approval (VTA) And
Homologation

Tarikh : 23 Januari 2015



No. Siri: XXX/1001/15

1 = Bagi model baru

JABATAN PENGANGKUTAN JALAN MALAYSIA

SIJIL KELULUSAN JENIS KENDERAAN (VEHICLE TYPE APPROVAL)

National Committee For Vehicle Type Approval (VTA) And Homologation Bil. 1/2015 bertarikh 23 Januari 2015 meluluskan dan mengesahkan bahawa kenderaan berikut layak didaftarkan mengikut Seksyen 10 Akta Pengangkutan Jalan 1987.

Buatan	:	<input type="text"/>
Model	:	<input type="text"/>
Kod Model	:	<input type="text"/>
Model Tahun	:	2015
Jenis/Prefix Enjin	:	<input type="text"/>
		3 Cylinder, 4 stroke
Kuasa Enjin	:	847 cc/ 84.6 kW
Bahanapi	:	Unleaded Petrol (RON 95)
Tempat Duduk	:	2
Transmisi	:	Manual, 6 Speed
Jenis Badan	:	Motosikal (MSL)
Kategori	:	L3
Kegunaan	:	Persendirian/ Perdagangan
Kod Buatan	:	<input type="text"/>
Negara Pembuat	:	Malaysia (CKD)
Pemohon	:	<input type="text"/>

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DATO' IR.HJ.MOHAMAD BIN DALIB
Setiausaha National Committee For
Type Approval (VTA) And
Homologation

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DATO' SRI ISMAIL BIN AHMAD
Pengerusi National Committee For
Type Approval (VTA) And
Homologation

Tarikh : 23 Januari 2015





8. KENDERAAN *FACE LIFT*

Kenderaan *facelift* ialah model kenderaan yang telah memperolehi Kelulusan Jenis Kenderaan (VTA) dan telahpun didaftarkan tetapi kemudiannya ia melalui proses penambahbaikan dari segi aksesori tambahan ataupun perubahan kepada sistem kenderaan itu sendiri. Kebiasaannya, proses ini dilakukan oleh pengilang atau pengeluar kenderaan bagi memberi wajah baru yang lebih menarik untuk merangsang kenaikan jualan kenderaan tersebut.

Dari segi perundangan, pihak pengilang atau pengeluar yang melakukan penambahbaikan atau sebarang modifikasi tambahan kepada model kenderaan sedia ada yang telah berdaftar adalah diwajibkan untuk memaklumkan hal tersebut kepada pihak Jabatan Pengangkutan Jalan (JPJ) khususnya kepada Bahagian Kejuruteraan Automotif yang melaksanakan proses Kelulusan Jenis Kenderaan (VTA). Perkara ini adalah tertakluk di bawah Seksyen 12 Akta Pengangkutan Jalan 1987.

Kenderaan yang layak dikategorikan sebagai kenderaan *facelift* ialah kenderaan yang melalui penambahbaikan. Antara contoh penambahbaikan yang sering dilakukan oleh pengilang atau pengeluar kenderaan adalah:

- (i) *Side skirt*
- (ii) *Bumper* hadapan/belakang
- (iii) Rekabentuk rim
- (iv) Aksesori dalaman seperti *leather seat*
- (v) *Spoiler*

Bagi penambahbaikan yang melibatkan komponen yang tersenarai dalam peraturan UN, pihak pengilang atau pengeluar kenderaan tersebut perlu melampirkan salinan sijil pematuhan peraturan UN bagi komponen tersebut bersama surat makluman penambahbaikan model kenderaan yang terlibat.



8.1 Definisi Model Baru

Terdapat beberapa perkara yang membezakan diantara kenderaan-kenderaan model baru dan juga model yang telah melalui penambahbaikan (*facelift*). Definisi ini terbahagi kepada 3 komponen iaitu:

- i) *Type*
- ii) *Variant*
- iii) *Version*

8.2 Definisi Model Baru Bagi Kategori L (Motosikal)

Definisi model baru terbahagi kepada tiga (3) komponen iaitu:

8.2.1 ‘Type’ bermaksud sama ada kenderaan atau satu kumpulan kenderaan (*variants*) yang mana:

- (i) *Belong to a single category (two wheel L3, three wheel (tri-cycle) L5 etc.) ;*
- (ii) Are constructed by the same manufacturer ;*
- (iii) Have the same chassis, frame, sub-frame, floor pan or structure to which major components are attached ;*
- (iv) Have a power unit with the same principle of operation (internal combustion, electric, hybrid, etc. ; and*
- (v) Have the same type designation given by the manufacturer.*

A type of vehicle may include variants and versions.



8.2.2 ‘Variant’ bermaksud sama ada kenderaan atau satu kumpulan kenderaan (*versions*) dari ‘*type*’ yang sama di mana:

- (i) *They have the same shape of the bodywork (basic characteristics) ;*
- (ii) *Within the group of vehicles (versions) the difference in mass in running order between the lowest value and the highest value does not exceed 20% of the lowest value ;*
- (iii) *Within the group of vehicles (versions) the difference in the maximum permissible mass between the lowest value and the highest value does not exceed 20% of the lowest value ;*
- (iv) *They have the same operating cycle (two or four stroke, spark ignition or compression ignition) ;*
- (v) *Within the group of vehicles (versions) the difference in the cylinder capacity of the power unit (in the case of an internal combustion unit) between the lowest value and the highest value does not exceed 30% of the lowest value ;*
- (vi) *Have the same number and arrangement of cylinders ;*
- (vii) *Within the group of vehicles (versions) the difference in the power output of the power unit between the lowest value and the highest value does not exceed 30% of the lowest value ;*
- (viii) *Have the same operating mode (of electric motors) ; and*
- (ix) *Have the same type of gearbox (manual, automatic, etc.).*



8.2.3 ‘Version’ bermaksud kenderaan dari ‘type’ dan ‘variant’ yang sama tetapi yang mungkin akan menggabungkan mana-mana peralatan, komponen atau sistem dengan syarat bahawa hanya terdapat:

(a) *One value quoted for:*

- (i) *The mass in running order ;*
- (ii) *The maximum permissible mass ;*
- (iii) *The power output of the power unit ; and*
- (iv) *The cylinder capacity of the power unit.*

(b) *One set of test results.*

8.3 Definisi Model Baru Bagi Kategori M1, M2, M3, N1, N2 dan N3.

8.3.1. Category M1

8.3.1.1. Vehicle type:

8.3.1.1.1. A ‘vehicle type’ shall consist of vehicles which have all of the following features in common:

(a) *the manufacturer’s company name.*

A change in the legal form of ownership of the company does not require that a new approval has to be granted;

(b) *the design and assembly of the essential parts of the body structure in the case of a self-supporting body.*

The same shall apply mutatis mutandis to vehicles the bodywork of which is bolted on or welded to a separate frame;



- (c) *in the case of multi-stage built vehicles, the manufacturer and the type of the previous stage vehicle.*

- 8.3.1.1.2. *By way of derogation from the requirements of point 8.3.1.1.1(b), when the manufacturer uses the floor portion of the body structure as well as the essential constituent elements forming the front part of the body structure located directly in front of the windscreen bay, in the construction of different kinds of bodywork (for example a saloon and a coupe), those vehicles may be considered as belonging to the same type. Evidence thereof shall be provided by the manufacturer.*
- 8.3.1.1.3. *A type shall consist of at least one variant and one version.*

8.3.1.2. **Variant:**

- 8.3.1.2.1. *A ‘variant’ within a vehicle type shall group the vehicles which have all of the following construction features in common:*

- (a) *the number of lateral doors or the type of bodywork as defined in Section 1 of Part C when the manufacturer uses the criterion of point 1.1.2;*
- (b) *the power plant with regard to the following construction features:*
- (i) *the type of energy supply (internal combustion engine, electric motor or other);*
- (ii) *the working principle (positive ignition, compression ignition or other);*
- (iii) *the number and arrangement of cylinders in the case of internal combustion engine (L4, V6 or other);*
- (c) *the number of axles;*
- (d) *the number, and interconnection of powered axles;*



- (e) *the number of steered axles;*
- (f) *the stage of completion (e.g. complete/incomplete).*

8.3.1.3. Version:

8.3.1.3.1. A ‘version’ within a variant shall group the vehicles which have all the following features in common:

- (a) *the technically permissible maximum laden mass;*
- (b) *the engine capacity in the case of internal combustion engine;*
- (c) *the maximum engine power output or the maximum continuous rated power (electric motor);*
- (d) *the nature of the fuel (petrol, gas oil, LPG, bi-fuel or other);*
- (e) *the maximum number of seating positions;*
- (f) *drive-by sound level;*
- (g) *exhaust emission level (for example Euro 5, Euro 6 or other);*
- (h) *combined or weighted, combined CO₂ emissions;*
- (i) *electric energy consumption (weighted, combined);*
- (j) *combined or weighted, combined fuel consumption;*

8.3.2. Categories M 2 and M 3

8.3.2.1. Vehicle type:

8.3.2.1.1. A ‘vehicle type’ shall consist of vehicles which have all of the following features in common:

- (a) *the manufacturer’s company name. A change in the legal form of ownership of the company does not require that a new approval has to be granted;*
- (b) *the category;*
- (c) *the following aspects of construction and design:*



- (i) *the design and construction of the essential constituent elements forming the chassis;*
- (ii) *the design and construction of the essential constituent elements forming the body structure in the case of a self-supporting body;*
- (d) *the number of decks (single or double);*
- (e) *the number of sections (rigid/articulated);*
- (f) *the number of axles;*
- (g) *the mode of energy supply (on-board or off-board);*
- (h) *in the case of multi-stage built vehicles, the manufacturer and the type of the previous stage vehicle.*

8.3.2.1.2. *A type shall consist of at least one variant and one version.*

8.3.2.2. Variant:

8.3.2.2.1. *A ‘variant’ within a vehicle type shall group the vehicles which have all of the following construction features in common:*

- (a) *the type of bodywork ;*
- (b) *the class or combination of classes of vehicles ;*
- (c) *the stage of completion (e.g. complete/incomplete/completed);*
- (d) *the power plant with regard to the following construction features:
 - (i) *the type of energy supply (internal combustion engine, electric motor or other);*
 - (ii) *the working principle (positive ignition, compression ignition or other);*
 - (iii) *the number and arrangement of cylinders in the case of internal combustion engine (L6, V8 or other).**



8.3.2.3. Version:

8.3.2.3.1. A ‘version’ within a variant shall group the vehicles which have all the following features in common:

- (a) the technically permissible maximum laden mass;
- (b) the ability of the vehicle to tow a trailer or not;
- (c) the engine capacity in the case of internal combustion engine;
- (d) the maximum engine power output or the maximum continuous rated power (electric motor);
- (e) the nature of the fuel (petrol, gas oil, LPG, bi-fuel or other);
- (f) drive-by sound level;
- (g) exhaust emission level (for example Euro III, Euro IV or other).

8.3. 3 Category N 1

8.3.3.1. Vehicle type:

8.3.3.1.1. A ‘vehicle type’ shall consist of vehicles which have all of the following features in common:

- (a) the manufacturer’s company name.
A change in the legal form of ownership of the company does not require that a new approval has to be granted;
- (b) the design and assembly of the essential parts of the body structure in the case of a self-supporting body;
- (c) the design and the construction of the essential constituent elements forming the chassis in the case of a non self-supporting body;
- (d) in the case of multi-stage built vehicles, the manufacturer and the type of the previous stage vehicle.



8.3.3.1.2. *By way of derogation from the requirements of point 3.1.1(b), when the manufacturer uses the floor portion of the body structure as well the essential constituent elements forming the front part of the body structure located directly in front of the windscreen bay, in the construction of different kinds of bodywork (for example a van and a chassis-cab, different wheelbases and different roof heights), those vehicles may be considered as belonging to the same type. Evidence thereof shall be provided by the manufacturer.*

8.3.3.1.3. *A type shall consist of at least one variant and one version.*

8.3.3.2. Variant:

8.3.3.2.1. *A ‘variant’ within a vehicle type shall group the vehicles which have all of the following construction features in common:*

- (a) *the number of lateral doors or the type of bodywork ;*
- (b) *the stage of completion (e.g. complete/incomplete/completed);*
- (c) *the power plant with regard to the following construction features:*
 - (i) *the type of energy supply (internal combustion engine, electric motor or other);*
 - (ii) *the working principle (positive ignition, compression ignition or other);*
 - (iii) *the number and arrangement of cylinders in the case of internal combustion engine (L6, V8 or other);*
- (d) *the number of axles;*
- (e) *the number and interconnection of powered axles; (f) the number of steered axles.*



8.3.3.3. Version:

8.3.3.3.1. A ‘version’ *within a variant* shall group the vehicles which have all the following features in common:

- (a) the technically permissible maximum laden mass;
- (b) the engine capacity in the case of internal combustion engine;
- (c) the maximum engine power output or maximum continuous rated power (electric motor);
- (d) the nature of the fuel (petrol, gas oil, LPG, bi-fuel or other);
- (e) the maximum number of seating positions;
- (f) drive-by sound level;
- (g) exhaust emission level (for example Euro 5, Euro 6 or other);
- (h) combined or weighted, combined CO₂ emissions;
- (i) electric energy consumption (weighted, combined);
- (j) combined or weighted, combined fuel consumption

8.3.3.4. **Categories N 2 and N 3**

8.3.3.4.1. Vehicle type:

8.3.3.4.1.1. A ‘vehicle type’ shall consist of vehicles which have all of the following essential features in common:

- (a) the manufacturer’s company name. A change in the legal form of ownership of the company does not require that a new approval has to be granted;
- (b) the category;
- (c) the design and construction of the chassis that are common to a single line of product;
- (d) the number of axles;
- (e) in the case of multi-stage built vehicles, the manufacturer and the type of the previous stage vehicle.



8.3.3.4.1.2. *A type shall consist of at least one variant and one version.*

8.3.3.4.2. Variant:

8.3.3.4.2.1. *A ‘variant’ within a vehicle type shall group the vehicles which have all of the following construction features in common:*

- (a) *the body structural concept or type of bodywork ;*
- (b) *the stage of completion (e.g. complete/incomplete/completed);*
- (c) *the power plant with regard to the following construction features:
 - (i) *the type of energy supply (internal combustion engine, electric motor or other);*
 - (ii) *the working principle (positive ignition, compression ignition or other);*
 - (iii) *the number and arrangement of cylinders in the case of internal combustion engine (L6, V8 or other);**
- (d) *the number and interconnection of powered axles;*
- (e) *the number of steered axles.*

8.3.3.4.3. Version:

8.3.3.4.3.1. *A ‘version’ within a variant shall group the vehicles which have all the following features in common:*

- (a) *the technically permissible maximum laden mass;*
- (b) *the ability or not to tow a trailer as follows:
 - (i) *an unbraked trailer;*
 - (ii) *a trailer with an inertia (or overrun) braking system as defined in point 2.12 of UN Regulation No 13;*
 - (iii) *a trailer with a continuous or semi-continuous braking system as defined in points 2.9 and 2.10 of UN Regulation No 13;**



- (iv) *a trailer of category O 4 that results in a maximum mass of the combination not exceeding 44 tonnes;*
- (v) *a trailer of category O 4 that results in a maximum mass of the combination exceeding 44 tonnes;*
- (c) *the engine capacity;*
- (d) *the maximum engine power output;*
- (e) *the nature of the fuel (petrol, gas oil, LPG, bi-fuel or other);*
- (f) *drive-by sound level;*
- (g) *exhaust emission level (for example Euro III, Euro IV or other).*

Semua perubahan atau modifikasi yang melibatkan ‘Type’, ‘Variant’ dan ‘Version’ hendaklah menjalani proses Kelulusan Jenis Kenderaan (VTA) dan diluluskan *National Committee for Type Approval (VTA) and Homologation* bagi tujuan pendaftaran kenderaan.

Bagi modifikasi melibatkan ‘Variant’ dan ‘Version’, tarikh pelaksanaan peraturan UN adalah sama seperti Model Sedia Ada (*Existing Model*). Pelaksanaan tarikh bagi model sedia ada secara dasarnya adalah berdasarkan konsep 2 tahun + 2 tahun kecuali bagi peraturan-peraturan yang ditentukan oleh Jawatankuasa VTA seperti peraturan UN R 94 : *Protection Against Occupant In The Event of Frontal Collision* dan UN R95 : *Protection Against Occupant In The Event of Lateral* .

Perubahan atau modifikasi lain hanya memerlukan surat notifikasi rasmi daripada pengeluar / pembekal kepada Bahagian Kejuruteraan Automotif, Ibu Pejabat JPJ sahaja.



9. KATEGORI KENDERAAN YANG PERLU MEMBUAT PERMOHONAN VTA

Category L – Motor vehicles with less than four wheels

Category	Definition	Term	Drawing
L1	A two-wheeled vehicle with an engine cylinder capacity in the case of a thermic engine not exceeding 50 cm ³ and whatever the means of propulsion a maximum design speed not exceeding 50 km/h.	Moped	
L2	A three-wheeled vehicle of any wheel arrangement with an engine cylinder capacity in the case of a thermic engine not exceeding 50 cm ³ and whatever the means of propulsion a maximum design speed not exceeding 50 km/h.	Moped	
L3	A two-wheeled vehicle with an engine cylinder capacity in the case of a thermic engine exceeding 50 cm ³ or whatever the means of propulsion a maximum design speed exceeding 50 km/h.	Motorcycle solo	
L4	A vehicle with three wheels asymmetrically arranged in relation to the longitudinal median plane with an engine cylinder capacity in the case of a thermic engine exceeding 50cm ³ or whatever the means of propulsion a maximum design speed exceeding 50km/h(motorcycles with sidecars).	Motorcycle with side car	
L5	A vehicle with three wheels symmetrically arranged in relation to the longitudinal median plane with an engine cylinder capacity in the case of a thermic engine exceeding 50cm ³ or whatever the means of propulsion a maximum design speed exceeding 50 km/h.	Motorcycle (tri-cycle)	
L6	<p>A vehicle with four wheels whose unladen mass is not more than 350 kg, not including the mass of the batteries in case of electric vehicles, whose maximum design speed is not more than 45 km/h, and whose engine cylinder capacity does not exceed 50 cm³ for spark (positive) ignition engines, or whose maximum net power output does not exceed 4 kW in the case of other internal combustion engines, or whose maximum continuous rated power does not exceed 4 kW in the case of electric engines.</p> <p>Class I</p> <ul style="list-style-type: none"> - Seats - Horizontally confined by a body - Roof and roll-over protection - Steered by steering wheel - Foot Throttle <p>Class II</p> <ul style="list-style-type: none"> - Saddles but no seats - No roof - Steered by handle bar - Hand throttle control 	Light Quadricycle	



Category L – Motor vehicles with less than four wheels

Category	Definition	Term	Drawing
L7	<p><i>A vehicle with four wheels, other than that classified for the category L6, whose unladen mass is not more than 400 kg (550 kg for vehicles intended for carrying goods), not including the mass of batteries in the case of electric vehicles and whose maximum continuous rated power does not exceed 15 kW."</i></p> <p>Class I</p> <ul style="list-style-type: none">- Seats- Horizontally confined by a body- Roof and roll-over protection- Steered by steering wheel- Foot Throttle <p>Class II</p> <ul style="list-style-type: none">- Saddles but no seats- No roof- Steered by handle bar- Hand throttle control	<i>Quadricycle</i>	



Category M - power-driven vehicles having at least four wheels and used for the carriage of passengers

Category	Definition	Term	Drawing
M1	Vehicles used for the carriage of passengers and comprising not more than eight seats in addition to the driver's seat. They may be indicated by following bodywork types:	Passenger car	See bodywork types below.
	Body - Closed, with or without central pillar to side windows. Hood/roof - Fixed, rigid roof. A portion of the roof may, however, be openable. Accommodation - Four or more seats in at least two rows. Doors - Two or four side doors. They may also be rear opening. Windows - Four or more side windows.	Saloon	
	Saloon with a hatch at the rear end of the vehicle.	Hatchback/Aeroback	
	Body - Closed. Rear shape is designed in order to give a larger interior volume. Hood/roof - Fixed, rigid roof. A portion of the roof may, however, be openable. Accommodation - Four or more seats in at least two rows. The row or rows of seats may have forward-foldable backs or be removable to provide a load platform. Doors - Two, three or four side doors and a rear opening Windows - Four or more side windows.	Station wagon	
	Body - Closed. Usually limited rear volume. Hood/roof - Fixed, rigid roof. A portion of the roof may, however, be openable. Accommodation - Two or more seats in at least 1 row. Doors - Two side doors. They may also be rear opening Windows - Two or more side windows.	Coupe	
	Body - Openable. Hood/roof - The roof, soft or rigid, has at least two positions: in the first one it covers the body; in the second one it is retracted. Accommodation - Two or more seats in at least 1 row. Doors - Two or four side doors. Windows - Two or more side windows.	Convertible	
	Motor vehicle other than those described above, intended for carrying passengers and their luggage or goods, in a single compartment.	Multipurpose vehicle	



Category M - power-driven vehicles having at least four wheels and used for the carriage of passengers

Category	Definition	Term	Drawing
M2	<p><i>Vehicles used for the carriage of passengers, comprising more than eight seats in addition to the driver's seat, and having a maximum mass not exceeding 5 t.</i></p> <p><i>It may be of one or two decks rigid or articulated vehicle and</i></p> <p><i>may also tow a trailer.</i></p> <p><i>It may belong to: (See Table 1 - page 33)</i></p> <p><i>a) one or more of the three classes (Class I, Class II, Class III) in accordance with UNECE Regulations Nos. 36 and 107; or</i></p> <p><i>b) one of the two classes (Class A, Class B) in accordance with UNECE Regulation No. 52.</i></p>	<i>Bus</i>	
M3	<p><i>Vehicles used for the carriage of passengers, comprising more than eight seats in addition to the driver's seat, and having a maximum mass exceeding 5 t.</i></p> <p><i>It may be of one or two decks rigid or articulated vehicle and</i></p> <p><i>may also tow a trailer.</i></p> <p><i>It may belong to: (See Table 1- page 33)</i></p> <p><i>a) one or more of the three classes (Class I, Class II, Class III) in accordance with UN ECE Regulations Nos. 36 and 107; or</i></p> <p><i>b) one of the two classes (Class A, Class B) in accordance with UN ECE Regulation No. 52</i></p>	<i>Bus</i>	



Category N - power-driven vehicles having at least four wheels and used for the carriage of goods

Category	Definition	Term	Drawing
N1	<i>Vehicles used for the carriage of goods and having a maximum mass not exceeding 3.5 t. It may also tow a trailer.</i>	<i>Goods vehicle</i>	
N2	<i>Vehicles used for the carriage of goods and having a maximum mass exceeding 3.5 tonnes but not exceeding 12 t. It may also tow a trailer.</i>	<i>Goods vehicle</i>	
N3	<i>Vehicles used for the carriage of goods and having a maximum mass exceeding 12 t. It may also tow a trailer.</i>	<i>Goods vehicle</i>	

Category O - Trailers (including semi-trailers)

Category	Definition	Term	Drawing
O1	<i>A non-powered vehicle used to transport persons or goods and is intended to be towed by a motor vehicle, with a maximum mass not exceeding 0.75 t.</i>	<i>Trailer</i>	
O2	<i>A non-powered vehicle used to transport persons or goods and is intended to be towed by a motor vehicle, with a maximum mass exceeding 0.75 t, but not exceeding 3.5 t. Types of the trailers are as in Table 2 - page 34.</i>	<i>Trailer</i>	See Table 2 - page 34
O3	<i>A non-powered vehicle used to transport persons or goods and is intended to be towed by a motor vehicle, with a maximum mass exceeding 3.5 t, but not exceeding 10 t. Types of the trailers are as in Table 2 - page 34.</i>	<i>Trailer</i>	See Table 2 - page 34
O4	<i>A non-powered vehicle used to transport persons or goods and is intended to be towed by a motor vehicle, with a maximum mass exceeding 10 t. Types of the trailers are as in Table 2 - page 34.</i>	<i>Trailer</i>	See Table 2 - page 34



Table 1: Classes of M2 and M3 vehicles

Regulation	Description	Classes	Definition of classes	Term	Drawing
36 (MS 1794: 2005)	<i>Single deck rigid or articulated vehicles having a capacity in excess of 22 passengers and an overall</i>	I	<i>Vehicles constructed with areas for standing passengers, to allow frequent passenger movement.</i>	<i>Stage buses</i>	
107	<i>Double deck rigid or Interurban buses articulated vehicles having a capacity in excess of 22 passengers.</i>	II	<i>Vehicles constructed principally for the carriage of seated passengers, and designed to allow the carriage of standing passengers in the gangway and/or in an area which does not exceed the space provided for two double</i>	<i>Interurban buses</i>	
		III	<i>Vehicles constructed exclusively for the carriage of seated passengers.</i>	<i>Long distance buses e.g.: - touring buses - express buses</i>	
52	<i>Single deck rigid vehicles having a capacity not exceeding 22 passengers in addition to the driver.</i>	A	<i>Vehicles designed to carry standing passengers; a vehicle of this class has seats and may have provisions for standing passengers.</i>	<i>Interurban buses e.g.: - mini buses</i>	
		B	<i>Vehicles not designed to carry standing passengers; a vehicle of this class has no provision for standing passengers.</i>	<i>Long distance buses e.g.: - touring buses - express buses</i>	



Table 2. Types of trailers of categories O2, O3 and O4

Types	Definition	Drawing
<i>Semi-trailer</i>	<i>A towed vehicle, in which the axle(s) is (are) positioned behind the centre of gravity of the vehicle (when uniformly loaded), and which is equipped with a connecting device permitting horizontal and vertical forces to be transmitted to the towing vehicle. One or more of the axles may be driven by the towing vehicle.</i>	
<i>Full trailer</i>	<i>A towed vehicle having at least two axles, and equipped with a towing device which can move vertically (in relation to the trailer) and controls the direction of the front axle(s), but which transmits no significant static load to the towing vehicle. One or more of the axles may be driven by the towing vehicle.</i>	
<i>Centre-axle trailer</i>	<i>A towed vehicle, equipped with a towing device which cannot move vertically (in relation to the trailer) and in which the axle(s) is (are) positioned close to the centre of gravity of the vehicle (when uniformly loaded) such that only a small static vertical load, not exceeding 10 % of that corresponding to the maximum mass of the trailer or a load of 1 000 daN (whichever is the lesser) is transmitted to the towing vehicle. One or more of the axles may be driven by the towing vehicle.</i>	



Category G – Off Road Vehicle

Category	Definition	Term	Drawing
G	<p>Off-road vehicles are considered to be the vehicles of categories M and N satisfying the requirements in MS 1822.</p> <p>Vehicles in category N₁ with a maximum mass not exceeding 2 t and vehicles in category M₁ are considered to be off-road vehicles if they have:</p> <ul style="list-style-type: none">a) at least one front axle and at least one rear axle designed to be driven simultaneously including vehicles where the drive to one axle can be disengaged;b) at least one differential locking mechanism or at least one mechanism having a similar effect;c) if they can climb a 30 per cent gradient calculated for a solo vehicle; andd) they shall satisfy at least five of the following six requirements:<ul style="list-style-type: none">i) the approach angle shall be at least 25°;ii) the departure angle shall be at least 20°;iii) the ramp angle shall be at least 20°iv) the ground clearance under the front axle shall be at least 180 mm;v) the ground clearance under the rear axle shall be at least 180 mm; andvi) the ground clearance between the axles shall be at least 200 mm. <p>Vehicles in category N₁ with a maximum mass exceeding 2 t or in category N₂, M₂ or M₃ with a maximum mass not exceeding 12 t are considered to be off-road vehicles either if all their wheels are designed to be driven simultaneously, including vehicles where the drive to one axle can be disengaged, or if the following three requirements are satisfied:</p>	Off Road	



	<p>a) at least one front axle and at least one rear axle are designed to be driven simultaneously, including vehicles where the drive to one axle can be disengaged;</p> <p>b) there is at least one differential locking mechanism or at least one mechanism having a similar effect; and</p> <p>c) they can climb a 25 % gradient calculated for a solo vehicle.</p> <p><i>Vehicles in category M₃ with a maximum mass exceeding 12 t or in category N₃ are considered to be off-road either if the wheels are designed to be driven simultaneously, including vehicles where the drive to one axle can be disengaged, or if the following requirements are satisfied:</i></p> <p>a) at least half the wheels are driven;</p> <p>b) there is at least one differential locking mechanism or at least one mechanism having a similar effect;</p> <p>c) they can climb a 25 gradient calculated for a solo vehicle;</p> <p>d) at least four of the following six requirements are satisfied:</p> <p>i) the approach angle shall be at least 25°;</p> <p>ii) the departure angle shall be at least 25°;</p> <p>iii) the ramp angle shall be at least 25°;</p> <p>iv) the ground clearance under the front axle shall be at least 250 mm;</p> <p>v) the ground clearance between the axles shall be at least 300 mm; and</p> <p>vi) the ground clearance under the rear axle shall be at least 250 mm.</p>		
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10. PELAN PELAKSANAAN PERATURAN UNITED NATIONS (UN)

IMPLEMENTATION OF 54 UN REGULATIONS

NO	UN	DESCRIPTION	SERIES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
1	R3	Reflex Reflector	02	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
2	R6	Direction Indicators	01	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
3	R7	Front and Rear Position (Side) Lamps, Stop Lamps and End-Outline Marker	02	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
4	R13	Braking	11								✓	✓	✓	✓	✓	✓	✓	✓	✓
5	R13H	Braking	00							✓			✓						
6	R14	Seatbelt Anchorage	06							✓	✓	✓	✓	✓	✓	✓			
7	R15	Exhaust Emission (DOE)																	
8	R16	Safety Belt	06		✓		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
9	R17	Seats	07								✓	✓	✓	✓	✓	✓			
10	R18	Protection Against Unauthorized Use (M,N)	03								✓	✓		✓	✓				
11	R22	Protective Helmet & Visor for driver & passenger of motorcycle and moped	05																
12	R24	Diesel Smoke (DOE)	DOE	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
13	R25	Head Restraint	04		✓		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		
14	R28	Audible Warning Device	00			✓	✓	✓			✓	✓	✓	✓	✓	✓	✓		
15	R30	Pneumatic Tyres (Passenger Vehicle)	02								✓			✓			✓	✓	
16	R36	Construction Of Public Service Vehicles	03									✓	✓						
17	R39	Speedometer	00	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		
18	R40	Exhaust Emission (Motor Cycle) (DOE)	DOE			✓	✓	✓											
19	R41	Noise (Motor Cycle) (DOE)	DOE			✓													



NO	UN	DESCRIPTION	SERIES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
20	R43	Safety Glass*†	00	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
21	R46	Rear-view mirror	02	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
22	R48	Installation Of Lights (HID)	04								✓	✓	✓	✓	✓	✓	✓	✓	✓
23	R49	Diesel Emission (DOE)	DOE								✓	✓	✓	✓	✓	✓	✓	✓	✓
24	R50	Lights (Motor Cycle)	00	✓	✓	✓	✓	✓	✓	✓									
25	R51	Noise (DOE)	DOE	✓	✓	✓	✓	✓	✓	✓									
26	R52	Construction Of Small Capacity Public Service Vehicle	01									✓	✓						
27	R53	Installation Of Lights (Motor Cycle)	01			✓													
28	R54	Pneumatic Tyres (Commercial Vehicles)	00									✓	✓	✓	✓	✓	✓	✓	✓
29	R58	Rear Under-run Protection	02											✓	✓			✓	✓
30	R62	Protection Against Unauthorized Use (L)	00	✓	✓	✓	✓	✓	✓	✓	✓								
31	R66	Strength Of Superstructure (Large Passenger Vehicle)	02										✓	✓					
32	R69	Rear Marking Plates for Slow Moving Vehicle	01												✓	✓	✓	✓	✓
33	R70	Rear Marking Plates for Heavy and Long Vehicle	01												✓	✓	✓	✓	✓
34	R73	Lateral Protection (Goods Vehicle)	01												✓	✓		✓	✓
35	R75	Tyre (Motor Cycle)	00	✓	✓	✓	✓	✓											
36	R78	Braking (L Category)	03	✓	✓	✓	✓	✓											
37	R79	Steering Equipment	01								✓	✓	✓	✓	✓	✓			
38	R80	Seat (Large Passenger Vehicle)	02									✓	✓						
39	R81	Rear-view Mirrors (Motor Cycle)	00	✓	✓	✓	✓	✓	✓	✓	✓								



NO	UN	DESCRIPTION	SERIES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
40	R83	Gaseous Pollutants (DOE)	DOE								✓	✓		✓	✓				
41	R90	Replacement Brake Lining Assemblies (After market)	02	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
42	R93	Front Under-run Protection	00												✓	✓			
43	R94	Protection of the occupants in the Event Of a Frontal Collision	02								✓								
44	R95	Protection of the occupants in the Event Of a Frontal Collision	03								✓			✓					
45	R97	Vehicle Alarm System	01								✓			✓					
46	R98	Gas-Discharge Headlamps	01			✓					✓	✓	✓	✓	✓	✓			
47	R99	Gas-Discharge Light Source	00								✓	✓	✓	✓	✓	✓			
48	R100	Construction Of Battery Electric Vehicle	00								✓	✓	✓	✓	✓	✓	✓		
49	R104	Retro-reflective Markings for Heavy and Long Vehicles	00											✓	✓	✓	✓	✓	✓
50	R108	Retreaded Pneumatic Tyres (Motor Vehicle)	00								✓			✓			✓	✓	
51	R109	Retreaded Pneumatic Tyres (Commercial Vehicle)	00									✓	✓	✓	✓	✓		✓	✓
52	R112	Headlamps (Asymmetrical)	01	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
53	R113	Headlamps (Symmetrical)	00	✓	✓	✓	✓	✓	✓	✓	✓								
54	R116	Protection Against Unauthorized Use (Technical Prescription)	00								✓			✓					

Legend:

*¹ 70% Visible Light Transmission (VLT) @ Motor Vehicles (Prohibition For Certain Type of Glasses) Rule 1991



ADDITIONAL 24 UN REGULATIONS IMPLEMENTATION FROM 01 JANUARY 2015

NO 番号	UN	DESCRIPTION	SERIES IES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
1	R4	Rear Registration Plate Lamp	00								✓	✓	✓	✓	✓	✓	✓	✓	✓
2	R10	Radio Interference Suppression	04	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
3	R11	Door Latches and Hinges	03								✓			✓					
4	R19	Front Fog Lamps (If fitted)	04			✓	✓	✓		✓	✓	✓	✓	✓	✓	✓			
5	R21	Interior Fittings	01								✓								
6	R23	Reversing Lamps	00								✓	✓	✓	✓	✓	✓	✓	✓	✓
7	R26	External Projection	03								✓								
8	R34	Prevention of Fire Risks	02								✓	✓	✓	✓	✓	✓	✓	✓	✓
9	R37	Filament Lamps	03	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
10	R38	Rear Fog Lamps	00			✓	✓	✓		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
11	R44	Child Restraint Systems (If fitted or after market)	04																
12	R45	Headlamp Cleaners	01	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
13	R48	Installation Of Lights (HID) (option to choose MS ISO 303)	06								✓	✓	✓	✓	✓	✓	✓	✓	✓
		Installation of Lights (Other Lights) (Option to choose MS ISO 303)	03								✓	✓	✓	✓	✓	✓	✓	✓	✓
14	R55	Mechanical Coupling (If fitted)	01								✓	✓	✓	✓	✓	✓	✓	✓	✓
15	R60	Driver Operated Control (Motorcycle)	00	✓		✓													
16	R61	External Projection	00											✓	✓	✓			
17	R64	Temporary Spare Tyres (If fitted TPMS) *1	02								✓			✓					
18	R77	Parking Lamps (If fitted)	00								✓	✓	✓	✓	✓	✓	✓		



NO	UN	DESCRIPTION	SERIES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
19	R89	Speed Limitation Device (Mandatory for M2, M3, N2 and N3)	00								✓	✓	✓	✓	✓	✓			
20	R91	Side-marker Lamps (If fitted)	00								✓	✓	✓	✓	✓	✓	✓	✓	✓
21	R101	Emission of Carbon Dioxide and Fuel Consumption (Passenger Car) (For EEV only)	00								✓			✓					
22	R117	Tyres with regard to rolling sound emission* ²	02								✓	✓	✓	✓	✓	✓	✓	✓	✓
23	R119	Cornering Lamp (If fitted)	01								✓	✓	✓	✓	✓	✓			
24	R121	Hand Controls, Tell-tales and indications	00								✓	✓	✓	✓	✓	✓			

Legend:

*¹ Tyre repair kit is permitted subject to prior approval.

*² 2015: Accept Test Report and comply to Rolling Sound Emission Test only, 00 Series and 01 Series is acceptable.

2017: Full Certification and Test Report. Compliance to 02 Series.



ADDITIONAL 22 UN REGULATIONS IMPLEMENTATION FROM 01 JULY 2017

NO ■■	UN	DESCRIPTION	SER IES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
1	R9	Noise of Three-Wheeled Vehicle	07		✓			✓	✓										
2	R12	Steering Mechanism	04								✓			✓					
3	R27	Advance Warning Triangle (After Market)	04																
4	R47	Exhaust Emission (Moped)	00	✓	✓														
5	R56	Headlamps (Moped)	00	✓	✓														
6	R57	Headlamps (Motor Cycle)	02			✓	✓	✓	✓	✓									
7	R63	Noise (Moped)	01	✓															
8	R65	Special Warning Lamps (If fitted)	00	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
9	R72	Halogen Headlamps (HS1 for Motorcycle)	01			✓	✓	✓											
10	R74	Installation of Light (Moped)	01	✓															
11	R76	Headlamps (Moped)	01	✓	✓					✓									
12	R82	Halogen Headlamps (HS2 for Moped)	01	✓	✓					✓									
13	R85	Measurement of Engine Power	00								✓	✓	✓	✓	✓	✓			
14	R87	Daytime Running Light	00	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
15	R105	Vehicle for the Carriage of Dangerous Goods	05											✓	✓	✓	✓	✓	✓
16	R107	General Construction of Buses and Coaches	06									✓	✓						
17	R115	LPG and CNG Retrofit System (If fitted)	00									✓	✓	✓	✓	✓	✓		



NO	UN	DESCRIPTION	SERIES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
18	R123	Adaptive Front-Lighting Systems (AFS) (If fitted)	01								✓	✓	✓	✓	✓	✓			
19	R125	Forward Field of Vision of Drivers									✓								
20	R126	Partitioning Systems (If fitted)	00								✓								
21	R128	Light Emitting Diode (LED) Light Sources (If fitted)	00	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
22	R129	Enhanced Child Restraint Systems (ECRS) (If fitted or after market)	00																



ADDITIONAL 19 UN REGULATIONS IMPLEMENTATION FROM 01 JANUARY 2020

NO 番号	UN	DESCRIPTION	SERIES IES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
1	R29	Cabs of Commercial Vehicles ^{*1}	03											✓	✓	✓			
2	R31	Halogen Sealed Beam Headlamps (If fitted)	03								✓	✓	✓	✓	✓	✓			
3	R32	Rear-End Collision	00								✓								
4	R35	Arrangement of Foot Controls ^{*2}	00								✓								
5	R59	Replacement Silencing Systems (After market)	00								✓			✓					
6	R67	LPG Vehicles (If fitted)	01								✓	✓	✓	✓	✓	✓			
7	R68	Measurement of the Maximum Speed	00								✓			✓					
8	R88	Retroreflective Tyres (Motor Cycles)	00	✓															
9	R92	Replacement Silencing Systems (Motor Cycles) (After Market)	01	✓	✓	✓	✓	✓	✓										
10	R102	Close Coupling Device (CCD) (If fitted)	00												✓	✓		✓	✓
11	R103	Replacement Pollution Control Devices (After market)	00								✓			✓					
12	R110	CNG and LPG Vehicles (If fitted)	01								✓	✓	✓	✓	✓	✓			
13	R111	Rollover Stability (N and O Vehicles Category)	00											✓	✓			✓	✓
14	R114	Airbag Module for Replacement (After market)	00								✓	✓	✓	✓	✓	✓			
15	R118	Fire Resistance of Interior Materials	02									✓							
16	R124	Replacement Wheels for Passenger Cars (After market)	00								✓						✓	✓	



NO	UN	DESCRIPTION	SER IES	VEHICLE CATEGORIES															
				L1	L2	L3	L4	L5	L6	L7	M1	M2	M3	N1	N2	N3	O1	O2	O3
17	R127	Pedestrian Safety ^{*3}	00								✓			✓					
18	R130	Lane Departure Warning System (LDWS) (If fitted)	00									✓	✓		✓	✓			
19	R131	Advanced Emergency Braking Systems (AEBS) (If fitted)	01									✓	✓		✓	✓			

Legend:

*¹ Applicable to new cab model only. Existing model after 2 years.

*² Verification during VTA inspection. Test Report is not required.

*³ Applicable to new model only.



LAMPIRAN 1



IBU PEJABAT
JABATAN PENGANGKUTAN JALAN MALAYSIA,
BAHAGIAN KEJURUTERAAN AUTOMOTIF,
ARAS 2, BLOK D4, KOMPLEKS D,
PUSAT PENTADBIRAN KERAJAAN PERSEKUTUAN,
62620 PUTRAJAYA.

TEL : 03-88886400
FAX : 03-88905950
Emel : teknik@pj.gov.my

BORANG SENARAI SEMAK PERMOHONAN KELULUSAN JENIS KENDERAAN (VEHICLE TYPE APPROVAL)

NAMA PEMILIK/
PEMBAWA DOKUMEN : NO.K/P. :
ALAMAT :
NO. TELEFON / NO. H/P : Emel :
BUATAN KENDERAAN : MODEL :

BERIKUT DISERTAKAN DOKUMEN BAGI PERMOHONAN INI

(Tandakan yang disertakan)

1. Surat rasmi permohonan Kelulusan Jenis Kenderaan dari pemohon
2. Jadual I (Schedule I)
3. Jadual II (Schedule II)
4. Gambar kenderaan (pandangan hadapan, sisi dan belakang)
5. Penjelasan mengenai nombor casis dan enjin kenderaan (*Vehicle Identification Number*)
6. Sijil-sijil atau laporan ujian (*test report*) bagi setiap perkara dalam Jadual I (Schedule I)
7. Katalog (Brochure) / Spesifikasi teknikal kenderaan (*Presentation Slide*)
8. Surat Deklarasi Pemohon
9. Borang Maklumat Sijil Kelulusan Jenis Kenderaan
10. Lukisan kejuruteraan yang menunjukkan dimensi kenderaan
11. Salinan AP atau Laporan Kastam bagi kenderaan import (CBU)
12. Lain-lain (Cth: Sijil VTA dalam Bahasa Inggeris)

Saya dengan ini mengaku bahawa segala butiran yang dikemukakan di atas adalah benar serta bertanggungjawab sepenuhnya terhadap segala kemungkinan.

Tarikh: Tandatangan :
Nama / Syarikat :
Jawatan :

(UNTUK KEGUNAAN PEJABAT)

1. Petugas kaunter penerimaan dan penyerahan
2. Tarikh terima: No. Rujukan :
Permohonan Diterima / Ditolak *:
Tandatangan : Jawatan :

(Semua maklumat hendaklah dit lengkap untuk mempercepatkan proses kelulusan)



LAMPIRAN 2

Contoh surat rasmi permohonan VTA

LETTERHEAD SYARIKAT PEMOHON

Ruj. Kami :
Tarikh :

Pengarah
Bahagian Kejuruteraan Automotif
Ibu Pejabat Jabatan Pengangkutan Jalan Malaysia
Aras 2, Blok D4, Kompleks D
Pusat Pentadbiran Kerajaan Persekutuan
62620 Putrajaya

YBhg. Dato',

PERMOHONAN KELULUSAN JENIS KENDERAAN (VTA) BAGI KENDERAAN BUATAN XXX MODEL YYY (KOD MODEL: ABC12345) BAGI KATEGORI M1

Dengan segala hormatnya merujuk kepada perkara di atas.

2. Dimaklumkan bahawa pihak syarikat AAA ingin memohon Kelulusan Jenis Kenderaan (VTA) bagi kenderaan buatan XXX model YYY (Kod Model: ABC12345) bagi kategori M1.
3. Sehubungan itu, dilampirkan bersama dokumen permohonan VTA dalam 2 salinan untuk tindakan lanjut pihak YBhg. Dato'.
4. Kerjasama dan perhatian pihak YBhg. Dato' berhubung perkara ini amatlah dihargai.

Sekian terima kasih.

(NAMA WAKIL SYARIKAT)

Jawatan

Nama syarikat



LAMPIRAN 3

JADUAL I (SCHEDULE I)

Type Approval Performance Requirements (L - Motorcycles)

Item No.	Subject	National Acceptance (Construction & Use) Rules 1959	Actual Compliance (Performance)	Date of Approval
1	Reflector Performance	UN R3.02		
2	Direction Indicators	UN R6.01		
3	Front and Rear Position (Side) Lamps, Stop Lamps and End- Outline Marker	UN R7.02		
4	Radio Interference Suppression	UN R10.04		
5	Front Fog Lamps (If fitted)	UN R19.04		
6	Audible Warning Device	UN R28.00		
7	Filament Lamps	UN R37.03		
8	Rear Fog Lamps	UN R38.00		
9	Speedometer	UN R39.00		
10	Exhaust emission	Peraturan-Peraturan Kualiti Alam Sekeliling (Kawalan Pelepasan Daripada Enjin Petrol) 1996. UN R40 (DOE)		



11	Noise emission	Peraturan-Peraturan Kualiti Alam Sekeliling (Bunyi Bising Kenderaan Motor) 1987. UN R41 (DOE)		
12	Headlamp Cleaners	UN R45.01		
13	Lights	UN R50.00		
14	Installation of Lights	UN R53.01		
15	Driver Operated Control (Motorcycle)	UN R60.00		
16	Protection Against Unauthorised Use	UN R62.00		
17	Tyres	MS 1394 UN R75.00		
18	Brake Performance	UN R78.03		
19	Rear View Mirrors	UN R81.00		
20	Gas Discharge Head Lamp	UN R98.01		
21	Headlamps	UN R112.01 / R113.00		
22	Electric Motorcycle - Specifications	MS 2413		



LAMPIRAN 4

JADUAL I (SCHEDULE I)

Type Approval Performance Requirements (M – Passenger Vehicle)

Item No.	Subject	National Acceptance (Construction & Use Rules 1959)	Actual Compliance (Performance)	Date of approval
1	Reflex Reflectors	UN R3.02		
2	Rear Registration Plate Lamp	UN R4.00		
3	Indicator Performance	UN R6.01		
4	Brake lamp performance	UN R7.02		
5	Radio Interference Suppression	UN R10.04		
6	Door Latches and Hinges (M1 only)	UN R11.03		
7	Brake performance	UN R13.11 / R13H.00		
8	Safety Belt Anchorages	UN R14.06		
9	Exhaust Emission	Peraturan-Peraturan Kualiti Alam Sekeliling (Kawalan Pelepasan Daripada Enjin Petrol/Diesel) 1996. UN R15 / R24 / R49 / R83 (DOE)		
10	Safety Belt	MS 1175 UN R16.06		



11	Seats	UN R17.07 / R80.02		
12	Protection Against Unauthorised Use	MS 1742 UN R18.03 / R97.01 / R116.00		
13	Front Fog Lamps (If fitted)	UN R19.04		
14	Interior Fittings (M1 only)	UN R21.01		
15	Reversing Lamps	UN R23.00		
16	Head Restraint	UN R25.04		
17	External Projection (M1 only)	UN R26.03		
18	Audible Warning Device	UN R28.00		
19	Tyres	MS 149 MS 224 (Retreaded) UN R30.02 / R54.00 UN R108.00 / R109.00 (Retreaded) FMVSS 109		
20	Prevention of Fire Risks	UN R34.02		
21	Construction of Public Service Vehicles	UN R36.03 / R52.01		
22	Filament Lamps	UN R37.03		
23	Rear Fog Lamps	UN R38.00		



24	Speedometer	UN R39.00		
25	Safety Glass	MS 595 UN R43.00		
26	Headlamp Cleaners	UN R45.01		
27	Rear View Mirrors	UN R46.02		
28	Installation of Lights	MS ISO 303 UN R48.06 (HID) UN R48.03 (Other Lights)		
29	Noise Emission	Peraturan-Peraturan Kualiti Alam Sekeliling (Bunyi Bising Kenderaan Motor) 1987. UN R51 (DOE)		
32	Mechanical Coupling	UN R55.01		
33	Temporary Spare Tyres (if fitted) (M1 only)	UN R64.02		
34	Strength of Super Structure (Large Passenger Vehicle) (M2 & M3 only)	UN R66.02		
35	Parking Lamps (If fitted)	UN R77.00		
36	Steering Equipment	UN R79.01		
37	Speed Limitation Device (Mandatory for M2, M3)	UN R89.00		
38	Side-marker Lamps (If fitted)	UN R91.00		



39	Protection of the Occupants in the Event of a Frontal Collision (M1 only)	UN R94.02		
40	Protection of the Occupants in the Event of a Lateral Collision (M1 only)	UN R95.03		
41	Gas Discharge Headlamps / Light Source (HID)	UN R98.01 / R99.00		
42	Construction of Battery Electric Vehicle	UN R100.00		
43	Emission of Carbon Dioxide and Fuel Consumption (EEV only)	UN R101.01		
44	Headlamps (Asymmetrical)	UN R112.01		
45	Tyres with regard to rolling sound emission	UN R117.02		
46	Cornering Lamp (If fitted)	UN R119.01		
47	Hand Controls, Tell-tales and indications	UN R121.00		



LAMPIRAN 5

JADUAL I (SCHEDULE I)

Type Approval Performance Requirements (G/N – Machinery/Commercial Vehicle)

Item No.	Subject	National Acceptance (Construction & Use Rules 1959)	Actual Compliance (Performance)	Date of Approval
1	Power to weight ratio	Rule of the motor vehicle (C&U) 1959. (Minimum 6hp/t)		
2	Reflex Reflectors	UN R3.02		
3	Rear Registration Plate Lamp	UN R4.00		
4	Indicator Performance	UN R6.01		
5	Brake Lamp Performance	UN R7.02		
6	Radio Interference Suppression	UN R10.04		
7	Door Latches and Hinges (N1 only)	UN R11.03		
8	Brake Performance	UN R13.11 / R13H.00		
9	Safety Belt Anchorages	MS 75 UN R14.06		
10	Exhaust emission (Petrol/LPG/CNG engine)	Peraturan-Peraturan Kualiti Alam Sekeliling (Kawalan Pelepasan Daripada Enjin Petrol) 1996. UN R15 / R83 (DOE)		
11	Safety Belts	MS 1175 UN R16.06		



12	Seats	UN R17.07		
13	Protection Against Unauthorised Use	MS 1742 UN R18.03 / R97.01 / R116.00		
14	Front Fog Lamps (If fitted)	UN R19.04		
15	Reversing Lamps	UN R23.00		
16	Smoke emission (Diesel Engine)	Peraturan-Peraturan Kualiti Alam Sekeliling (Kawalan Pelepasan Daripada Enjin Diesel) 1996. UN R24 / R49 (DOE)		
17	Head Restraint	UN R25.04		
18	Audible Warning Device	UN R28.00		
19	Tyres	MS 1394 MS 224 (Retreaded) UN R30.02 / R54.00 UN R108.00 / R109.00 (Retreaded) FMVSS 119		
20	Prevention of Fire Risks	UN R34.02		
21	Filament Lamps	UN R37.03		
22	Rear Fog Lamps	UN R38.00		
23	Speedometer	UN R39.00		



24	Safety Glass	UN R43.00		
25	Headlamp Cleaners	UN R45.01		
26	Rear View Mirrors	UN R46.02		
27	Installation of Lights	MS ISO 303 UN R48.06 (HID) UN R48.03 (Other Lights)		
28	Noise Emission	Peraturan-Peraturan Kualiti Alam Sekeliling (Bunyi Bising Kenderaan Motor) 1987. UN R51 (DOE)		
29	Mechanical Coupling	UN R55.01		
30	Rear Underrun Protection	UN R58.02		
31	External Projection	UN R61.00		
32	Temporary Spare Tyres (If fitted) (N1 only)	UN R64.02		
33	Rear Marking Plates for Slow Moving Vehicles	UN R69.01		
34	Rear Marking Plates for Heavy and Long Vehicles	UN R70.01		
35	Lateral Protection	UN R73.01		
36	Parking Lamps (If fitted)	UN R77.00		



37	Steering Equipment	UN R79.01		
38	Speed Limitation Device (Mandatory N2 & N3)	UN R89.00		
39	Side-marker Lamps (If fitted)	UN R91.00		
40	Front Underrun Protection	UN R93.00		
41	Protection of the Occupants in the Event of a Lateral Collision (N1 only)	UN R95.03		
42	Gas-Discharge Headlamps / Light Source (HID)	UN R98.01 / R99.00		
43	Battery Electric Vehicles (If any)	UN R100.00		
44	Emission of Carbon Dioxide and Fuel Consumption (EEV only)	UN R101.01		
45	Retro-reflective Markings for Heavy and Long Vehicles	MS 828 UN R104.00		
46	Head Lamp Performance (Asymmetrical)	UN R112.01		
47	Tyres with regard to rolling sound emission	UN R117.02		
48	Cornering Lamp (If fitted)	UN R119.01		
49	Hand Controls, Tell-tales and indications	UN R121.00		



LAMPIRAN 6

JADUAL I (SCHEDULE I)

Type Approval Performance Requirements (O – Trailer/Semi Trailer)

Item No.	Subject	National Acceptance (Construction & Use Rules 1959)	Actual Compliance (Performance)	Date of Approval
1	Reflex Reflectors	UN R3.02		
2	Rear Registration Plate Lamp	UN R4.00		
3	Indicator Performance	UN R6.01		
4	Brake lamp performance	UN R7.02		
5	Radio Interference Suppression	UN R10.04		
6	Brake performance	UN R13.11		
7	Reversing Lamps	UN R23.00		
8	Tyres	MS 1394 MS 224 (Retreaded) UN R30.02 / R54.00 UN R108.00 / R109.00 (Retreaded) FMVSS 119		
9	Prevention of Fire Risks	UN R34.02		
10	Filament Lamps	UN R37.03		
11	Rear Fog Lamps	UN R38.00		



12	Installation of Lights	MS ISO 303 UN R48.06 (HID) UN R48.03 (Other Lights)		
13	Mechanical Coupling (Articulated)	UN R55.01		
14	Rear Underrun Protection	UN R58.02		
15	Rear Marking Plates for Slow Moving Vehicles	UN R69.01		
16	Rear Marking Plates for Heavy and Long Vehicle	UN R70.01		
17	Lateral Protection (Goods Vehicles)	UN R73.01		
18	Side-marker Lamps (if fitted)	UN R91.00		
19	Retro-Reflective Markings For Heavy and Long Vehicles	MS 828 UN R104.00		
20	Tyres with regard to rolling sound emission	UN R117.02		



LAMPIRAN 7

JADUAL I (SCHEDULE I)

Type Approval Performance Requirements (Rebuilt Vehicle)

Item No.	Subject	National Acceptance (Construction & Use Rules 1959)	Actual Compliance (Performance)	Date of Approval
1	Power to weight ratio	Rule of the motor vehicle (C&U) 1959. (Minimum 6hp/t)		
2	Indicator Performance	UN R6.01		
3	Brake Lamp Performance	UN R7.02		
4	Tyres	MS 1394 MS 224 (Retreaded) UN R30.02 / R54.00 UN R108.00 / R109.00 (Retreaded) FMVSS 119		
5	Safety Glass	UN R43.00		
6	Head Lamp Performance	UN R112.01		
7	Rear Underrun Protection	UN R58.02		
8	Rear Marking Plates for Heavy and Long Vehicles	UN R70.01		
9	Lateral Protection	UN R73.01		
10	Front Underrun Protection	UN R93.00		



LAMPIRAN 8

JADUAL II (SCHEDULE II)

APPLICATION FOR TYPE APPROVAL OF MOTOR VEHICLE

Reference No :

Date of submission.

Part 1: General Information

1. Applicant's name and address

2. Make (Manufacturer) : _____

Model Name : _____

Model Code : _____

Model Year : _____

3. Type and configuration body :

4. Country of manufacture

5. Proposed usage



Part II. Specifications

(*) Please state/specify performance standard according to MS/ UNR/ FMVSS

1. Dimensions

- (a) Overall length (mm) _____
- (b) Overall width (mm) _____
- (c) Overall height (mm) _____
- (d) Wheel base (mm)
- i. Between first and second axles _____
 - ii. Between second and third axles _____
 - iii. Between third and fourth axles _____
- (e) Ground clearance (mm)
- i. Unladen _____
 - ii. Fully laden _____
- (f) Wheel treads (mm)
- i. Front axles _____
 - ii. Rear axles _____
- (g) Body overhang (mm)
- i. Front end _____
 - ii. Rear end _____
- (h) Chassis frame overhang (mm)
(For chassis-cab model)
- i. Front end _____
 - ii. Rear end _____



(i) Minimum turning circles (mm)	
i. Kerb to kerb	_____
ii. Body to body	_____
(j) Gravity height (mm)	_____
2. Weight	
(a) Kerb Weight (kg)	
i. Front axles	_____
ii. Rear axles	_____
(b) Number of axles	_____
(c) Axle Rating	
i. Front axles (kg)	_____
ii. Rear first axles (kg)	_____
iii. Rear second axles (kg)	_____
(d) Design gross vehicle weight (kg)	_____
3. Maximum stable inclination angle	_____
4. Seating capacity (person)	_____
5. Drive: Front wheel/Rear wheel/4 wheel	_____
6. Spacing for the display of registration number plate:	
Motorcycle :	
Front / Rear (Min 145 mm x 150 mm) – vertical	_____
Front / Rear (Min 295 mm x 50 mm) – horizontal	_____
Other Than Motorcycle :	
Front / Rear (Min 280 mm x 200 mm) – vertical	_____
Front / Rear (Min 450 mm x 90 mm) – horizontal	_____
7. Engine	
(a) Name of producer	_____



- (b) Type and model _____
- (c) Position of mounting _____
- (d) Type of fuel _____
- (e) Engine capacity _____
- (f) Cycle _____
- (g) No of cylinder _____
- (h) Cylinder arrangement _____
- (i) Bore X Stroke _____
- (j) Piston Displacement _____
- (k) Valve arrangement _____
- (l) Compression ratio _____
- (m) Max. net power (KW @ r.p.m.) _____
- (n) Max. net torque (kN m @ r.p.m) _____
- (o) Type of supercharger or turbocharger _____
- (p) Emission gas control system _____
- (q) Lubricating system
- (i) Lubricating method _____
- (ii) Type of oil pump _____
- (iii) Type of oil filter _____
- (iv) Capacity of lubricating oil (l) _____
- (v) Type of oil cooler _____
- (r) Cooling system
- (i) Cooling method _____
- (ii) Type of radiator _____
- (iii) Capacity of cooling water _____
- (iv) Type of water pump _____
- (v) Type of thermostat _____



(s) Fuel Consumption _____

7A. Electric Motor (Hybrid or Electric Only)

- (a) Name of producer _____
- (b) Type and model _____
- (c) Position of mounting _____
- (d) Motor Power (Maximum) (KW) _____
- (e) Motor Power (Rated) (KW) _____
- (f) Max. net torque (kN m) _____
- (g) Type of supercharger or turbocharger _____
- (h) Battery Type _____
- (i) Battery Capacity _____
- (h) Battery Consumption (Wh / 100 km) _____

8. Fuel system

- (a) Fuel tank
- (i) Material _____
- (ii) Capacity (litre) _____
- (iii) Position _____
- (b) Fuel Pump
- (i) Type _____
- (ii) Flow rate _____
- (c) Fuel Filter
- (i) Type _____
- (ii) Flow rate _____
- (d) Fuel Injection
- (i) Type _____



(ii)	Model	_____
(iii)	Method	_____
(e)	Carburetor	
(i)	Type	_____
(ii)	Diameter of throttle valve (mm)	_____
(iii)	Diameter of venture (mm)	_____
(iv)	Type of choke valve	_____
(f)	Air cleaner	
(i)	Type	_____
(ii)	Number	_____
(g)	LPG/NGV/CNG equipment	
(i)	Make and Model of LPG/NGV/CNG kit	_____
(ii)	Make and model of container	_____
(iii)	Capacity of container	_____
(iv)	Location of container	_____
(v)	Supplier and authorised installer	_____
9.	Transmission system	
(a)	Type of clutch	_____
(b)	No. of speed	_____
(c)	Type of transmission	_____
(d)	Torque convertor pressure	_____
(e)	Gear ratio (to 1)	
	1 st gear	_____
	2nd gear	_____
	3rd gear	_____
	4th gear	_____
	5th gear	_____



6th gear	_____
Reverse gear	_____
Differential gear	_____
Wheel hub reduction	_____
10. Running system	
(a) Front axle type	_____
(b) Rear axle type	_____
(c) Tyre size	
(i) Front tyre	_____
(ii) Rear tyre	_____
(iii) Spare tyre	_____
(d) Rim specification	
(i) Front wheel (size & material)	_____
(ii) Rear wheel (size & material)	_____
(iii) Spare wheel (size & material)	_____
(e) Optional tyre and rim size	
(i) Front wheel	_____
(ii) Rear wheel	_____
(iii) Spare wheel	_____
(f) Air pressure	
(i) Front wheel	_____
(ii) Rear wheel	_____
(iii) Spare wheel	_____
(g) Ply rating	
(i) Front wheel	_____
(ii) Rear wheel	_____
(iii) Spare wheel	_____



- (h) Maximum load on tyre
- (i) Front wheel _____
- (ii) Rear wheel _____
- (iii) Spare wheel _____

11. Suspension system

- (a) Front axle
- (i) Type of suspension _____
- (ii) Type of spring _____
- (iii) Material of spring _____
- (iv) Dimensions of main spring _____
- (v) Number of main spring _____
- (vi) Dimensions of auxiliary spring _____
- (vii) Number of auxiliary spring _____
- (b) Rear axle
- (i) Type of suspension _____
- (ii) Type of spring _____
- (iii) Material of spring _____
- (iv) Dimensions of main spring _____
- (v) Number of main spring _____
- (vi) Dimensions of auxiliary spring _____
- (vii) Number of auxiliary spring _____
- (c) Type of shock absorber
- (i) Front wheel _____
- (ii) Rear wheel _____
- (iii) Name of producer _____
- (d) Type of stabilizer



- (i) Front wheel _____
- (ii) Rear wheel _____
- (iii) Name of producer _____

12. Steering System

- (a) Steering wheel positions (LHS/RHS) _____
- (b) Front wheel alignment
 - (i) Amount of side slip _____
- (c) Booster
 - (i) Type _____
 - (ii) Name of producer _____
- (d) Locking device
 - (i) Type _____
 - (ii) Name of producer _____
 - (iii) Mounting position _____

13. Brake System

- (a) Service brake (Attached test report for service brake)
 - (i) Type
 - Front _____
 - Rear _____
 - (ii) Size of brake _____
 - (iii) Control system and
 - No. of braking wheel _____
 - (iv) Brake pipes/hoses
 - Material _____
 - (v) Booster
 - Type _____



(a) Braking system (if any)	-Magnification _____
(vi) Braking efficiency	-Front _____
	-Rear _____
(vii) Other safety device incorporated (ABS/SLIPS/LSD or others)	_____
(b) Parking brake (Attached test report for service brake)	
(i) Type	_____
(ii) Braking efficiency	-Front _____
	-Rear _____
(c) Auxiliary brake (if any)	
(i) Type	_____
(ii) Performance*	_____
(d) Emergency brake (if any)	
(i) Type	_____
(ii) Performance*	_____
(e) Separate brake (if any)	
(i) Type	_____
(ii) Performance*	_____
14. Chassis frame	
(a) Type	_____
(b) Cross section dimension	_____
(c) Type of material	_____
(d) Type of side protection device	_____
(e) Sample of chassis code number	_____
15. Body	



(a) Type _____

(d) Any back protection device _____

16. Equipment for passengers

(a) Seat belt anchorage

(i) Type _____

(ii) Number _____

(iii) Performance* _____

(b) Safety Belt

(i) Name of producer _____

(ii) Type _____

(iii) Number _____

(iv) Performance* _____

(c) Head restraint

(i) Name of producer _____

(ii) Type _____

(iii) Number _____

(iv) Performance* _____

(d) Doors

(i) Type _____

(ii) Number _____

(iii) Performance* _____

17. Glass

(a) Front windscreen

(i) Name of producer _____

(ii) Kind/Type of glass _____

(iii) Thickness _____



(iv)	% of light transmission	_____
(v)	Performance*	_____
(b)	Side windows	
(i)	Name of producer	_____
(ii)	Kind/Type of glass	_____
(iii)	Thickness	_____
(iv)	% of light transmission	_____
(v)	Performance*	_____
(c)	Rear screen	
(i)	Name of producer	_____
(ii)	Kind/Type of glass	_____
(iii)	Thickness	_____
(iv)	% of light transmission	_____
(v)	Performance*	_____

18. Noise prevention device

(a)	Silencer	
(i)	Name of product	_____
(ii)	Type	_____
(iii)	Number	_____
(b)	Noise level (dBA)	
(i)	Stationary	
	(Attached test report and method test)	_____
(ii)	Accelerated running	
	(Attached test report and method test)	_____
(iii)	Performance*	_____



19. Exhaust emission control device (Attached test report)

- (a) Type _____
- (b) Position and direction _____
of exhaust pipe opening _____
- (c) HSU level/K Value/Opacimeter Value _____
(free accelerated test) _____
- (d) Performance* _____

20. Electrical System

- (a) Operating voltage _____
- (b) Type of Ignition system _____
- (c) Type of electric wave noise suppression
or prevention device _____
- (d) Spark Plug
(i) Type _____
(ii) Gap _____
- (e) Battery capacity (AH) _____
- (f) Charging system
(i) Type _____
(ii) Output _____
- (g) Starting system
(i) Type _____
(ii) Output _____
- (h) Immobilizer
(i) Type _____
(ii) Performance* _____



21. Lighting equipment

(a) Head lamps

- | | | |
|-------|--|-------|
| (i) | Name of producer | _____ |
| (ii) | Type | _____ |
| (iii) | Numbers, colour ...watts | _____ |
| (iv) | Automatic or manual
low and high adjuster | _____ |
| (v) | Performance* | _____ |

(b) Front fog lamps

- | | | |
|------|--------------------------|-------|
| (i) | Name of producer | _____ |
| (ii) | Numbers, colour ...watts | _____ |
| (vi) | Performance* | _____ |

(c) Front turning lamps

- | | | |
|-------|--------------------------|-------|
| (i) | Name of producer | _____ |
| (ii) | Type | _____ |
| (iii) | Numbers, colour ...watts | _____ |
| (iv) | Rate of flashing | _____ |
| (v) | Performance* | _____ |

(d) Front side turning lamps

- | | | |
|-------|--------------------------|-------|
| (i) | Name of producer | _____ |
| (ii) | Type | _____ |
| (iii) | Numbers, colour ...watts | _____ |
| (iv) | Performance* | _____ |



(e)	Daytime running lamps	
(i)	Name of producer	_____
(ii)	Type	_____
(iii)	Numbers, colour ...watts	_____
(iv)	Performance*	_____
(f)	Rear reflex reflector	
(i)	Name of producer	_____
(ii)	Type	_____
(iii)	Numbers, colour ...watts	_____
(iv)	Performance*	_____
(g)	High mount stop lamps (3rd brake light)	
(i)	Name of producer	_____
(ii)	Type	_____
(iii)	Numbers, colour ...watts	_____
(iv)	Performance*	_____
(h)	Tail lamps	
(i)	Name of producer	_____
(ii)	Type	_____
(iii)	Numbers, colour ...watts	_____
(iv)	Performance*	_____
(i)	Stop lamps	
(i)	Name of producer	_____
(ii)	Type	_____
(iii)	Numbers, colour ...watts	_____
(iv)	Performance*	_____



(j) Rear turning lamps	
(i) Name of producer	_____
(ii) Type	_____
(iii) Numbers, colour ...watts	_____
(iv) Performance*	_____
(v) Rate of flashing	_____
(k) Hazard light (front/rear)	
(i) Name of producer	_____
(ii) Type	_____
(iii) Numbers, colour ...watts	_____
(iv) Performance*	_____
(v) Rate of flashing	_____
(l) Reversing lamps	
(i) Name of producer	_____
(ii) Type	_____
(iii) Number and colour	_____
(iv) Performance*	_____
(m) Parking lamps	
(i) Name of producer	_____
(ii) Type	_____
(iii) Numbers, colour ...watts	_____
(iv) Performance*	_____
(n) License lamps (front/rear)	
(i) Name of producer	_____
(ii) Type	_____
(iii) Numbers, colour ...watts	_____



(iv) Performance*	_____
(o) Rear fog lamps	
(i) Name of producer	_____
(ii) Type	_____
(iii) Numbers, colour ...watts	_____
(iv) Performance*	_____
(p) Rear side marker lamps	
(i) Name of producer	_____
(ii) Type	_____
(iii) Numbers, colour ...watts	_____
(iv) Performance*	_____
(q) Filament lamps	
(i) Name of producer	_____
(ii) Type	_____
(v) Numbers, colour,.....watts	_____
(iv) Performance*	_____
22. Warning device	
(a) Horn	
(i) Name of producer	_____
(ii) Type	_____
(iii) Level of loudness	_____
(iv) Performance*	_____
23. Rear view mirror (Automatic or manual adjustment)	
(a) Left	
(i) Type	_____
(ii) Dimension and radius curvature	_____



- (b) Right
- (i) Type _____
(ii) Dimension and radius curvature _____
- (c) Inside
- (i) Type _____
(ii) Dimension and radius curvature _____
(iii) One way or two ways adjustment _____
24. Wipers
- (a) Type _____
(b) Number _____
(c) Performance* _____
25. Meters and dash board
- (a) Speedometer
- (i) Type _____
(ii) Maximum Speed _____
(ii) Performance* _____
- (b) Tachometer
- (i) Type _____
(ii) Performance* _____
- (c) Odometer
- (i) Type _____
(ii) Performance* _____
- (d) Other meter fitted
- (i) Type _____
(ii) Performance* _____



26. Maximum Speed (With Speed Limiter – If fitted) _____
27. Other accessories fitted
- (a) _____
- (b) _____
- (c) _____
- (d) _____
- (e) _____

* Standard Compliance



Part III. Declaration

The following documents shall be submitted:-

1. Chassis frame strength calculation (**For Chassis Joint only**).

The strength calculation shall be attached.

Please specify the standard adopted.

Note: The measurement by strain gauge etc. may be substituted for strength calculation.

2. Test data/ reports to be attached

The test data/ report as per the requirement as stipulated in schedule 1 of the motor vehicles (Type Approval and Recalling) rules 1998 shall be attached.

I hereby certify that to the best of my knowledge, the above information are correct and I fully understand that should any of the above information is found to untrue, the application may be rejected or the type approval certificate, if issued, may be cancelled or suspended.

Date:

(Signature)

Name:

Position:



LAMPIRAN 9

Gambar kenderaan bagi permohonan VTA



Pandangan 3D



Pandangan Hadapan



Pandangan Sisi



Pandangan Belakang



LAMPIRAN 10

CONTOH PENJELASAN VIN DAN NOMBOR ENJIN

PENJELASAN VIN:

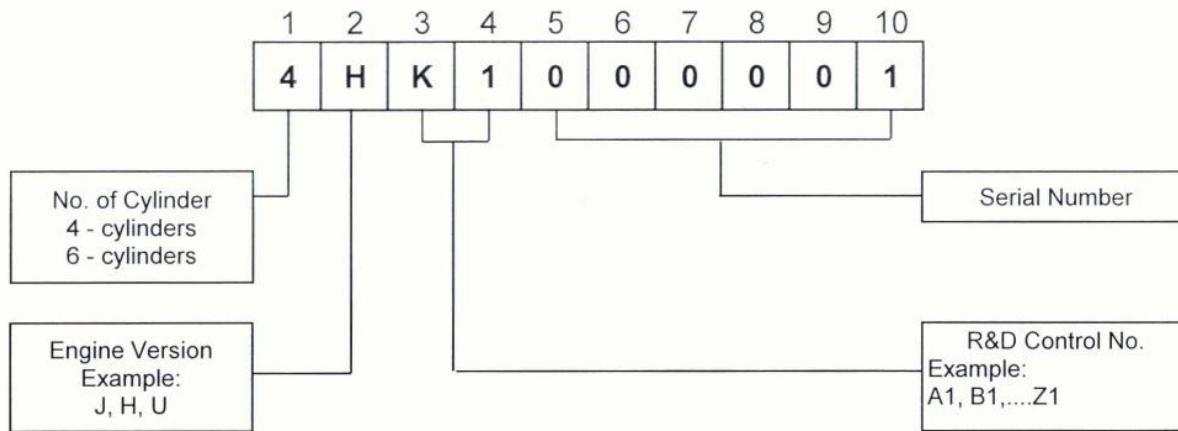
WPO ZZZ 98 Z C S 1 0 0001

1 2 3 4 5 6 7 8 9

- | | |
|-----|---|
| 1 | Welt-Herstellercode / Worldwide Manufacturer code |
| 2+4 | Füllzeichen / Filler Symbol |
| 3+7 | Fahrzeugtyp / Vehicle Type |
| 5 | Modelljahr / Model Year |
| 6 | Herstellungsort / Location of Production |
| 8 | Variantenspezifische Information / Variant Specific Information |
| 9 | Serienzählnummer / Production Number |

PENJELASAN NOMBOR ENJIN:

Explanation of Engine Number





LAMPIRAN 11

Contoh Sijil Pematuhan Peraturan UN



THE UNITED KINGDOM VEHICLE APPROVAL AUTHORITY

COMMUNICATION CONCERNING THE APPROVAL GRANTED⁽¹⁾, APPROVAL EXTENDED⁽²⁾,
APPROVAL REFUSED⁽³⁾, APPROVAL WITHDRAWN⁽⁴⁾, PRODUCTION DEFINITELY
DISCONTINUED⁽⁵⁾ OF A TYPE OF VEHICLE WITH REGARD TO THE MOUNTING OF DEVICES FOR
INDIRECT VISION PURSUANT TO REGULATION NO. 46.02

E11

Approval No: 46R-028071

Extension No: Not applicable

Reason for extension: Not applicable

1. Make (trade name of manufacturer):



2. Type and general commercial description(s):

3. Means of identification of type, if marked on the vehicle: Not applicable

3.1. Location of that marking: Not applicable

4. Category of vehicle: M1

5.

6. Address(es) of the production plant(s)





LAMPIRAN 12

Contoh Katalog / Brochure

DRIVETRAIN	Fuel type	Diesel/Electric
	Cubic capacity (cc)	1997
	Maximum power bhp (Kw)	163 (120) @ 3850 (Diesel) 37 (27) @ 2000to 7500 (Electric)
	Maximum torque lb/ft (Nm)	225 (300) @ 1750 (Diesel) 150 (200) (Electric)
	Induction	Turbocharger
	Gearbox	6 speed Electronically Controlled Manual Gearbox (EGC)
BRAKES	Front and rear discs	
SUSPENSIONS AND TYRES	Front suspension	Pseudo MacPherson with helical springs and dampers
	Rear suspension	Multi-arm with helical springs and multi-valve dampers
	Size - 18" wheels (Alloy)	245/45 R 18
	Spare wheel	Repair Kit
FUEL TANK CAPACITY (Ltrs)	72	
PERFORMANCE (driver only)	Maximum speed (mph)	132
	Acceleration 0-62 mph (sec)	9.5
FUEL CONSUMPTION	Urban drive cycle MPG (litres/100km)	70.6 (4)
	Extra Urban drive cycle MPG (litres/100km)	67.3 (4.2)
	Combined drive cycle MPG (litres/100km)	68.9 (4.1)
EMISSIONS INFORMATION	Regulated Emission Standard	Euro 5
	Carbon Dioxide (CO ₂) emissions (g/km)	107
VEHICLE WEIGHT INFORMATION (KG)	Gross vehicle weight	2325
	Kerb weight	1910
	Gross train weight	3125
	Maximum braked trailer weight	1100
	Maximum tow ball weight	75
DIMENSIONS (mm)	Length	4823
	Width at handles/mirrors folded/mirrors unfolded	1864/1920/2068
	Maximum height	1525
	Wheelbase	2815
	Front wheel track	1592
	Rear wheel track	1564
	Boot volume (dm ³) with rear seats in place to parcel shelf VDA/Litres	400/423
	Height of boot under parcel shelf at Row 2 seat back	422
	Load floor length - rear seats in place	1021
	Minimum load floor width	1376



LAMPIRAN 13



PERJANJIAN UNTUK KELULUSAN JENIS KENDERAAN (VTA) DAN HOMOLOGASI

Saya dengan ini mengisyiharkan bahawa semua maklumat yang dikemukakan didalam permohonan saya adalah benar dan saya faham sepenuhnya bahawa sekiranya sebarang maklumat didapati palsu, permohonan saya akan ditolak atau sekiranya sijil kelulusan jenis telah dikeluarkan, ianya akan dibatalkan.

Saya dengan ini bersetuju untuk membenarkan Jabatan Pengangkutan Jalan (JPJ) Malaysia mengenakan sebarang tindakan berdasarkan Akta Pengangkutan Jalan 1987 sekiranya terdapat maklumat / pengisyiharaan saya didapati palsu.

Bagi tujuan kelulusan :

- (i) Saya dengan ini bersetuju untuk menanggung semua kos bagi tujuan pemeriksaan / kelulusan permohonan saya.
- (ii) Saya bersedia untuk menanggung semua kos yang disebabkan oleh kerosakan teknikal kenderaan sepanjang tempoh pemeriksaan dan tidak akan mengambil tindakan undang-undang terhadap pihak JPJ.
- (iii) Saya dengan ini bersetuju untuk memaklumkan kepada Jabatan Pengangkutan Jalan (JPJ) Malaysia sebarang perubahan / pengubahsuaian dalam masa selewat-lewatnya 14 hari selepas pengubahsuaian dilakukan secara bertulis.
- (iv) Saya dengan ini bersetuju untuk memenuhi apa jua keperluan yang telah ditetapkan bagi tujuan kelulusan permohonan saya.

Pemohon:	Saksi:		
Tandatangan:	Tandatangan:		
Nama:		Nama:	
Jawatan:		Jawatan :	
Cop Rasmi :		Cop Rasmi :	
Tarikh :		Tarikh :	



LAMPIRAN 14



BORANG MAKLUMAT SIJIL KELULUSAN JENIS KENDERAAN (VEHICLE TYPE APPROVAL)

BUATAN	
NAMA MODEL	
KOD MODEL	
MODEL TAHUN	
JENIS / PREFIX NOMBOR ENJIN/ MOTOR ELEKTRIK /,Cylinder,Stroke
KAPASITI / KUASA ENJIN (KW)	
BAHAN BAKAR (RON)	
BILANGAN TEMPAT DUDUK	
TRANSMISI (Speed)	
JENIS BADAN	
KEGUNAAN	
KOD BUATAN	
NEGARA PEMBUAT (CBU/CKD)	
NAMA & ALAMAT PEMOHON	

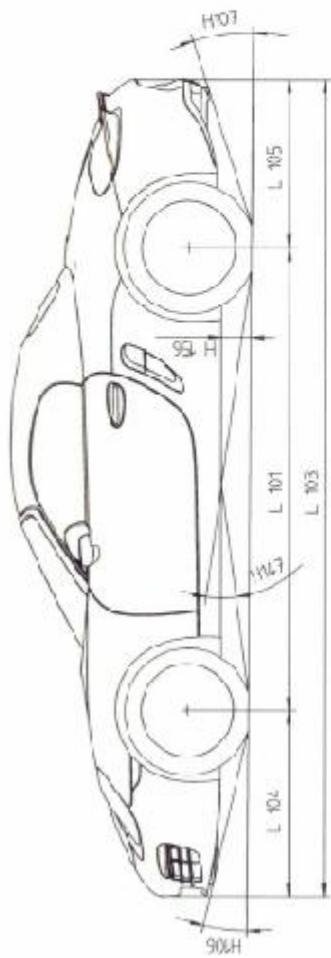
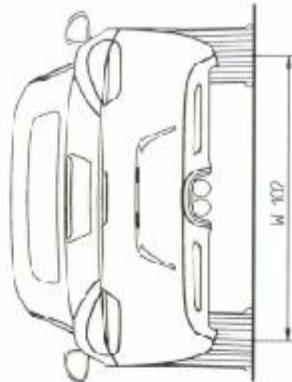
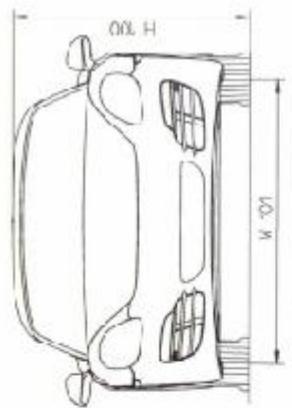
Pengesahan Syarikat:

.....
(Nama Syarikat:)



LAMPIRAN 15

Contoh Lukisan Kejuruteraan



a13*20074651-85*C2
Société Nationale de Certification et d'Inspection
L-3201 SANDWEILER (Luxembourg)
Organisme accredité OLAS EN45011



LAMPIRAN 16

Contoh Salinan AP / Laporan Kastam

Lembar Pengakuan ini diketahui dan perkenan di buat oleh Petahil Kastam (Lantungan Melayutang) Imbu (1) 1967 The document is issued by a customs officer in accordance with Section 19(1) of Customs Act 1967									
JK 69					S E N D I R I				
Kontinent (Name and Address) Country (Name and Address)					Kod Kontinent/Continent Code				
Kontinent (Name and Address) Country (Name and Address)					Kod Kontinent/Continent Code				
Agen Yang Diberi Kuasa (Name and Address) Authorised Agent (Name and Address)					Kod Agen/Agent Code				
Cara Pengangkutan/Mode of Transport 1. Laut/Shipping 2. Kereta/Train 3. Jalan/Road/4. Udara/Air 5. Pau/Marit 6. Motosikal/Motorcycle 7. Sepetong Kapal/Ferry Boat/Vessel 8. Posmen/Postman/9. Tidak dikenal/Unknown					Kod Cara/Pelabuhan/Port/Country Code e.g. R.O.B (R.O.C. etc)				
Tujuan Import/Purpose of Import 1. Peribadi/Private 2. Perniagaan/Business 3. Penyelidikan/Research 4. Pameran/Exhibition 5. Latih-latih (mekanikal) (other) (Specify)					Kod Tujuan/Kod Tujuan				
14. Bil. No.					15. Keterangan Perihal Barang/Description of Goods in Part				
MERCEDES BENZ 250SL CHASIS NO.: 113 043 12 002303 ENGINE NO.: 129982 12 001115					2496 CC				
16. Nombor Tarif/Kod Tarif/Tariff No.					17. Unit Tarif/Tariff Unit				
18. Kuantiti/Quantity					19. Harga Satu Unit RM/L (RM0) One Unit C.I.F (RM0)				
1					20. Jumlah Nombor H.I.T. (RM) Total Value C.I.F (RM)				
UNTUK KEGUNAAN RASMI/FOR OFFICIAL USE									
Bahan Pengakuan: Lesen (Name dan Alamat/Licence Issuing Office (Name and Address)) KEMENTERIAN PERdagangan ANTARABANGSA DAN INDUSTRI									
DILULUSKAN KEPADA SIRIM JEANNE VENDARGOS Tarikh/Tarikh/Date									
25. No Lesen/License No. N07121101031452014									
26. No Rajukian/Reference No. HIT141101031452014									
27. Tarikh Tempoh/Term of Expiry 08.07.2014									
28. Tarikh/Date 09.01.2014									
29. Tarikh/Date 09.01.2014									
30. Tarikh/Date 09.01.2014									
31. Tarikh Import/Date of Import 22/01									
32. No. Butang Pengakuan Kastam/ Custom Declaration Form No. J5101007157/14									
33. Jumlah Import/ Total Import (Kuantiti/Quantity) 1 UNIT									
34. Bald Ahli Dikimpot/ Authority to be Imported (Kuantiti/Quantity) NIPAH SYAHRAHMET AB.GHAFFI									
35. U/Bagian Pengawal Kastam/ Signature of Customs Officer WAN HAM 265									
Note: Pengakuan ini diketahui dan perkenan di buat oleh Petahil Kastam (Lantungan Melayutang) Imbu (1) 1967/Note: This declaration is issued by a customs officer in accordance with Section 19(1) of Customs Act 1967									

Note: Pengakuan ini dilaksanakan di bawah Perintah dan Inspektor Aliran Kastam 1960/Water Trade Declaration is required under the Order and in accordance with Customs Act 1960.



LAMPIRAN 17

Contoh surat pengisytiharan pegawai yang diberi kuasa

LETTERHEAD SYARIKAT PEMOHON

Ruj. Kami :
Tarikh :

Pengarah
Bahagian Kejuruteraan Automotif
Ibu Pejabat Jabatan Pengangkutan Jalan Malaysia
Aras 2, Blok D4, Kompleks D
Pusat Pentadbiran Kerajaan Persekutuan
62620 Putrajaya

YBhg. Dato',

PENGISYTIHARAN NAMA PEGAWAI YANG DIBERI KUASA UNTUK MENANDATANGANI SEBARANG DOKUMEN PERMOHONAN KELULUSAN JENIS KENDERAAN (VTA)

Dengan segala hormatnya merujuk kepada perkara di atas.

2. Dimaklumkan bahawa pihak syarikat AAA ingin mengisytiharkan nama pegawai yang diberi kuasa untuk menandatangani sebarang dokumen permohonan Kelulusan Jenis Kenderaan (VTA). Berikut merupakan maklumat pegawai yang telah dipilih:

No.	Nama Pegawai	Jawatan	Nombor telefon	Email
1.				
2.				

3. Sehubungan itu, hanya pegawai seperti nama di atas sahaja yang layak untuk menandatangani sebarang dokumen permohonan Kelulusan Jenis Kenderaan (VTA).

4. Kerjasama dan perhatian pihak YBhg. Dato' berhubung perkara ini amatlah dihargai.

Sekian terima kasih.

(NAMA WAKIL SYARIKAT)

Jawatan

Nama syarikat



Borang Maklumat Kenderaan pada *Windscreen*

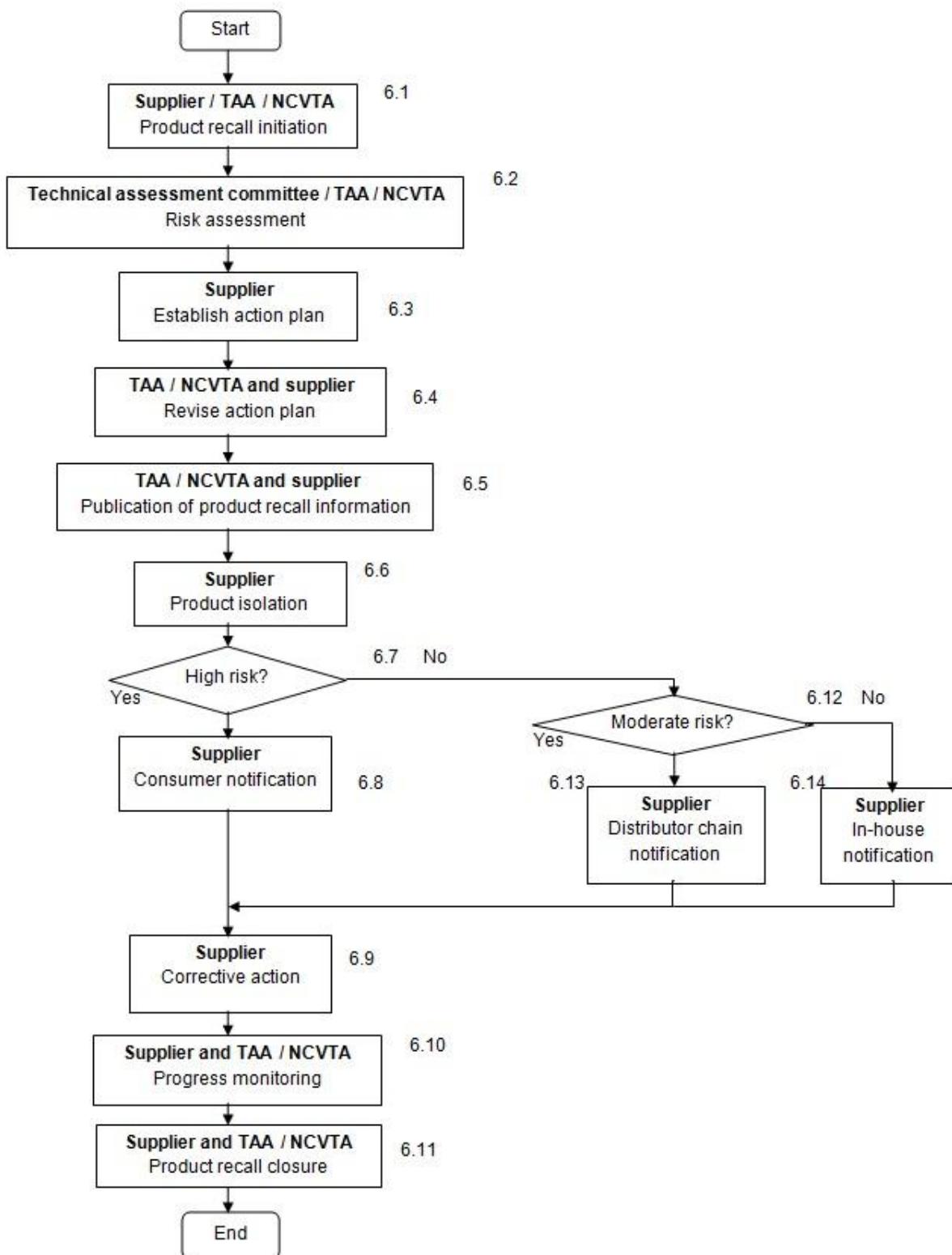
LAMPIRAN 18

BUATAN :	
MODEL :	
KOD MODEL :	
TRANSMISI :	
MODEL TAHUN :	
KAPASITI ENJIN :	
TARIKH PEMERIKSAAN :	



LAMPIRAN 19

Product Recall Flow Chart





Prosedur ‘Product Recall’

No.	Activity	Responsibility	Output
6.1	<p>Product recall initiation</p> <p>There are two possible situations of when a product recall is initiated, as listed below.</p> <ol style="list-style-type: none">1. In voluntary product recall, the supplier/manufacturer shall:<ul style="list-style-type: none">- Inform TAA/NCVTA within a maximum of seven working days after safety defects came to their attention.- Supply relevant information and evidences to TAA/NCVTA immediately once made available.2. In any case where safety defects have been brought to TAA/NCVTA attention, TAA/NCVTA may:<ul style="list-style-type: none">- Seek information from a supplier about safety defects that have been brought to their attention. <p>For both situations, the supplier/manufacturer shall at the initial stage identify the hazard and indicate the following to TAA/NCVTA:</p> <ul style="list-style-type: none">- The nature of the defect (occasional product defect, product deterioration, unusual operating conditions, misuse of product, random failure etc);- Range of affected products (models) and the estimated number of units involved;- Who is affected by the hazard (user, bystander);- Factors that could affect the severity and probability of injury (competence of user, age of product, method of use etc); and- Action plan at that time to remedy the defect.	Supplier/ Manufacturer TAA/NCVTA	Notification Letter Notification Letter Brief Report



No.	Activity	Responsibility	Output
	<p><i>TAA/NCVTA shall form a technical assessment committee to evaluate the impact of safety defect. The committee shall consist of relevant and independent technical experts. The technical assessment committee may invite the supplier/manufacturer for discussion during their assessment.</i></p> <p><i>The supplier/manufacturer will pass all relevant information available, and cooperate with TAA/NCVTA to establish whether a defect is present.</i></p>	<p>TAA/NCVTA</p> <p>Supplier/ Manufacturer</p>	<p><i>Technical assessment appointment letter</i></p> <p><i>Relevant data</i></p>
6.2	<p>Risk assessment</p> <p><i>Risk assessment usually has several phases incorporating the following principles, but not limited to:</i></p> <ul style="list-style-type: none">- Risk level estimation; and- Risk acceptability assessment. <p><i><u>Risk level estimation</u></i></p> <p><i>The technical assessment committee shall estimate the level of risk to determine the type of further action. Estimating the risk depends on two main factors:</i></p> <ul style="list-style-type: none">- <i>The severity of the possible injury to a person using or otherwise coming into contact with the product.</i>- <i>The probability of the possible injury. This is affected by the following factors:</i><ul style="list-style-type: none">• <i>The probability of a product being or becoming defective and the time to failure.</i>• <i>The frequency with which a user is exposed to the hazard.</i>• <i>The probability of being injured when exposed to the hazard.</i>	<p>Technical assessment committee</p>	<p>Assessment report</p>



No.	Activity	Responsibility	Output
	<p><i>The severity and probability estimates are combined to give an overall risk estimation.</i></p> <p><i>In order to help in the scale of the problem evaluation, the supplier/manufacturer shall collect and evaluate the following information:</i></p> <ul style="list-style-type: none">- <i>The number of defective products on the market; and</i>- <i>The number of the products sold which are likely to be still in use.</i> <p><u>Risk acceptability assessment</u></p> <p><i>The technical assessment committee shall assess whether the level of risk is acceptable to consumers. Certain types of products with obvious hazard are accepted by consumers if they consider that safety measures have been taken appropriately by the supplier/ manufacturer. For products that are likely to be used by more vulnerable people, consumers would not accept any risk even at a very low level.</i></p> <ul style="list-style-type: none">• <i>Serious risk - requiring rapid action;</i>• <i>Moderate risk - requiring some action; or</i>• <i>Low risk - not generally requiring action for products on the market.</i> <p><i>The technical assessment committee shall submit a report with recommendations to TAA/NCVTA. TAA/NCVTA shall recommend to NSC for further decision, whether to:</i></p> <ul style="list-style-type: none">- <i>Carry out corrective action including recall; or</i>- <i>Restrict the use of affected vehicles on the road</i> <p><i>Possible corrective actions may include the following, but not limited to:</i></p> <ul style="list-style-type: none">• <i>Changing the design of products;</i>• <i>Changing the production method;</i>• <i>Isolating and withdrawing products from distribution;</i>• <i>Modifying products in the distribution (such products need to be marked);</i>	TAA/NCVTA	



No.	Activity	Responsibility	Output
	<ul style="list-style-type: none">• Improving the instructions supplied with a product;• Sending additional information to consumers about the correct use of products;• Modifying products at consumer's premises (such products need to be marked)• Return of products by consumers for modification;• Recalling products from consumers for replacement;• Instruction to consumers to dispose of products; and• Offering consumers a replacement for recalled or discarded products (this is likely to make the action more successful). <p><i>The decision about the type of action to be taken will be mainly dependent on the overall level of the risk but it also take account into:</i></p> <ul style="list-style-type: none">• The total number of products/consumers affected;• The practicalities of taking a type of action;• The anticipated success of action taken;• The advice of TAA; and• Media sensitivity to the hazard. <p><i>NSC shall decide for the action and TAA/ NCVTA shall notify the supplier/manufacturer on the product recall decision.</i></p>	NSC TAA/NCVTA	



No.	Activity	Responsibility	Output
6.3	<p>Establish action plan</p> <p><i>The primary responsibility of the remedial action lies with the supplier/manufacturer.</i></p> <p><i>The supplier/manufacturer shall:</i></p> <ul style="list-style-type: none"> - Propose timeframe for the safety recall campaign to the TAA/NCVTA. - Notify TAA/NCVTA on the following details. <ul style="list-style-type: none"> • Information enabling a precise identification of the product or batch of products affected. • All available information relevant to the tracing of the product. • A description of the actions taken (and planned) to protect consumers. • The name of recall coordinator and deputy with safety recall campaign responsibility. - Notify other suppliers, in cases where the defect appears to stem from a fault in a component/part produced by another supplier. - Inform the TAA/NCVTA of all subsequent decisions on remedial action. This includes cases in which component suppliers are involved, unless in the circumstances of the cases it is agreed between the vehicle manufacturer and the appropriate component supplier for all remedial actions to become the responsibility of the component supplier, in which case the latter shall keep the TAA/NCVTA informed. <p><i>If the recall campaign affects products in another country, the supplier/manufacturer will find it helpful to set a target for the level of response in each country before the corrective action starts. Authorities in individual countries may be able to give information about the likely level of response.</i></p>	Supplier	Action plan report



No	Activity	Responsibility	Output
	<p><i>The supplier/manufacturer may set different targets for the response from distributors and the response from consumers. This is a complex issue and it is difficult to lay down firm rules, but the target should reflect the seriousness of the risk. The target may also depend on the quality of customer records.</i></p> <p><i>The level of response to the corrective action will depend on factors such as:</i></p> <ul style="list-style-type: none">- <i>The type of product;</i>- <i>How long the product has been in the market;</i>- <i>The expected life of the product;</i>- <i>This may enable estimation of what percentage of the total product is still in use;</i>- <i>The type of corrective action offered;</i>- <i>The media used to communicate the message; and</i>- <i>Local conditions in the country concerned.</i> <p><i>TAA/NCVTA shall:</i></p> <ul style="list-style-type: none">- <i>Advise accordingly.</i> <p><i>Registrar of TAA Registry shall:</i></p> <ul style="list-style-type: none">- <i>Record the product recall in TAA Registry.</i>- <i>Provide information to AC whenever requested within three working days.</i>	<p>TAA/NCVTA</p> <p>Registrar of TAA Registry</p>	



No.	Activity	Responsibility	Output
6.4	<p>Revise action plan</p> <p>TAA/NCVTA at its discretion may:</p> <ul style="list-style-type: none">- Offer views and make recommendations on the measure proposed. <p>The supplier/manufacturer shall:</p> <ul style="list-style-type: none">- Revise the measure proposed, if deemed necessary and proceed with the mutually agreed safety recall timeframe.	TAA/NCVTA Supplier/ Manufacturer	Recom- mendation letter Revised action plan
6.5	<p>Publication of product recall information</p> <p>TAA/NCVTA reserves the right, under Ministerial authority, to publish at any time information for public interest.</p> <p>TAA/NCVTA shall:</p> <ul style="list-style-type: none">- Consult the supplier regarding product details wherever appropriate, and contact the concerned manufacturer/supplier of the product before publishing the information.- Not disclose publicly information on matters of commercial confidence unless there appears to be overriding safety considerations.- At regular intervals, make public summary information of actions taken on cases notified under the procedure. <p>The supplier/manufacturer shall indicate the following details to be stated in the corrective action's announcement.</p> <ul style="list-style-type: none">- Product identification details (name of product, batch number, serial number, bar code, colour, size and a picture or line drawing of the unsafe product).- A clear description of what is wrong with the product.- Details of the safety risk or potential safety risk.- Information on the type of corrective action proposed and any refund or replacement.	TAA/NCVTA	Publication of product recall information



No.	Activity	Responsibility	Output
	<ul style="list-style-type: none">- Clear instructions on how to deal with the product (e.g. whether and where to bring or return the product or how to arrange for a repair).- A web site address or hot line for further information.		
6.6	<p>Product isolation</p> <p>The supplier/manufacturer should take immediate action to:</p> <ul style="list-style-type: none">- Isolate producer's own stocks; and- Ask distributors to isolate affected products.	Supplier/ Manufacturer	
6.7	<p>Classification of high risk product recall</p> <p>If high risk product(s) are to be recalled, follow procedure 6.8. Otherwise, proceed to 6.15.</p>		
6.8	<p>Consumer notification</p> <p>The supplier/manufacturer shall:</p> <ul style="list-style-type: none">- Take all reasonable actions to contact affected product owners/registered keepers and recall their vehicles/components/parts for inspection and, if necessary, rectify components or assemblies the supplier believes are defect in terms of safety.- Send communication, in layman's terms, to the product owner, directly or through the franchised dealer network or through other methods explaining the nature of the defect and its safety significance, in consultation with TAA/NCVTA.- Give opportunity to the TAA/NCVTA to comment on the content of and method of communication prior to instigating a campaign.	Supplier/ Manufacturer	



No.	Activity	Responsibility	Output
6.9	<p>Corrective action</p> <p>The supplier/manufacturer shall carry out the corrective actions, as described in 6.3 or 6.4 for products in the hand of consumers, in the supply chain and in the production chain, in each of the countries involved. Any repairs or replacements need to be carried out as quickly and efficiently as possible. Products need to be dealt with in the following ways:</p> <ul style="list-style-type: none">• Collect product; and• Correct product; or• Dispose product. <p><u>Collect products</u></p> <p>If products are to be returned to the supplier/ manufacturer, supplier/manufacturer shall:</p> <ul style="list-style-type: none">- Arrange to collect them from distributors.- Ask consumers to take the products to their nearest authorised workshop/ distributors or retailer if they are portable.- Arrange for them to be collected from the consumer if they are not portable. <p>Unsafe products should be clearly identified and the stock movements are properly recorded. The distributor should check, identify the product and compensate the consumer with a replacement.</p> <p>The practicalities of doing this will depend on the country in which it is being done. The supplier/manufacturer may need to make use of local transport companies, agents or distributors.</p> <p><u>Correct the products</u></p> <p>If the supplier/manufacturer has offered to repair or rectify the consumer's product, the supplier may have this carried out by:</p> <ul style="list-style-type: none">- An agent or dealer at their premises; or- Authorised workshop.	Supplier/ Manufacturer	



No.	Activity	Responsibility	Output
	<p><i>Modified products should be clearly marked. The supplier/manufacturer needs to decide what to do with products that have been recalled. It may be acceptable to:</i></p> <ul style="list-style-type: none">- <i>Carry out work that will bring the product up to an acceptable standard for resale.</i>- <i>Products that have been rectified need to be clearly marked and the documents accompanying them may need to be updated; and</i>- <i>Rework some of the materials or components to enable them to be reused in other products.</i> <p><i>It is unethical to sell or deliver uncorrected products to consumers.</i></p> <p><i>There are restrictions on the re-exporting of unsafe products (e.g. for modification) and the supplier/manufacturer will need to check the legal requirements in the countries concerned if he wishes to do this.</i></p> <p><u>Dispose of products</u></p> <p><i>Products for disposal need to be clearly identified and securely stored. The aim is to dispose of them safely, by taking into account any environmental risks that might arise. The supplier/manufacturer may need to make use of specialised waste disposal contractors. The local market surveillance authorities may be able to give further information about acceptable ways of disposing unsafe products.</i></p>		



No.	Activity	Responsibility	Output
6.10	<p>Progress monitoring</p> <p>When the corrective action has started, the supplier/manufacturer shall:</p> <p>Provide a system to record the number of response received from customers and the number of products that have been returned, collected, corrected or disposed of.</p> <ul style="list-style-type: none">- Monitor the level of response, in which information gathered in the system should be analysed and further action may be needed if the target is not reached.- Notify TAA/NCVTA of the response rate periodically, example at a three-month intervals, until the recall action is complete or it is mutually agreed that the campaign be closed for reporting purposes. <p>Registrar of TAA Registry shall record the response rate on the TAA registry.</p> <p>If the supplier/manufacturer/TAA/NCVTA receives information about further accidents or injuries to consumers, the supplier/manufacturer may need to review the risk assessment and reassess the effectiveness of the corrective action.</p> <p>If the product recall target is reached, the corrective action can be formally ended. However, the supplier/manufacturer still needs to deal with products that are returned at a later date.</p>	<p>Supplier/ Manufacturer</p> <p>Registrar of TAA Registry</p>	<p>Product recall progress report</p>



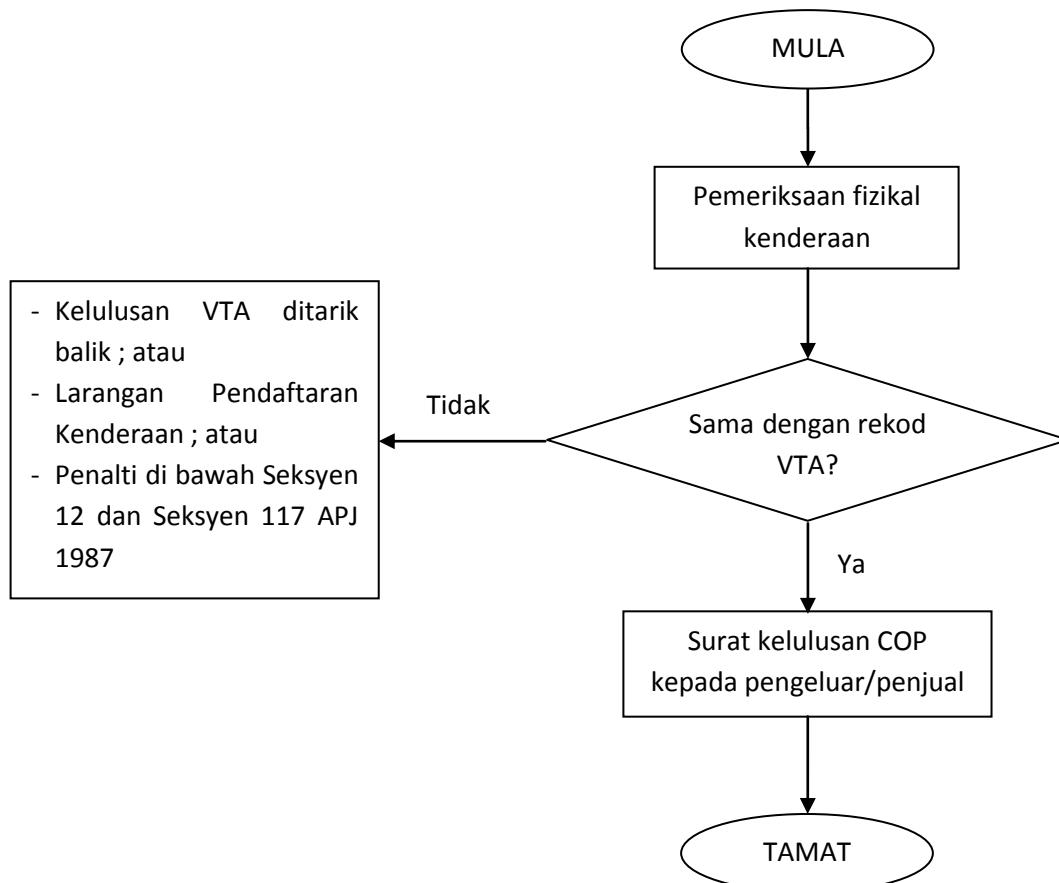
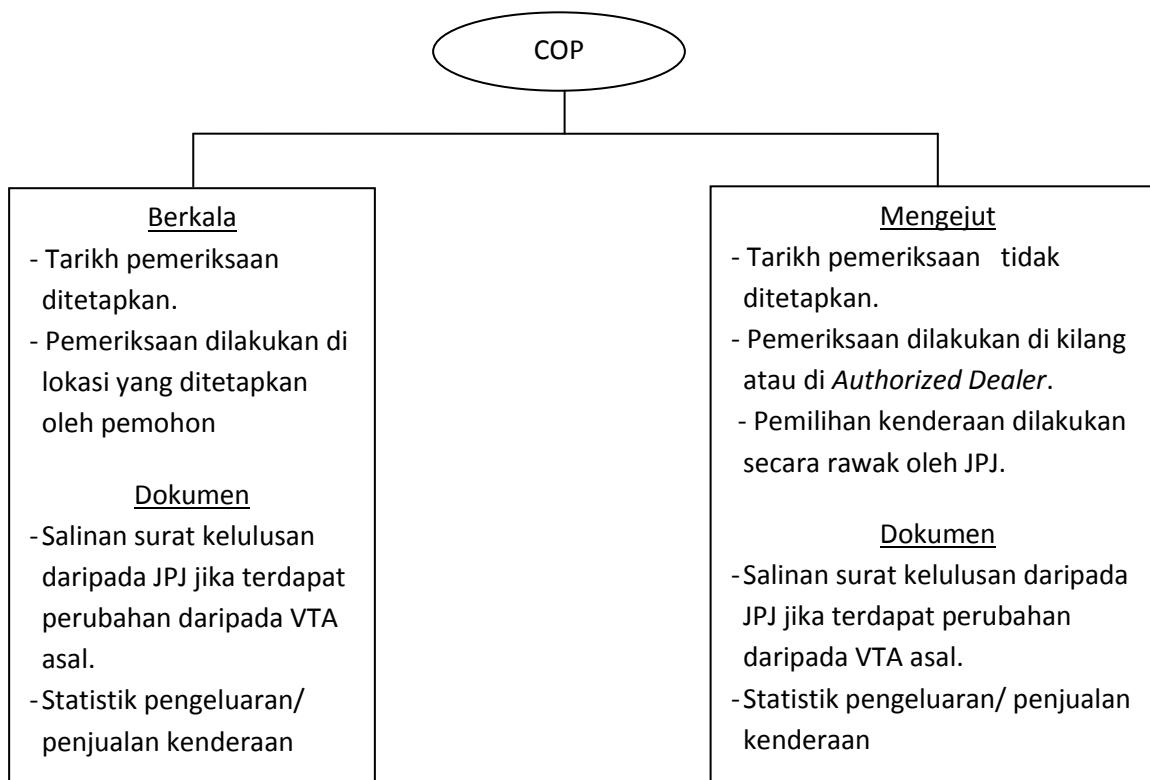
No.	Activity	Responsibility	Output
6.11	<p>Product recall closure</p> <p>After the corrective action has been completed, the supplier/manufacturer shall look into the following, but not limited to:</p> <ul style="list-style-type: none">- Safety defect prevention; and- Corrective action procedure improvement. <p>Safety defect prevention</p> <p>The supplier/manufacturer shall assess the cause of the problem and take appropriate measures to prevent it from happening again, focusing on a review of the following, but not limited to:</p> <ul style="list-style-type: none">- The standards and design principles used; and- The effectiveness of quality assurance and product safety/risk management systems. <p>Corrective action procedure improvement</p> <p>The supplier/manufacturer shall assess the success of the corrective action procedure and try to improve it for the future.</p> <p>For example the supplier/manufacturer may:</p> <ul style="list-style-type: none">- Monitor the effectiveness of the communication methods used (possibly by carrying out opinion research) and establish policy where necessary.- Evaluate the internal procedures for corrective action and assess the need for changes in policy or training.- Compile a full report of all actions taken and issues solved during the period of the action. <p>The supplier/manufacturer shall provide a product recall closure report to TAA and announce the completion of product recall campaign to the public, with TAA's consent.</p>	Supplier/ Manufacturer	



No.	Activity	Responsibility	Output
6.12	<p>Classification of moderate risked product recall</p> <p>If moderate risk product(s) is to be recalled, follow procedure 6.13. Otherwise, proceed to 6.14.</p>		
6.13	<p>Distributor chain notification</p> <p>For the moderate risk affected product, besides in-house production, the corrective action may be limited to products in the distribution chain, and it may be enough to withdraw these and give TAA details of what is being done. The supplier/manufacturer shall:</p> <ul style="list-style-type: none">- Take all reasonable action to contact affected product distributor and recall their vehicles/components/parts for inspection and, if necessary, rectify components or assemblies the supplier/manufacturer believes are necessary in terms of safety.	Supplier/ Manufacturer	
6.14	<p>In-house notification</p> <p>For the low risk affected product, the corrective action may generally be limited to consideration of changes affecting products in design and production.</p> <p>The supplier/manufacturer shall immediately stop all related production for in-house correction to be taken.</p>	Supplier/ Manufacturer	



CARTA ALIR PROSES CONFORMITY OF PRODUCTION (COP) BAGI KELULUSAN JENIS KENDERaan (VTA)





LAMPIRAN 21

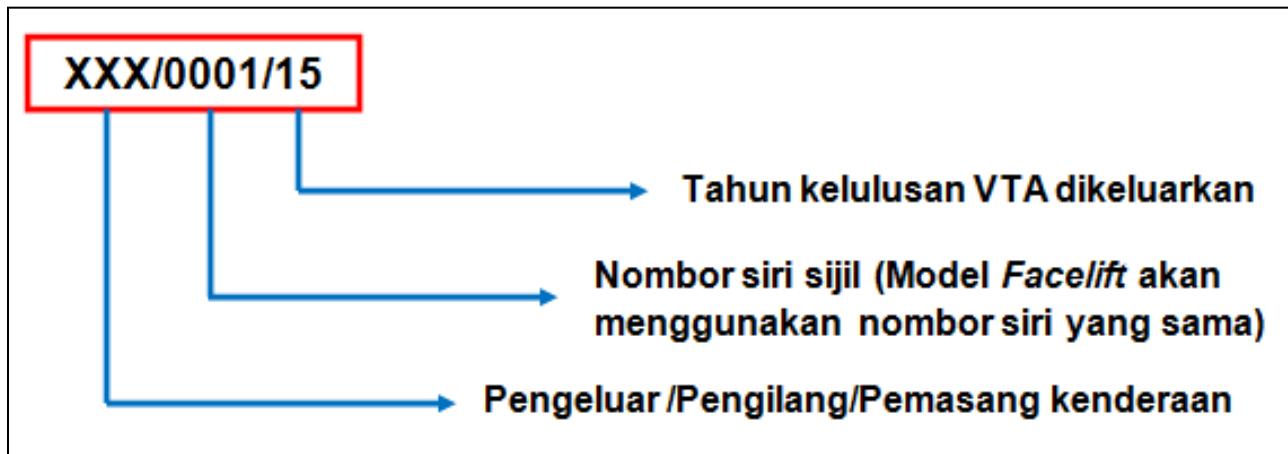
Contoh Format *Product Labelling* bagi kategori M, N dan O

PADA VIN PLATE:

NAMA PENGETUA KENDERAAN
NAMA MODEL:
KOD MODEL:
NO. CASIC:
NO. SIJIL VTA: XXX/0001/15

PENGGUNAAN STICKER:

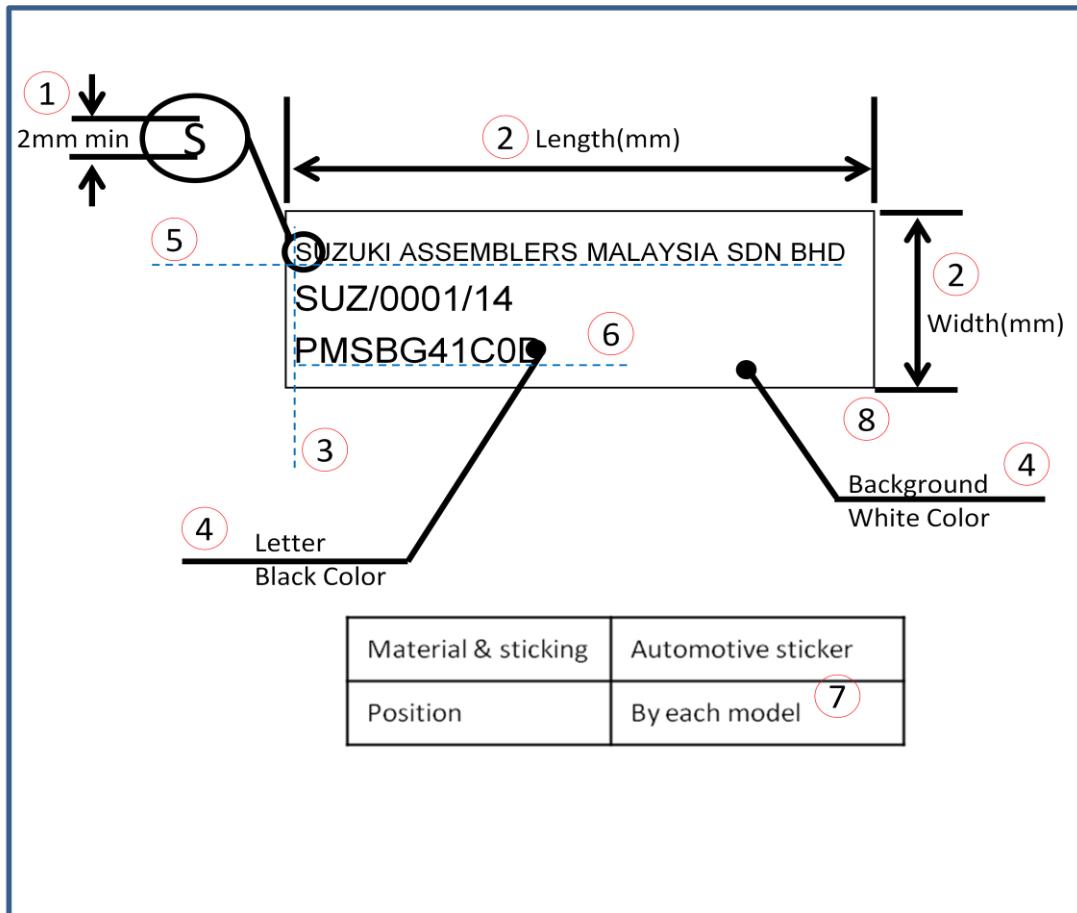
NAMA PENGETUA KENDERAAN
NO. SIJIL VTA: XXX/0001/15
NO. CASIC:





LAMPIRAN 22

Contoh Format Product Labelling bagi kategori L (Motosikal)



- *Product labelling will be declared & indicated during VTA application*
- *Minimum height of font is 2 mm*
- *Align text from left*
- *Background in white color & letter in black color*
- *Chassis and VTA approval number must be in capital letter*



LAMPIRAN 23

PANDUAN PERATURAN UN YANG DIKUATKUASAKAN MENGIKUT KATEGORI KENDERAAN



E52

TYPE APPROVAL OF MOPED - MOTOCYCLE

Topics with Base UN Regulations

General topics: 20 23 8 7 2 3

L 1-7

Categories

Active Safety

Category	Topic	Regulation
Retro Reflecting Device	R3	10
Direction Indicators	R6	11
Stop & End-outline Lamps	R7	12
Front Fog Lamps	R19	13
Audible Warning Devices	R28	14
Filament Lamps	R37	15
Rear Fog Lamps	R38	16
Headlamp Cleaners	R45	17
Rear-view Mirror	R46	18
Lights	R50	19
Installation of Lights	R53	20
Driver Operated Control	R60	21
Tyres	R75	22
Braking	R78	23
Rear-view Mirrors	R81	24
Replacement Brake Lining	R90	25
Gas-Discharge Headlamps	R98	26
Headlamps Asymmetrical	R112	27
Headlamps Symmetrical	R113	28

Environment

Diesel Smoke	R24	1
Exhaust Emission	R40	2
Noise	R41	3

General Safety

EMC Compatibility	R10	4
Speedometer	R39	5
Safety Glass	R43	6
Protect Unauthorized Use	R62	7

Passive Safety

Safety-belts	R16	8
Head Restraints	R25	9



E52

TYPE APPROVAL OF PASSENGER CAR

Passive Safety

Door Latches and Hinges	R11	1
Safety-belt Anchorages	R14	2
Safety-belts	R16	3
Seats	R17	4
Interior Fittings	R21	5
Head Restraints	R25	6
External Projections	R26	7
Prevention of Fire Risks	R34	8
Frontal Collision	R94	9
Lateral Collision	R95	10

Topics with Base UN Regulations

General topics: 32 37 2 3 4 18 43 14 15



Environment

Diesel Smoke	R24	11
Diesel Emission	R49	12
Noise Emission	R51	13
Gaseous Pollutants	R83	14
CO ₂ Emission & Fuel Cons.	R101	15
Rolling Sound Emission	R117	16

General Safety

EMC Compatibility	R10	17
Speedometer	R39	18
Safety Glass	R43	19
Mechanical Coupling	R55	20
Vehicle Alarm System	R97	21
Battery Electric Vehicle	R100	22
Protect Unauthorized Use	R116	23

M 1

Categories

Retro Reflecting Device	R3	24
Illumination Rear Plates	R4	25
Direction Indicators	R6	26
Stop & end-outline Lamps	R7	27
Vehicle Braking	R13H	28
Front Fog Lamps	R19	29
Reversing Lamps	R23	30
Audible Warning Devices	R28	31
Pneumatic Tyres	R30	32
Filament Lamps	R37	33
Rear Fog Lamps	R38	34
Headlamp Cleaners	R45	35
Rear-view Mirror	R46	36
Installation of Lights	R48	37
Temporary Tyres / TPMS	R64	38
Rear Marking Plates	R69	39
Parking Lamps	R77	40
Steering Equipment	R79	41
Speed Limitation Device	R89	42
Replacement Brake Lining	R90	43



E52

TYPE APPROVAL OF BUS - COACH

M²
3

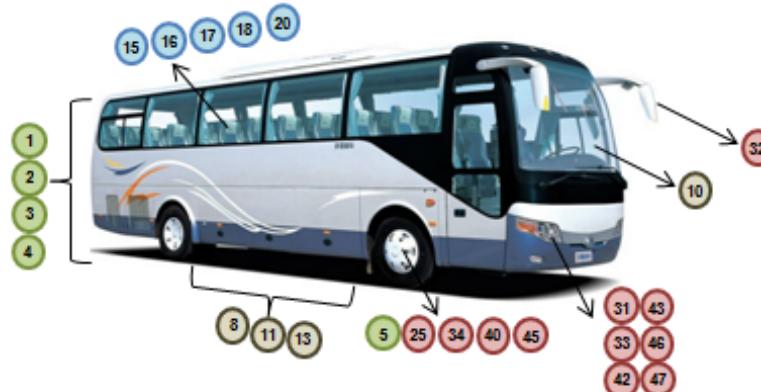
Categories

Active Safety

Retro Reflecting Device	R3	21
Illumination Rear Plates	R4	22
Direction Indicators	R6	23
Stop & end-outline Lamps	R7	24
Heavy Vehicle Braking	R13	25
Front Fog Lamps	R19	26
Reversing Lamps	R23	27
Audible Warning Devices	R28	28
Filament Lamps	R37	29
Rear Fog Lamps	R38	30
Headlamp Cleaners	R45	31
Rear-view Mirror	R46	32
Installation of Lights	R48	33
Pneumatic Tyres	R54	34
Rear Marking Plates	R69	35
Rear Marking Plates	R70	36
Parking Lamps	R77	37
Steering Equipment	R79	38
Speed Limitation Device	R89	39
Replacement Brake Lining	R90	40

Environment

Diesel Smoke	R24	1
Diesel Emission	R49	2
Noise Emission	R51	3
Gaseous Pollutants	R83	4
Rolling Sound Emission	R117	5



General Safety

EMC Compatibility	R10	6
Protect Unauthorized Use	R18	7
Bus/Coach Construction	R36	8
Speedometer	R39	9
Safety Glass	R43	10
Bus/Coach Construction	R52	11
Mechanical Coupling	R55	12
Superstructure	R66	13
Battery Electric Vehicle	R100	14

Passive Safety

Safety-belt Anchorages	R14	15
Safety-belts	R16	16
Seats	R17	17
Head Restraints	R25	18
Prevention of Fire Risks	R34	19
Seats	R80	20

Side-marker Lamps	R91	41
Gas Discharge Headlamps	R98	42
Gas-Discharge Lights	R99	43
Retro-reflective Markings	R104	44
Retread Pneumatic Tyres	R109	45
Headlamps Asymmetrical	R112	46
Cornering Lamp	R119	47
Hand Controls, Tell-tales	R121	48



E52

TYPE APPROVAL OF LIGHT DUTY TRUCK - LORRY

N₁

Categories

Active Safety

Retro Reflecting Device	R3	22
Illumination Rear Plates	R4	23
Direction Indicators	R6	24
Stop & End-outline Lamps	R7	25
Heavy Vehicle Braking	R13	26
Vehicle Braking	R13H	27
Front Fog Lamps	R19	28
Reversing Lamps	R23	29
Audible Warning Devices	R28	30
Pneumatic Tyres	R30	31
Filament Lamps	R37	32
Rear Fog Lamps	R38	33
Headlamp Cleaners	R45	34
Rear-view Mirror	R46	35
Installation of Lights	R48	36
Pneumatic Tyres	R54	37
Spare Tyres / TPMS	R64	38
Rear Marking Plates	R69	39
Parking Lamps	R77	40
Steering Equipment	R79	41

Environment

Diesel Smoke	R24	1
Diesel Emission	R49	2
Noise Emission	R51	3
Gaseous Pollutants	R83	4
CO ₂ Emission & Fuel Cons.	R101	5
Rolling Sound Emission	R117	6



Passive Safety

Door Latches and Hinges	R11	7
Safety-belt Anchorages	R14	8
Safety-belts	R16	9
Seats	R17	10
Head Restraints	R25	11
Prevention of Fire Risks	R34	12
External Projection	R61	13
Protect Lateral Collision	R95	14

General Safety

EMC Compatibility	R10	15
Speedometer	R39	16
Safety Glass	R43	17
Mechanical Coupling	R55	18
Vehicle Alarm System	R97	19
Battery Electric Vehicle	R100	20
Protect Unauthorized Use	R116	21

Speed Limitation Device	R89	42
Replacement Brake Lining	R90	43
Side-marker Lamps	R91	44
Gas Discharge Headlamps	R98	45
Gas-Discharge Lights	R99	46
Retro-reflective Markings	R104	47
Retread Pneumatic Tyres	R108	48
Retread Pneumatic Tyres	R109	49
Headlamps Asymmetrical	R112	50
Cornering Lamp	R119	51
Hand Controls, Tell-tales	R121	52



E52

TYPE APPROVAL OF HEAVY DUTY TRUCK - LORRY

N₂
3

Categories

Active Safety

Retro Reflecting Device	R3	21
Illumination Rear Plates	R4	22
Direction Indicators	R6	23
Stop & End-outline Lamps	R7	24
Heavy Vehicle Braking	R13	25
Front Fog Lamps	R19	26
Reversing Lamps	R23	27
Audible Warning Devices	R28	28
Filament Lamps	R37	29
Rear Fog Lamps	R38	30
Headlamp Cleaners	R45	31
Rear-view Mirror	R46	32
Installation of Lights	R48	33
Pneumatic Tyres	R54	34
Rear Marking Plates	R69	35
Rear Marking Plates	R70	36
Parking Lamps	R77	37
Steering Equipment	R79	38
Speed Limitation Device	R89	39
Replacement Brake Lining	R90	40

Topics with Base UN Regulations

General topics: 33 34 6 7 8 17 18 1 2

Environment

Diesel Smoke	R24	1
Diesel Emission	R49	2
Noise Emission	R51	3
Gaseous Pollutants	R83	4
Rolling Sound Emission	R117	5



Passive Safety

Safety-belt Anchorages	R14	6
Safety-belts	R16	7
Seats	R17	8
Head Restraints	R25	9
Prevention of Fire Risks	R34	10
Rear Under-run Protect	R58	11
External Projection	R61	12
Lateral Protection	R73	13
Front Under-run Protect	R93	14

General Safety

EMC Compatibility	R10	15
Protect Unauthorized Use	R18	16
Speedometer	R39	17
Safety Glass	R43	18
Mechanical Coupling	R55	19
Battery Electric Vehicle	R100	20
Side-marker Lamps	R91	41
Gas Discharge Headlamps	R98	42
Gas-Discharge Lights	R99	43
Retro-reflective Markings	R104	44
Retread Pneumatic Tyres	R109	45
Headlamps Asymmetrical	R112	46
Cornering Lamp	R119	47
Hand Controls, Tell-tales	R121	48



PENGHARGAAN

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KETUA : ENGR. AZIZUL BIN ABDUL AZIZ

SETIAUSAHA : ENGR. SITI SUHANA BINTI SUID

AHLI JAWATANKUASA : UNIT VTA, SEKSYEN KELULUSAN JENIS