National Safety Code

Standard 2: Knowledge and Performance Tests (Drivers)

FOREWARD

The purpose of this standard is to ensure that applicants possess the fundamental knowledge and driving skills for the type of vehicle to be safely operated on Canadian roads.

Knowledge and performance testing are seen as essential elements of a common transportation policy, contributing to improving road safety and facilitating the free movement of persons across borders both east to west, and north to south. There is a generally accepted hypothesis that the more difficult the licencing tests, the more preparation, study and practice will occur; leading to safer driving or enhanced performance.[1]

Research has shown that a licence testing program aimed at critical knowledge requirements can reduce crash risk.[2] The rationale behind knowledge testing is to ensure that new drivers are aware of basic road laws and practices before taking to the road. This premise is based on the belief that this will promote safe operation and efficient road use[3].

The purpose of a performance/skill/practical/road test is to assess an applicant's level of skill required to operate a motor vehicle safely. Driving skills are inferred from performance in carrying out various tasks. The American Association of Motor Vehicle Administrators (AAMVA) guidelines (2007) define a driving skill as an "ability that requires both knowledge and practice for its attainment" (p.24); differentiating them from other basic skills such as sensory, attentional, perceptual, cognitive and psychomotor. Three key categories are identified in the AAMVA guidelines:

- Perceptual – ability to perceive characteristics of various highway traffic environments e.g. judging gaps, identifying hazards.
- Attentional – ability to focus and shift attention e.g. monitoring traffic ahead and to the side in a merge.
- Motor – ability to manipulate controls to maneuver the vehicle e.g. rotating steering wheel in relation to intended motion of the vehicle and its path when turning a corner (p.24).

The Canadian model requires some level of constitutional independence, mutual recognition of licences and reciprocity. Given the importance of individual means of transport, possession of a driving licence duly recognized by member jurisdictions promotes free movement of people and more efficient movement of goods. Knowledge and performance testing are two elements of the driver licensing system that contribute to the achievement of these goals.

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[1] AAMVA. (2007). *Guidelines for Knowledge & Skill Test Development.*

[2] Ibid.

[3] Watson, B., Fresta, J. Whan, H., McDonald, J. Dray, R., Beuermann, C. & Churchward, R. (1996). *Enhancing Driver Management in Queensland.* Land Transport and Safety Division, Queensland Transport, Brisbane. Haire, E., Williams, Allan F.; & Freusser, David F. (2011). *Driver License Testing of Young Novice Drivers*. NHTSA: Washington, D.C.

This standard is the result of a comprehensive process and reflects CCMTA's commitment to:

- anchor its standards on the best-evidence available as articulated in Principle 1 below
- focus on a principled approach to driver licensing standards, and to
- respond to jurisdictional need for flexibility to address unique needs.

These guidelines and standards reflect Canadian jurisdictions' continuing commitment to public safety while allowing the maximum driving privilege possible.

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BACKGROUND

Principles

The concept of "principle" generally describes rules, norms, or values that guide or describe desirable behaviours for an individual or group.[4] Principles are statements intended to guide the ways things are done by individuals and organizations, what is done and why.

A number of principles have been articulated throughout the National Safety Code (NSC) as well as the national road safety strategy. The principles below apply to NSC 2:

- Jurisdictions are committed to the principle of one driver, one licence, one record.
- NSC standard 2 has been developed to promote consistency, harmonization and road safety across Canadian jurisdictions.
- Contributes to a safe systems approach to road safety.
- Reflects an evidence-based approach to requirements, policies and guidelines based on global expertise and best available evidence.
- Standards are developed through an inclusive and consultative process.
- Knowledge and performance testing must be developed for each class of licence.
- A knowledge test should precede performance testing to ensure a basic understanding of driving and vehicles principles, and rules of the road.
- Performance testing captures skills and abilities for on or off road and is done in a vehicle reflective of the class of licence being issued.
- Licensing assessment is progressive; higher classes of licence build on basic skills acquired through initial and learning licensing stages.

These principles are to be broadly construed when applying the standards and policies within a jurisdiction; providing direction and flexibility in how road safety goals can be achieved.

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[4] Merriam-Webster defines principle in a number of ways, the most relevant being "a fundamental doctrine or assumption", a "rule or code of conduct" (www.merriam-webster.com/dictionary/principle). The Cambridge Dictionary (http://dictionary.combridge.org/dictionary/english/principle) describes principles as fundamental norms, rules, or values that represent what is desirable and positive for a group, organization, or community. The online Oxford Dictionaries (www.oxforddictionaries.com/definition/english/principle) says a principle is a "rule or belief governing one's behaviour" while the MacMillan Dictionary defines principle as a basic belief, theory, or rule that has a major influence on the way in which something is done (http://www.macmillandictionary.com/dictionary/british/principle).

Structure of the Standard

NSC standard 2 contains:

1. An introduction which provides context for the standard, its interpretation and application.
2. The standard – a statement that clearly defines a minimal technical specification.[5]
3. Rationale – statements that explain the policy rationale and evidence to support the standard; and define overall goals, benefits and outcomes of an intended action, approach or strategic direction. The rationale provides policy context to support the standard's implementation.

Use of the Standard

It is expected that all Canadian jurisdictions will adopt the NSC standards as a reference. While the NSC standards imply a minimum, there is no constraint on jurisdictions going beyond this specification. In addition, a rationale is provided for the standards to help jurisdictions understand why an element is included. Finally, jurisdictional practices are included as a reference point for understanding different requirements that exist.

The authority for the CCMTA standards

Canadian Council of Motor Transport Administrators

The Canadian Council of Motor Transport Administrators (CCMTA) coordinates all matters dealing with the administration, regulation and control of motor vehicle transportation and highway safety. Membership includes representation from provincial and territorial governments as well as the federal government of Canada.

CCMTA supports its members' vision to have the safest and most efficient movement of people and goods by road in the world. CCMTA is the custodians of the National Safety Code, and provides collaborative leadership in the areas of Road Safety Research and Policies, Drivers and Vehicles and Compliance and Regulatory Affairs.

Vision
To have the safest and most efficient movement of people and goods by road in the world.

Mission
To provide collaborative leadership in addressing Canadian road safety priorities.

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[5] Adapted from Policy Positions of the AAMVA, 2016.

History

The origins of the CCMTA can be traced back to 1940, when the four Western provinces met to consider issues of common interest relating to road transport. In the early fifties, the group was joined by Ontario and the Yukon Territory. The Canada-wide expansion of the organization took place in 1956, some two years after the enactment of the Motor Vehicle Transport Act by Parliament, in response to an already felt need for uniformity due to increasing movement and traffic.

In 1975 a constitution was signed by representatives of all provinces and territories and a small permanent Secretariat was established. The federal government has participated as a full member of CCMTA since 1977. The organization was incorporated in 1987 under its present name and constitution. CCMTA commemorated its 75th anniversary in 2015.

CCMTA Members are elected from provincial, territorial and federal governments. CCMTA has a responsibility to be accountable to:

- the Council of Deputy Ministers and Ministers for:
    - providing advice and making recommendations on matters relating to transportation and highway safety
- the provinces, territories and the federal government for:
    - promoting a better understanding and cooperation in all matters related to transportation and highway safety among each other, as well as other organizations where there exists a mutual interest
- its stakeholders for:
    - maintaining an ongoing dialogue and consultation to ensure CCMTA is responsive and informative

The relationship between individual Canadian jurisdictions' classification models and the CCMTA standards

All Canadian provinces and territories have the authority to establish their own knowledge and performance testing for drivers. In 1985, standards for driver licensing classification were identified as part of the National Safety Code (NSC) initiative undertaken to achieve uniformity among the provinces and territories, on many aspects relating to the administration of drivers and vehicles.

PART 1:

A MODEL FOR KNOWLEDGE
AND PERFORMANCE TESTING

Chapter 1:   Introduction

This part provides the standards and policy guidance for the development and evaluation of tests to assess the knowledge and skills of applicants wishing to operate a motor vehicle on Canadian roads. A national driver licensing framework is intended to help jurisdictional licensing agencies achieve uniformity in assessing the ability of driver licence applicants to operate vehicles in a manner that contributes to the safety and mobility of the driving public.

Driver licence tests attempt to measure knowledge and skills defined by motor vehicle agencies and are intended to serve as an incentive to applicants to acquire the skills, knowledge and attitudes needed for safe driving and as a means of making sure applicants possess the skills and knowledge needed before they are issued a licence. The difference in the purpose of tests leads to substantial differences in the way the licence tests are developed and evaluated.

Chapter 2:   Definitions

Driver examiner: A driver examiner (DE) is an individual who is authorized by a jurisdiction to conduct assessments, tests and evaluations in order to determine licensure.

Knowledge test: means of testing an individual's knowledge of information required to operate vehicles safely, rules of the road, potential hazards, signs and signals. Testing may be done with paper and pencil, electronic/computer or verbal methods.

Practical test: practical testing, while sometimes seen as synonymous with road testing, is a broader category which may include assessments of vehicle functions, pre-trip inspections, and air brake inspections as well as the use of varying technology such as computers and simulators.

Road test: means a road test conducted by a government authorized driver-examiner. Standard road tests were traditionally designed for assessing driving skill. They may be used, however, to test for related skills such as hazard perception and, under certain circumstances, to assess motor and sensory functional ability to drive.

Chapter 3:   Chapter Template

Below is the template used for the knowledge and performance testing standards. It is annotated to explain what type of information is found in each section of the template. The standard provides the minimum requirements for testing. Jurisdictions may have higher standards by imposing additional requirements to enhance safety outcomes, for example, additional areas for knowledge or road testing.

Jurisdictions may have additional requirements and practices considered beneficial in their context. Appendix III describes best practices as of December 31, 2018 that may be considered by other jurisdictions.

Standard	The requirements that must be met for a specified element of knowledge or road testing.
Rationale	A brief description of the rationale for the requirements.
Policy Guidelines	Provide more details on the application of the standard element, including procedures.

PART 2:

KNOWLEDGE TESTING

Chapter 1:   Introduction

This part of the standard describes methods for assessing the knowledge of driver licence applicants for all classes of vehicles. The primary purpose of a driver knowledge test in licensing is not to predict future driving but to improve it by inducing licence applicants to acquire the requisite knowledge before they are allowed to drive. It is a quality control measure, functioning in the same manner as a final exam in a school course.

Knowledge tests are a method by which a person's theoretical, technical and operational understanding of driving rules, signs and behaviours can be measured. As applied to the process of driving, knowledge tests generally include subjects pertaining to the vehicle, road rules and traffic laws. In recent years, attempts have been made to develop knowledge tests that assess the applicant's ability to logically work out problems and identify hazards. Knowledge tests can come in various formats: written, oral, electronic, etc.

Research has shown that a licence testing program directed at critical knowledge requirements is capable of reducing the likelihood that drivers would be involved in crashes for which they are responsible (AAMVA, 2014). The purpose in giving knowledge tests is to ensure that drivers possess the information required to operate vehicles safely and facilitate mobility. Providing this assurance means not only assessing applicant knowledge through a knowledge test but providing a manual or means by which applicants can acquire that knowledge. This standard will address knowledge requirements and assessment, as well as the special requirements of applicants with language and literacy limitations.

Specifically, this part focuses on the requirements for knowledge testing:
- Test construction
- Key content areas required to safely operate a vehicle (passenger, motorcycle and commercial or higher class)
- Test administration

Chapter 2:   Test Construction

The construction of knowledge tests will be discussed in terms of (a) content, format and wording of items, (b) scoring standards, and (c) alternate forms.

Content, format and wording

CONTENT

The knowledge test can only measure a sample of what applicants know. However, if the sample of items is sufficiently large, and represents the full range of knowledge requirements, the test will provide a reliable estimate of an applicant's knowledge.

Standard	To the fullest extent possible, the test items should be drawn from all knowledge domains which contain information on all key driver licensing requirements, as identified in this standard.
Rationale	While knowledge tests were previously focused on laws and regulations governing motor vehicle operation, it is now generally accepted that applicants can be held responsible for any knowledge that contributes to the safety and mobility of the public. This information is made available, in a Canadian context, through driving manuals, jurisdictional websites and other government-approved materials. In addition to laws and regulations, knowledge requirements include driving procedures, principles, facts, and concepts, including both those that enable drivers to operate their vehicles properly and those that motivate them to do so. Knowledge test areas have been developed through research involving a comprehensive analysis of driver tasks and their prioritization in terms of their criticality to traffic safety (AAMVA, 2014).
Policy Guidelines	The content of test items should be drawn directly from the driver licence manual/handbook or other approved, publicly available government sources and materials.

ITEM FORMAT

The multiple-choice format offers the best practical means for testing large numbers of licence applicants uniformly and objectively within the resources generally available to licensing agencies. This would also apply to communigraphic items. This format is comprised of a small diagram upon which a question is based. The communigraphic style tests the ability of the applicant to reason out problems based upon road rules, regulations and scenarios.

Standard	Testing items to be structured as multiple-choice, following the guidelines below.
Rationale	The multiple-choice format offers the best practical means for testing large numbers of licence applicants uniformly and objectively. True/false questions should be avoided in a licensing test given that the 50/50 chance of choosing the right answer contains a higher risk of the applicant not having the right knowledge.

Policy Guidelines	The following considerations should guide the design of multiple-choice-type format:
	Content of alternatives — All of the alternative responses to an individual item should address the same piece of information and attempt to assess whether the applicant possesses that information. If the various choices address different topics, there is no way of determining from responses what it is that an applicant does and does not know.
	Correct and incorrect answers — Each item should have only one correct answer; the rest should be clearly incorrect. Applicants should not be required to judge degrees of correctness (which is the "most correct" answer).
	Number of alternatives — Generally speaking, the greater the number of alternative responses, the smaller the chance of guessing the correct answer. However, the situation applies only where all alternatives are plausible. In driver licence exams, it may be difficult to develop more than three alternatives that are plausible. Adding a fourth alternative that nobody chooses makes a test longer without making it better.
	True-False — The true-false format should be avoided owing to the relatively high probability of guessing the correct answer, and (2) differences in the interpretation of "true" and "false". Knowledgeable applicants are often scored incorrect because they know of exceptions to what are scored on the test as true statements.
	Position of correct answer — The position of the correct answer in the series of alternatives should be decided by chance in order to prevent applicants from benefiting from systematic patterns, such as a tendency to put the correct answer in the middle of the series.

WORDING OF ITEMS

Licensing authorities should make every effort to prevent applicants from passing the test simply by memorizing the answers to a limited number of test questions. The best means of achieving this objective is by drawing from a large pool of test items. The availability of a large test item pool permits development of many alternative forms and, with computer testing, generation of a virtually unique test for each applicant. These practices prevent applicants from gaining high scores simply because they have taken the test before.

Standard	Items should be worded to maximize the likelihood that applicants who know the answer will answer the item correctly and those who do not know it will answer incorrectly (validity).
Rationale	This practice supports the applicant's learning of the driving knowledge requirements as opposed to memorizing test question wording.

Policy Guidelines	In order to achieve this objective, the following should be avoided: • Complex words or phrases — The test should measure driving knowledge, not verbal skill. • "All of The Above" — In this type of question, all of the alternatives are actually correct. Applicants may read no further than the first alternative. • "None of The Above" — In those cases where this is the correct response, there is no way to determine whether an applicant knows what the correct answer truly is. • Legalese — What is written by and for lawyers is not necessarily understood by the public. Avoid legal terms and direct excerpts from motor vehicle legislation. • Use of the negative form — A question that starts "Which of the following is not..." requires applicants to search for an incorrect answer. Knowledgeable applicants frequently forget this and choose the correct answer. • Inconsistent alternatives — Inconsistencies that attract attention to a particular alternative should be avoided, for example, alternatives that are substantially longer than others, use of attractive words such as "safely," or including a rationale for incorrect answers to make them appear more plausible.

KNOWLEDGE DOMAINS

The larger set of test questions should be drawn from the smaller set of knowledge domains similar to that laid out in Table 1. This table demonstrates the categorization of knowledge areas into a smaller subset of knowledge domains from which questions can be drawn.

Table 1: Knowledge Domains - Passenger Vehicles

PRE/POST DRIVING	COMMUNICATION	DRIVER PREPARATION
Adjustments	Signaling intentions	Fitness
Occupant protection	Communicating	Use of alcohol and other drugs
Vehicle inspection	Presence	Driver distractions
Securing vehicle		Road rage
		Aggressive driving
VEHICLE CONTROL	**ADJUSTING SPEED**	**SHARING THE ROAD**
Starting	Compliance with limits	Cyclists & pedestrians
Accelerating	Adjusting to traction Adjusting	Tow-trucks
Shifting (manual transmission)	to visibility Adjusting to traffic	Large/commercial vehicles
Steering	Specific hazards	Motorcycles
Staying in lane		Animals
Turning		Emergency vehicles
Regulating speed		
Slowing/stopping		
Special handling characteristics		
Backing		

RULES OF THE ROAD	POSITIONING VEHICLE	DRIVING ENVIRONMENT
Traffic controls	When following	Fog
Lane control	Passing vehicles	Glare
Turns	Crossing/entering intersection	Lighting
Right-of-Way	When stopping/parking	Snow, ice (including black ice), rain
Vehicle restrictions		Gravel roads
Parking restrictions		Construction
		Flooding
VISUAL SEARCH	**HANDLING EMERGENCIES**	**VEHICLE READINESS**
Maintaining attention	Vehicle failures	Safety check
Search ahead	Collision avoidance	Inspection
To the side	Crash procedures	
Over-the-shoulder		
Mirrors		
Headlight use		

KNOWLEDGE ELEMENTS AND DOMAINS FOR MOTORCYCLE KNOWLEDGE TESTING

This list provides additional knowledge domains for a motorcycle specific knowledge test. It is not assumed that applicants taking a motorcycle specific knowledge test have already passed the basic knowledge test for passenger vehicles and thus, the knowledge domains above remain relevant for new motorcycle riders.

Table 2: Knowledge Domains – Motorcycles

VEHICLE INSPECTION	LANE POSITIONING
Pre-ride check	Visibility (see and be seen)
	Space cushioning
	Avoiding surface hazards
	Escape routes
PROTECTIVE GEAR	**NEGOTIATING CURVES**
Conspicuity	Speed control
Protection	Line selection
	Visual directional control
	Counter-steering for cornering
MOTORCYCLE CONTROLS	**EMERGENCY MANEUVERS**
Location	Stopping quickly
Operation	Obstacle avoidance
	Vehicle failures
VEHICLE CONTROL	**SPECIAL RIDING SITUATIONS**
Getting underway/clutch control	Carrying passengers and loads
Balance and direction control	Roadway characteristics
Shifting	Weather factors
braking	

ROAD SIGNS TESTING

Testing on knowledge of road signs is particularly important as it is an indicator of an applicant's ability to understand driving and road rules that govern safe and effective traffic movement. Various methods can be used such as multiple-choice, charts, and communigraphic questions. Computer technology is making this latter form of testing much simpler and facilitates updating of educational and testing material.

HAZARD PERCEPTION TESTING

Hazard perception is a vital component to safe driving and hazard perception tests (HPTs) are being used with greater frequency for driver training, assessment and licensing. Hazard perception is defined as drivers' ability to anticipate potentially dangerous situations on the road ahead.[6] Observers must recognize the existence of a potentially hazardous event, make a judgement as to whether its trajectory or their own vehicle could cause a conflict and then determine an appropriate response.[7] In contrast to dynamic hazard perception testing (DHPT), static hazard perception testing (SHPT) provides no motion information.

In general, hazard perception testing has been related causally to collision risk[8] and performance on HPT predicts crash risk in diverse populations.[9] Many studies that have looked at the validity and effectiveness of hazard perception testing have used dynamic sequences or simulated scenarios versus the use of still images. However, evidence is not sufficiently clear-cut to be able to say that one approach is better than another.[10]

Scoring the Test

DETERMINING THE QUESTIONS

Individual jurisdictions will ultimately decide the number of test items that must be answered correctly in order for the applicant to pass the test. What jurisdictions can influence is the knowledge levels of the licenced population; the higher the standard, the more people will be expected to know.

Standard	Pass/fail rates to be reviewed to maintain the accuracy and fairness of the test.
Rationale	It is important to review pass and fail rates, along with questionable items (those with significantly higher or lower correct responses) to ensure fair, accurate and valid testing.

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[6] Horswill and McKenna, 2004

[7] Scialfa, Borkenhagen, Lyon, Deschenes, 2012

[8] Insurance Institute for Highway Safety, 2010; McKnight and McKnight, 2003

[9] Darby et al., 2009; Horswill et al., 2010a; Wells et al., 2008

[10] Scialfa et al., 2012

Policy Guidelines	Response frequencies - The proportion of applicants answering each item correctly or incorrectly should be examined to determine possible deficiencies in the wording of items.
	Items with extremely low post-test pass rates and those showing little pre-post improvement should be examined to make sure they are not misleading in some way. On the other hand, if the percent choosing the correct answer is close to 100%, wording should be examined to make sure that the correct answer is not being given away.
	Where an unacceptably high proportion of applicants fail to meet established passing standards, efforts should be made to seek improvements in applicant knowledge and/or test procedure rather than lowering the test standards.
	Improvements may include the following steps: - Examining individual items to identify the specific ones that are causing trouble, - Revising the test to clarify any ambiguous questions and eliminate unnecessarily fine distinctions, and - Revising the treatment of the corresponding subject matter in the driver manual where the test items appear valid, giving it greater visibility and/or improving the effectiveness of communication.

EVALUATING KNOWLEDGE TESTS

Any knowledge test must be evaluated against the purpose it serves. The purpose of a driving knowledge test is to foster safe operation of vehicles. The questions that make up a licence test constitute a small sample of what drivers are expected to know. If the sample does not give a reliable estimate of an applicant's overall knowledge, the test may fail many applicants who really know enough to pass while passing many applicants who do not.

Standard	• A minimum of 80% is required to pass a knowledge test.
Rationale	In the general educational arena, a passing grade has historically been recognized at lower than the current Canadian knowledge test standard of 80%. Where knowledge and skill are related to the need for higher standards, a higher pass threshold may be justified. Such is the case for driver licensing.
	Most of those taking the knowledge test are new drivers, lacking the skill and road savvy that comes with experience. For such a population, a high standard can be justified.
Policy Guidelines	Being informed of the scoring standard in advance will encourage the preparation needed to take the knowledge test with greater confidence.

Alternate Test Forms

Alternate forms of the knowledge test are generally available in Canadian jurisdictions to minimize the chance of an applicant's being able to answer questions correctly because of previous exposure to the same questions on an earlier test.

AUTOMATED TESTING

Electronic and computer devices have been developed and widely used to automate the administration of knowledge tests. While a wide range of automated devices are available, almost all display test questions on a screen and require responses to be registered electronically.[11]

Automation offers a number of potential advantages:
- Processing — reduced labour associated with scoring tests. This includes not only marking but the recording of results entered into driver records and stored for statistical purposes.

- Reduces human error; no subjectivity with computer marking.

- Feedback — automation allows applicants to be given correct answers after they have responded, and their answers have been recorded. A key value of feedback is relieving examiners of the need to explain and justify answers to applicants who fail the test and ask to review their results; an activity that can be more demanding of an examiner's time than scoring the tests.

- Individualization or randomization — automation allows different sets of test items for individual applicants. Individual items are selected at random for each applicant from a pool of electronically stored test questions. While automated testing lends itself to such an approach, it is also relatively simple to print various forms of the test where questions have been randomly generated. With a large enough item pool and adequate test length, individual forms would be representative and equal in overall difficulty. The possible number of test "forms" would be extremely large. The selection of items can be programmed to prevent the answers to one item appearing in the stem of another question.[12]

  The advantage of such individualization is two-fold. First, it prevents applicants from knowing in advance the specific set of items on which they will be tested, thereby reducing cheating. Second, it allows for termination of tests if the applicant hits the fail threshold. The time saved frees up the test equipment for other applicants, thereby increasing system efficiency.

- Imagery — Computer technology allows detailed static and dynamic images to be displayed in full color relatively inexpensively. Questions about driving situations can be presented in the same way they occur on the road, allowing complex situations to be addressed without placing demands on verbal skills. If applicants know what to do in actual driving situations, they should be able to answer questions correctly; a requirement for valid testing that often cannot be achieved through written knowledge tests.

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[11] AAMVA Guidelines for Non-commercial Knowledge and Skills Test Development, 2014.

[12] Ibid

WRITTEN TESTS

While historically the method of choice, written tests are becoming more of a secondary format compared to electronic or computer testing. An applicant's knowledge is tested by using a series of written questions, which may be printed from electronic, randomly selected questions. This way, various forms of written tests are more easily generated in order to minimize the chance of an applicant memorizing responses.

READING IMPAIRMENT

Some applicants have various forms of reading impairment which impact their ability to successfully take a written or online version of a knowledge test. These reading impairments are distinguished from those of applicants whose primary language is not English or French, and can involve the form of language, including grammar, morphology, syntax, and the functional aspects of language, including semantics and pragmatics.[13] Oral tests are generally used to test applicants whose ability to read is impaired.

The AAMVA Guidelines for Knowledge and Skill Test Development (2014) identify several drawbacks to oral testing: (1) the spoken word is incapable of handling questions dealing with highly visual content, such as signs, signals, and scenarios (e.g., hazard perception) (2) even where reading limited applicants are able to understand questions, they may be unable to weigh the alternative responses simultaneously in selecting among them, (3) the oral testing process can be influenced by the examiners, who may provide aid that is unavailable to an applicant taking a written test, and (4) oral testing is extremely labour intensive and therefore more costly than written testing.

Standard	Jurisdictions will have policies in place to address requirements for oral testing.
Rationale	The standardization of oral testing is important to maintain the integrity and validity of knowledge testing. Having guidelines in place provides consistency both for staff and clients and supports the integrity of knowledge testing and its contribution to safe driving.
Policy Guidelines	Oral questions should follow the content outline in written/electronic testing with consideration given to phrasing and terminology that can be understood by the applicant. In some situations, oral questions could be utilized to confirm certain areas where the examiner feels the applicant is unsure. Questions should be clear in meaning, direct and have a defined response. Oral questions should not allow or ask an answer of opinion as this could lead to argument and contribute to confusion about a correct response. Where used, the pass-fail rates of individual examiners should be reviewed periodically to identify those whose averages deviate sharply from others in the same office or a recognized normal response rate.

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[13] Batshaw, Mark L, Roizen, Nancy J., & Lotrecchiano, Gaetano R. (2016). *Children with disabilities.* 7th ed. Baltimore: Paul H. Brookes.

FOREIGN LANGUAGE TESTING

Foreign language[14] versions of knowledge tests are common among Canadian jurisdictions. Offering knowledge tests in other languages is one way to ensure the equitable testing of foreign-speaking applicants.

Standard	Policies and processes should be in place to ensure the integrity of the translation process and outcomes, to ensure the equitable testing of foreign-speaking applicants, and to prevent cheating (**see following section**).
Rationale	The inability to read or speak the English and French languages is not necessarily a barrier to proper motor vehicle operation so long as drivers meet prescribed knowledge requirements and are able to interpret highway signs, signals and road instructions. It is the responsibility of the licensing agency to assure that these conditions are met before issuing a licence and fulfilling this responsibility imposes special requirements. Given the importance of mobility to the welfare of the individual, the inability of an individual to pass the knowledge test in English or French may lead to gaining a licence fraudulently or operating a vehicle without one. Steps taken to accommodate the needs of foreign-speaking applicants will help prevent unqualified drivers from undermining safety on our roads.
Policy Guidelines	Alternate forms of the written test may be translated for foreign-speaking applicants that cannot complete the test in English or French. Where foreign language versions of tests are unavailable, or where applicants are not literate in their own language, oral testing may be used to assess knowledge. Where translators may be used to assist in the testing process (see following section), applicants should not be permitted to bring their own translators. If no examiner speaks the language, arrangements can be made to employ, or obtain assistance from an independent and jurisdictionally approved translator.

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[14] Recognized as those that are not official languages of a jurisdiction. For example, the Northwest Territories and New Brunswick have English and French as official languages. Nunavut has four official languages: Inuktitut, English, French and Inuinnaqtun.

USE OF TRANSLATORS & INTERPRETERS

In some cases where an applicant is impaired by a language barrier, it may be desirable to obtain an interpreter or translator to assist with the knowledge test.

Standard	• Language translators used for knowledge testing will be approved by the jurisdiction. • Interpreters for the deaf and hard of hearing used for knowledge testing will be approved by the jurisdiction. • Jurisdictions will have policies in place to address the risks and consequences of cheating.
Rationale	The applicant must be able to understand basic directions from the test administrator with support from a qualified translator, including interpreters for the deaf and hard of hearing.
Policy Guidelines	A qualified translator used by applicants should have credentials proving they are one of the following: • Be employed, or have been employed, in interpreter or translation services • A member, or have been a member, of a professional association that provides interpreter and translation services (e.g. Association of Translators and Interpreters of the jurisdiction). In-person interpreters and/or translators should show a valid photo identification prior to conducting on-site interpretation and/or translation services. Interpreters should not provide translation or interpretation services for family members.

Chapter 3:   Testing Administration

With increased attention paid to driver licences and licensing post-September 11, 2001, driver licensing fraud began to surface as a significant problem, including in the testing and licensing of drivers. The documents issued by driver licensing authorities have significant street value for those who wish to commit crime or illegally obtain financial benefits and entitlements.[15]

It is important to control the knowledge test process and environment to minimize fraud and protect the integrity of the test. Cheating, copying or consulting with any person other than an authorized test administrator during the test is not permitted. This undermines the validity of the test as a means to ensure safe drivers on our roads.

TEST SECURITY, FRAUD PREVENTION AND CHEATING

Standard	- Questions for all forms of knowledge test will be randomly assigned. - Written versions of the test will remain with the licensing or testing authority and not the applicant. - Jurisdictions will have policies in place for consequences of cheating on knowledge tests. - Unapproved electronic devices are not to be used during the test.
Rationale	As licensing authorities increasingly develop online knowledge practice tests, questions will be widely available to applicants. Having randomized versions of tests, written, electronic and verbal/oral, will help ensure the integrity of the knowledge test. Having processes in place for testing (all forms) will minimize and prevent cheating.
Policy Guidelines	Examination stations should be arranged to mitigate the opportunities for copying, cheating and other fraudulent behavior such as checking answers on cell phones.

SCHEDULING KNOWLEDGE RE-TESTS

Standard	Applicants who fail the knowledge test are required to wait at least one day before being re-tested.
Rationale	Some applicants may seek an immediate retest in the mistaken belief that they can pass simply by looking up answers to the questions they missed, an unlikely event where alternate forms are administered. Requiring a day's wait provides applicants an opportunity to study areas where they lack sufficient knowledge and thus prepare for any test form they might receive.
Policy Guidelines	NA

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[15] AAMVA. (2015). *Best Practices for the Deterrence and Detection of Fraud*.

Chapter 4:   Higher Class Vehicles (Classes 1-4)

Generally, passenger vehicle licensing standards, rationale and guidelines are the foundation upon which knowledge testing for higher classes is based; including learning basic driving concepts, rules of the road and road signs. While most of the standards and guidelines for passenger vehicle knowledge testing apply for commercial classes, there are some unique differences. Only the unique elements are addressed below.

READING IMPAIRMENT

Most Canadian jurisdictions limit knowledge testing for higher class licences to French and English. Where there are impairments to the ability to read in either of these languages, oral testing may be available.

Standard	If permitted, above standards for passenger vehicles should be an absolute minimum and compliance monitoring strictly adhered to.
Rationale	Given the potential for greater harm associated with heavy, commercial vehicle crashes, Canadian policy as articulated in the National Safety Code, imposes a higher threshold for testing, licensing and operating.
Policy Guidelines	Jurisdictions should consider U.S. Federal Motor Carrier Safety Regulations[16] when developing new policies and practices. FMCSA requires that drivers be able to read and speak the English language sufficiently to converse with the general public, to understand highway traffic signs and signals in the English language, to respond to official inquiries, and to make entries on reports and records.

FOREIGN LANGUAGES AND USE OF TRANSLATORS & INTERPRETERS

Knowledge testing for higher class driver licences is even more restricted with respect to foreign languages. The use of translators is much more limited given the general higher level of skill and driving behavior that is expected for driving commercial vehicles. Drivers are expected to be able to communicate in English or French for the purposes of compliance and enforcement related to driver and carrier requirements in the National Safety Code.

Standard	• Translators used for knowledge testing will be approved by the jurisdiction.
Rationale	This allows jurisdictions to control and monitor the quality and integrity of knowledge tests.

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[16] Link to FMCSA Regulation
https://www.ecfr.gov/cgi-bin/retrieveECFR?gp=1&ty=HTML&h=L&mc=true&=PART&n=pt49.5.391#se49.5.391_111

Policy Guidelines	A qualified translator used by applicants should have credentials proving they are one of the following:
	• Be employed, or have been employed, in interpreter or translation services
	• A member, or have been a member, of a professional association that provides interpreter and translation services (e.g. Association of Translators and Interpreters of the jurisdiction).
	In-person interpreters and/or translators should show a valid photo identification prior to conducting on-site interpretation and/or translation services.

PART 3:

PERFORMANCE TESTING: ROAD AND PRACTICAL

Chapter 1: Introduction

The purpose of a road or performance test is to assess an applicant's necessary skills to operate a vehicle in a manner consistent with the safety and mobility of the motoring public.[17] What a performance test can do is to influence applicants to acquire requisite skills through instruction and practice, and to assure possession of these skills before they are issued a licence to operate unsupervised. However, it cannot necessarily predict how safely people actually drive when they are not being tested as the way people behave on the highway is influenced by attitudes and habits that are seldom revealed in the presence of a licenced examiner.

A New Model for Assessment

Assessing driving skills and performance is done in a number of contexts, for example, for new drivers, commercial drivers, renewal of a driver licence, and determining fitness to drive. In the last context, there has been a shift in the approach taken to assessing driving skill, which is relevant to our considerations for this standard. Traditionally, CCMTA medical standards were based mostly on the diagnostic model, that is, on the medical condition and the presumed group characteristics of people with that condition rather than on how the medical condition affected the functions necessary for driving on an individual basis. In terms of an evidentiary basis, the standards reflected the consensus opinion of practicing physicians. Nationally and internationally, driver fitness authorities are moving toward adopting a functional approach to driver fitness. A functional approach means that, when making driver fitness determinations, the focus is on the effect that a medical condition has on the functions necessary for driving rather than making a decision based solely on a diagnosis. The functions necessary for driving are cognitive, motor, and sensory. To the extent possible and relevant, this part of NSC 2 will strive to be consistent with the functional approach as outlined in NSC 6 – Determining Driver Fitness in Canada.

Skills

While driving skills are differentiated from knowledge, the latter is recognized as key to achieving a skill as defined by Miriam Webster:

> the ability to use one's knowledge effectively and readily in execution or performance
> dexterity or coordination especially in the execution of learned physical tasks
> a learned power of doing something competently: a developed aptitude or ability.[18]

Driving specific skills are distinguished from basic sensory, attentional, perceptual, cognitive and psychomotor abilities. While tests for the latter are appropriate to assessment of individuals who may be deficient with respect to certain abilities, they have traditionally been outside the scope of initial licence testing. However, this is changing and jurisdictions around the globe, and indeed in Canada, have implemented elements of risk assessment and hazard perception testing to address these relevant abilities.

While basic cognitive skills are required to learn and apply facts, procedures, and principles, driving-specific cognitive skills are primarily concerned with navigation rather than safety.   Applicant skill is inferred from performance in responding to highway traffic conditions encountered during the road

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[17] American Association of Motor Vehicle Administrators. (2014). *AAMVA Guidelines for Non-commercial Knowledge and Skills Test Development*. Arlington, VA: AAMVA.

[18] Online Miriam Webster Dictionary. https://www.merriam-webster.com/dictionary/skill. Accessed January 28, 2018.

test. The road test itself consists of applicant performances that examiners are to observe, the criteria that distinguish acceptable from unacceptable performance, routes over which the test takes place, administrative procedures, and a method of scoring performance to determine whether applicants have passed or failed the test.

Testing Modes

Testing driving skills may be done in a number of ways:

Road testing — Observing and recording the performance of applicants operating their own vehicles over prescribed routes under prevailing traffic conditions. In some cases, special vehicles may be required for fitness and general driving assessments such as those with hand controls, interior mirrors, dual brakes, and small round mirrors that assess where the driver is looking (used by driver examiners).

Practical and off-street testing — Observing and scoring the performance of applicants carrying out prescribed maneuvers under controlled conditions in an off-street area. May be more commonly used for certain types of commercial vehicles and motorcycles, for example, air brake testing, pre-trip inspections and motorcycle skills tests.

Simulation — Observing the performance of applicants responding to highway traffic conditions simulated through displays and controls that demand of drivers the same skills required in operating an automobile.

The various testing modes are suited for assessment of different skills and require different procedures.

Administration of Road Tests

A road or practical test is the best means to gauge a driver's capability to operate a motor vehicle safely under varying road and traffic conditions, as well as a measure of their knowledge of the vehicle and rules of the road. The driving test can also help to mold safe driving attitudes as well as reinforce and solidify safe driving practices. Driver examination is a key element of road testing and is addressed in NSC Standard 3.

Skills cannot be measured directly but are inferred from performance in carrying out various driving tasks. To yield reliable and valid measures of skills, the performances making up a skill test must meet the following requirements:

Uniformity — All applicants must receive essentially the same test, no matter when or where they take it. Applicants with the same ability should have the same probability of passing the test.

Objectivity — The scores received by applicants should reflect their performance to the greatest extent possible and be influenced as little as possible by examiners. Two examiners observing the same performance should score the applicant in the same way.

Public Acceptance — Any skill test must be acceptable to the public in that it must appear to be a valid measure of necessary driving skills, must avoid subjecting applicants to stress or unnecessary embarrassment, and must minimize exposure of them, driver examiners or the general public, to danger.

Chapter 2: Road Test

Certain preparations will help to ensure that the driver will be given the best possible driving test. Important is recognition of more general principles in giving and scoring the driving test:

- A driving test is not intended to train or re-train the driver, its purpose is to evaluate their driving skill and knowledge.
- A thorough driving test with high standards will encourage drivers to acquire driving skills and experience beforehand.
- Feedback on the road test is an opportunity for learning.

An important element in the effectiveness of the driving test is the method used for scoring. While answers to written questions are either right or wrong, road test elements may require a degree of judgement by examiners, for example, signaling for a left turn. If the signal were given 30 metres in advance of the turn, clearly, correctly, and continuously through the turn, it would be entirely correct. But if it were given only 15 metres in advance of the turn, if it were discontinued before the turn was begun, and if it were such that it might be mistaken for a right turn signal where the driver is signaling by means of his hand, it would be partly right and partly wrong. In such cases, the driver examiner must decide whether or not the degree of error is sufficient to score a demerit or fail an element.

Prior to Road Test

ADMINISTRATION

Jurisdictions should ensure that applicants are lawfully entitled to have a valid licence, temporary permit, or are statutorily permitted for the class of road test they are taking.   In addition, a driver may have other conditions on the licence such as requiring glasses or ignition interlock.   Examiners should also ensure that the vehicle is properly registered and insured.

Standard	- Driver has valid and appropriate driver licence. - Vehicle is properly registered and insured. - All other legal requirements and conditions are met prior to beginning the road test. - An individual will not be permitted to begin a road test where a driver examiner reasonably believes that the applicant is impaired by drugs or alcohol.
Rationale	Invalid licensing increases the risks associated with crashes and impacts the validity of insurance for all parties. With respect to other legal requirements, a significant development in driver assessment came with the '*Grismer*'[19] case in B.C. which held that each driver must be assessed according to the driver's own personal abilities rather than presumed group characteristics. While this functional approach has evolved from a driver fitness context, driver road tests more generally have moved towards a consistent approach both nationally and internationally.

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[19] British Columbia (Superintendent of Motor Vehicles) v. British Columbia (Council of Human Rights), [1999] 3 S.C.R. 868

Policy Guidelines	Other legal requirements may be indirectly related to driver licensing or vehicle registration and insurance, for example, human rights legislation and legal precedent. Generally, only the applicant and the driver examiner can be in the vehicle for a road test. However, provincial human rights legislation may provide for specific situations that would allow for individuals and assistance animals to accompany the applicant.

VEHICLE CHECK

Applicants must bring a vehicle to the road test that is safe to drive and meets the Federal Motor Vehicle Safety Standard. A vehicle check prior to the road test helps ensure the safety of all parties, giving the driver examiner discretion to refuse a road test if they deem the vehicle unsafe.

Standard	Road test vehicles must be inspected prior to commencing a road test and deemed safe and legal for on-road driving. Inspections must be completed by a certified or jurisdictionally approved driver examiner.
Rationale	Vehicles for road testing need to be in proper working order for on road assessment and safety of the applicant, the examiner and the public.
Policy Guidelines	Vehicles with serious defects or deficiencies should not be taken out on road tests, for example: – steering – speedometer – brakes including parking brake – windshield wipers not working (when raining) – brake and signal lights not working – faulty seatbelts – noisy exhaust and leaks – environmental concerns such as smoking or cannabis Jurisdictions may specify other conditions.

Skill Requirements

A driving "skill", as defined by AAMVA[20], is an ability that requires both knowledge and practice for its attainment. The specific driving skills addressed are those considered critical for the safety of both the driver and other road users. The skills that are required for safe automobile operation may be divided into the following three categories:

Attentional — The ability to focus and shift attention, e.g. to monitor traffic ahead and to the side in a merge.

Perceptual — The ability to perceive characteristics of the many highway traffic environments in a way that permits safe vehicle operation, e.g. judging gaps, identifying hazards.

Motor — The ability to manipulate controls in order to maneuver the vehicle, e.g. ability to rotate the steering wheel in relation to the motion of the vehicle and intended path when turning a corner.

SKILL CATEGORIES

Standard	Required skills in each category:
	Attentional Skills
	• Attention-sharing - Controlling and maneuvering a vehicle while attending to traffic controls and other road users (search, signaling, space management)
	• Attention shifting - Shifting attention as needed (ahead, to the side, and to mirrors, observation checking and visual scanning)
	Perceptual Skills
	• Spatial judgment - Judging the nature and magnitude of changes in speed and direction of other road users
	• Gap judgment - Judging the adequacy of gaps when merging, crossing, or entering traffic
	• Distance judgment - Judging the adequacy of distance of an oncoming vehicle when passing
	• Hazard detection - Detecting hazards; characteristics and movement of other road users in the roadway environment, for example, pedestrians, cyclists, emergency vehicles and potholes.
	Motor Skills
	• Acceleration - Regulating pedal force to accelerate on level and inclined surfaces.
	• Shifting - Coordinating clutch, accelerator, and shift lever if manual transmission is used.
	• Maintaining speed - Regulating accelerator force in order to maintain a steady speed

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[20] AAMVA. (2014). *Guidelines for Non-commercial Knowledge and Skills Test Development*. Washington, D.C.: AAMVA.

	- Lane keeping - Coordinating speed and steering in order to keep the vehicle position within lane on straight and curved paths. - Turning - Coordinating speed and steering when turning corners; left and right-hand turns. - Slowing - Regulating brake and accelerator to reduce speed - Stopping - Coordinating brake, accelerator (and clutch) to bring the vehicle to a stop at a given point - Backing - All of the above in moving the vehicle backward - Adjusting to limited traction - All of the above when operating on slippery surfaces - Parking - On level surfaces, on hills, between vehicles
Rationale	The specific driving skills addressed are those considered critical for the safety of both the driver and other road users.
Policy Guidelines	**Road Test Maneuvers** Even when the performances to be observed are limited, no examiner can possibly observe them all. Whether or not examiners observe a particular performance depends on whether their attention is specifically focused on it. In deciding what performances should be scored, the following needs to be considered: Opportunity - Situations requiring each performance must occur with sufficient regularity to assure that all applicants are scored on the same set of performances. Looking for performances that depend upon particular traffic conditions or weather conditions tend to be unproductive as well as detracting from the uniformity of the test. Objectivity - Performances that can be assessed objectively are to be preferred over those that require subjective judgment on the part of the examiner. For example, signaling, checking a mirror, or staying in the correct lane can be defined far more objectively than slowing for a "hazard." Safety/Mobility - Performance tests should be conducted in an environment that does not threaten the safety of the applicant, examiner, or other road users, or obstruct traffic. One way of assuring that attention will be properly focused is by identifying the sequence of performances as they occur in specific maneuvers. Maneuvers that involve a set series of performances include: - right/left turns without cross traffic - right/left turns with cross traffic - straight across traffic - left turn - oncoming traffic - negotiating a curve - lane change and blind spot checking (shoulder check)

	• merge
	• straight driving
	• exit
	• traffic responses
	• parking
	• stopping
	• negotiating intersections, visual scan - looking left and right

Within each of the maneuvers, a set of performances can be listed in the order by which they occur during the maneuver. These performances form the basic elements of the road test, and include the following:

- Signal - for turns, lane changes, merges, exits
- Entry position - in turns, curves
- Entry speed - turns, curves
- Full stop - stop signs, traffic
- Stop position - stop signs, traffic lights
- Gap judgment - cross/enter traffic, lane change
- Search - in turns, lane changes, merges, straight driving
- Speed - in turns, curves, merge, exits, straight driving
- Path - in turns, curves, merges, exits
- Lane selection - in turns, straight driving
- Lane position - straight driving
- Following distance - straight driving
- Three-point turn
- Parking - straight, backing or reversing, hill, parallel, roadside stop

ROUTE SELECTION

All road testing should take place over specified routes. Examiners should not be called upon to make up routes during a road test unless they are faced with unexpected circumstances. Designating routes in advance helps to maintain uniformity in testing.

Standard	• Number of routes - Several routes should be devised for each licence testing location.
Rationale	Having only a few routes allows applicants to practice driving each route to the point that their performance reflects their memory of the route rather than their general driving skills.

| Policy Guidelines | Route length - Fifteen minutes of driving in typical urban-suburban settings generally allows for approximately 150 observations of the driver performances making up the maneuvers that have been listed. This number of observations is a minimum for reliable estimation of a driver's skill.[21]

Setting up routes - A test route should be viewed as a path between maneuvers. Locations that permit the full array of maneuvers should be selected first and routes planned to interconnect these locations. The art comes in finding enough of the right locations to test required knowledge and skills.

Maximizing observations - The various maneuvers differ greatly in the opportunities they provide to observe the performances that involve skill. For example, turning, particularly at uncontrolled intersections, permits much more opportunity to assess driver skill than does straight driving.   Routes need to be chosen in a way that will result in maneuvers that maximize the opportunities to observe scored performance.

Uniformity of maneuvers – Although test routes necessarily differ from one another, a degree of uniformity can be achieved by seeing to it that they all consist of the same number of each type of maneuver, e.g. three left turns across oncoming traffic, three with oncoming traffic controlled, and so on.

Route conditions - Areas characterized by many traffic lights, heavy vehicular travel or pedestrian traffic may need to be avoided if they introduce lengthy delays. The number of performances that can be assessed under these conditions may be too few for the time spent.

Separating observations - Locations at which performances are observed need to be sufficiently far apart to allow examiners time to record applicant performance. For example, requiring two turns a block apart may not allow the examiner enough time between the last observation of the first turn and the first observation of the next turn.

Traffic Dependent Performance

Traffic conditions along a test route may require decisions and actions that cannot be anticipated (e.g., following a vehicle ahead, cyclists on the road, responding to a pedestrian crossing the street, construction). Because there is no way of knowing in advance just where traffic-dependent situations will arise, the number and nature of situations may vary from one applicant to another. Jurisdictions should have a policy in place to address performance in these situations. |

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[21] AAMVA. (2014). *Guidelines for Non-commercial Knowledge and Skills Test Development*. Washington, D.C.: AAMVA

Chapter 3:   Termination of Road Test

Examiners should be permitted to immediately fail an applicant on the road test where a skill deficiency is sufficiently great that the continuation of the test is not only unnecessary but may place the applicant, examiner, or motoring public in jeopardy. Such performances would include, but not be limited to, running a red light, driving at extremely high or low speed, driving the wrong way on a one-way street or off-ramp, or requiring intervention by the examiner to avoid or prevent a crash.

Standard	Disqualifying Situations:
	• serious violations of traffic law such as speeding, careless driving, crossing double lines, not stopping at a stop sign
	• acts that endanger the driver examiner or the public
	• examiner intervention
	• a crash
	• lack of cooperation, aggressive/threatening/abusive (physical and/or verbal) behaviour toward driver examiner or refusal to perform a requested manoeuvre
	• offering bribes or a "gratuity"
Rationale	Examiners are permitted to immediately fail an applicant on the road test where a skill deficiency is sufficiently great that the continuation of the test is not only unnecessary but may place the applicant, examiner, or motoring public in jeopardy.
Policy Guidelines	A definition of dangerous action should be developed by jurisdictions capturing the key elements of the standard. Road tests may be terminated for reasons other than the applicant's lack of ability such as: • The vehicle running out of gas, having a punctured tire or otherwise failing to function during the driving test • Applicant becomes sick and is unable to continue safely • Weather or other environmental conditions become so unfavourable as to require termination of the road test for safety.

Chapter 4:   Scheduling Road Re-tests

No Canadian jurisdiction currently has a maximum number of times that a road or skills test may be taken for any class of vehicle. However, the majority provide for a waiting time for road re-tests.

Standard	• Applicants who fail the road test are required to wait at least one week before being re-tested.
Rationale	Requiring a wait time provides applicants an opportunity to practice areas where they lack sufficient skill.

Chapter 5:   Off-Road Testing

The ability of applicants to carry out certain vehicle maneuvers can be assessed more accurately in the off-road environment than on the road. These maneuvers may be more demanding and require a unique skill level; require a more precise measurement (such as stopping distance); or require completely standardized test characteristics.

Off-road skill testing has been used primarily for three purposes:

(1) Pre-test screening
Initial screening for minimum skill levels before applicants are exposed to the potential hazards of road testing. The ability of applicants to control the vehicle may be so marginal as to make road testing a hazard to applicants, examiners, and the motoring public. In these cases, the interests of safety may be best served by assessing applicants before a road test begins. Basic skills may be assessed by a separate test conducted in a parking area such that several turns and stops are required before entering the road.

(2) Assessing Vehicle Control Skills
This allows for certain vehicle control skills to be assessed more efficiently than is possible in an uncontrolled road environment. Off-street tests have been used instead of, or in addition to, road tests. Basic vehicle driving skills that are testable off-road are those involved in accelerating, (including shifting gears), braking, turning corners, and backing. Exercises capable of assessing these skills have been devised using stanchions, traffic cones, painted lines, and in some facilities, traffic control devices such as stop signs, yield signs, and traffic lights. This form of off-road testing is more recognizable in motorcycle testing, where many Canadian jurisdictions conduct an off-road skills or basic handling assessment prior to allowing new riders on the road.

(3) Emergency Skills Testing
Permits assessment of emergency skills not safely assessed in a road test. The off-street environment offers an opportunity to assess skills in carrying out emergency maneuvers without interference from or risk to other road users.   Important emergency maneuvers include maximum braking, evasive steering, and skid recovery. None of these skills are currently part of automobile licence testing.

Chapter 6:   Simulation

The limitations of a road test as a measure of skill has stimulated interest in simulation although there is limited use in Canadian jurisdictions at this time. The potential benefits of simulation over road testing in the assessment of driving skills include:

Scope — in a few minutes, an applicant can be confronted with an array of highway traffic situations that it might take days or weeks to encounter on the road,

Uniformity — every applicant can be presented with the same situation, or situations that have been equated for difficulty,

Automation — the examiner performance recording, scoring and debriefing functions can be carried out automatically, and

Safety — applicants can be presented with hazardous conditions to which examiners may be reluctant to expose to an unlicenced driver.

As an adjunct to the licensing process, low-cost forms of simulation may have potential benefit in pre-screening drivers to (1) avoid testing unprepared and potentially dangerous applicants, (2) identify renewal or out of state applicants who may require road testing, (3) guide examiners in deciding on the nature and length of road testing, and (4) to help pinpoint the source of deficiencies among drivers performing poorly on the road test.

Simulators appropriate to assessment of driving skills fall into two categories: (a) interactive, in which drivers respond to simulated highway traffic scenes while the scenes change as a function of what the driver does and (b) non-interactive, in which the simulated scenes are prerecorded and remain the same no matter what the driver does.   More specifically:

Interactive Simulation
An interactive simulation is one that people can actually "drive" in that simulated driving scenes change realistically as the driver operates the simulated controls.

Non-Interactive Simulation
In non-interactive simulation, drivers respond to recorded images of the scene ahead of the vehicle and that afforded by its mirrors. Since the images are pre-recorded, the scenes do not respond to what the driver does; thus, this type of simulation is limited for teaching or testing vehicle control skills.

Chapter 7:   Motorcycles

In general, the above standards will apply where relevant. The domain and skill elements below are unique to road testing for motorcycles.

Standard	**Preparation** • Vehicle inspection • Motorcycle controls • Motorcycle riding gear **Motorcycle Control** • Getting under way and riding slowly **Motorcycle Operation** • Shift smoothly • Maintain directional control • Use of both brakes • Use of mirrors and head checks • Gap selection • Prevailing speed **Lane Positioning** • Visibility • Lane protection • Space cushioning • Escape route • Surface hazards • Stop position in lane **Turning** • Visual directional control • Speed management **Emergency Situations** • Quick stop • Obstacle avoidance

Rationale	The domain and skill elements captured in this standard are unique to road testing for motorcycles to ensure correct handling and safe riding.

Policy Guidelines	**Motorcycle Controls**
	• identification
	• operation
	Getting Under Way and Riding Slowly
	• smooth clutch control
	• balance and coordination
	   ▪ using foot/feet balance
	   ▪ visual directional control
	Motorcycle Operation
	• riding through and turning right and left at intersections
	• entering and leaving traffic
	• riding straight, on curves and hills
	Shift Smoothly
	• no missed shifts or gear grinding
	Visibility
	• being seen
	• seeing others
	Speed Management
	• lane/boundary violations
	Parking
	• at side of road
	• reverse stall

SCHEDULING ROAD RE-TESTS (MOTORCYCLES)

Where an individual fails their motorcycle road test, rescheduling a re-test is treated similarly to class 5 road re-testing. However, some jurisdictional practices differ from the rescheduling of motorcycle practical tests.

Standard	• Applicants who fail the road test are required to wait at least one week before being re-tested.
Rationale	Requiring a wait time provides applicants an opportunity to practice areas where they lack sufficient skill.
Policy Guidelines	

Chapter 8:   Higher-Class Vehicles (Classes 1-4)

As above, relevant standard elements from the class 5 road test will be applied. The standard elements below are unique to commercial or higher classes of licences.

<u>PRE-DRIVE</u> <u>VEHICLE</u> <u>CHECK</u>

Standard	- Pre-drive vehicle checks will be in compliance with NSC 13 – Daily Vehicle Trip Inspection. - Vehicle elements to be checked: - signal and brake lights - headlights and horn working - brakes working, including air brakes - windshield (cracks and tinting) - seatbelts working - vehicle properly licenced and insured - emergency equipment
Rationale	The daily vehicle trip inspection standard (NSC 13) is intended to ensure early identification of vehicle problems and defects, and to prevent the operation of vehicles with conditions that are likely to cause or contribute to a collision or vehicle breakdown.
Policy Guidelines	Jurisdictions may check for proper seating, hand position and mirror adjustments. In addition, it is important to ensure that the gas tank or electric charge is sufficient to complete the road test.

<u>ON-ROAD</u> <u>ASSESSMENT</u>

Standard	- In addition to the applicable standard elements for passenger vehicles, the following are unique requirements for on-road testing for higher class licences: - backing up - starting and stopping smoothly - shifting gears - attention shifting (the ability to shift attention as needed, e.g., to the side, ahead, to mirrors) - attention sharing (the ability to control and maneuver a vehicle while attending to traffic controls and other road users)
Policy Guidelines	Parking manoeuvres are very important skills for higher class licensing, in particular for large commercial trucks. Parking may be assessed by using cones set up at a designated location for the backing-up or reverse maneuver. Jurisdictions should have policies in place to determine what constitutes a failure of the backing-up manoeuvre. This may include failing to sound the horn; failure to walk around before backing; making contact with an object; or, the examiner has to stop them from doing an unsafe maneuver.

ADMINISTRATIVE

Standard	- No internal cameras are allowed during the road test. - Except for training purposes and driver examiner performance evaluation, the only people allowed in a vehicle during a road test are the Driver Examiner and the customer.
Policy Guidelines	Electronic vehicle safety features such as lane departure warnings, electronic stability control, blind spot monitoring, are becoming more common not only in passenger vehicles, but commercial vehicles. For the purposes of driver licensing road tests, jurisdictions may limit their use in order to better assess the driver's skill in key areas. The length the road test is generally longer than for passenger vehicles or motorcycles given the added requirements to be assessed as a reflection of a higher standard for driving higher vehicles.

SCHEDULING ROAD RE-TESTS (CLASSES 1-4)

No Canadian jurisdiction currently has a maximum number of times that a road or skills test may be taken for any class of vehicle, including higher classes. However, the majority provide for a waiting time for higher class licensing road tests.

Standard	Applicants who fail the road test are required to wait at least one week before being re-tested.
Rationale	Requiring a wait time provides applicants an opportunity to practice areas where they lack sufficient skill.
Policy Guidelines	

PART 4:

AIR BRAKE TESTING

Chapter 1:   Introduction

Air brake systems are unique from hydraulic braking systems which are generally used in passenger vehicles. Air brakes are commonly found in larger, commercial vehicles because they are capable of stopping heavier vehicles safely. They use much greater force to apply the brakes than hydraulic braking systems and are more tolerant to small leaks which, in a hydraulic system, could result in brake failure.

As air brakes must be operated differently from more common hydraulic systems, drivers must have basic knowledge of proper operation and maintenance. They must also be able to perform required inspection of the air pressurization system prior to driving and make sure all tanks are in working order.

Chapter 2:   Knowledge Test

Standard	- Applicants will have a valid driver licence prior to applying for an air brake endorsement - The following areas are included in an air brake knowledge test: - vehicle braking systems - air supply subsystem - air brake subsystems - foundation brakes - demands on brakes while driving - air brake compliance - inspecting air brake components - inspection air brake system operation - inspecting air brake adjustment - reporting requirements
Rationale	Air brake systems are unique from hydraulic brakes and require specific application, inspection and maintenance. Pressure is applied slowly, and air levels must be monitored at all times as a loss in air pressure will result in brake lockup.
Policy Guidelines	If you are driving a vehicle equipped with air brakes, it is important to understand how an air brake system works and how it compares to other vehicle braking systems. The knowledge and practical testing components are critical to ensuring that a driver understands how to safely operate an air brake system.

AIR BRAKE PRACTICAL ASSESSMENT

Standard	The following elements are tested as part of the air brake practical assessment: preparing the vehicle for inspection foundation brake components and chambers at each wheel brake drums or rotors at each wheel all accessible air lines air tanks and drain valves air compressors low-air warning device air pressure build-up time and air loss rate air-compressor governor settings tractor (towing vehicle) protection valve automatic application of the trailer spring brakes spring (parking/emergency) brakes
Rationale	Same as above for the knowledge test.

| Policy Guidelines | Proper brake adjustment is important to your safety and that of other road users. Drivers of vehicles with air brakes should inspect brake adjustment regularly; commercial vehicles with airbrakes will be subject to relevant regulation such as NSC 13.

When conducting an inspection of the air brake system, be sure to take the following precautions to avoid potential hazards:
Park on a level surface to keep the vehicle from rolling. Inspection of the air brake system requires certain steps to be completed with the parking brakes released. A level surface will reduce the possibility of unexpected vehicle movement.
Park away from traffic and other hazards to provide a safe work area around the vehicle to conduct the inspection.
Turn off the engine. Moving parts within the engine compartment pose safety hazards, so inspections should always be performed with the engine stopped.
Avoid getting in the direct path or immediate area of compressed air exhausting from air brake system components.

During inspections, commercial vehicle drivers are required to report defective vehicle conditions as it is illegal to operate or drive a defective vehicle (NSC 13). |
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APPENDIX II: ROAD TEST SCORING GUIDELINES

These guidelines are intended to provide additional information on assessing driver skills and knowledge during a road test. The driver may show a number of repeated mistakes, lack of knowledge and skill which would point to the need for further knowledge and/or skill development. The following section will guide you in consistent scoring of problems on the driving test.

BEGINNING THE TEST

Key Points
Carefully watch whether the driver checks all controls before setting the vehicle in motion (seat, mirrors, etc.).   If the applicant checks traffic, then controls, then pulls out, he may be struck by a fast-moving vehicle that has come up while he was checking controls.

Points to Watch for
— Hand brake not released.
— Fails to check traffic in mirror and side window before starting.

SIGNALING INTENTION (General)

Signaling intention should be scored in connection with:

right turns and left turns into streets or driveways;
keeping in lane (score when changing lanes);
parallel parking, pulling out, slowing down;
starting, pulling away from the curb.

Points to Watch for:
— No signal given;
— Signaling combined with other operations;
— Signal changed or corrected.

CLUTCH (if applicable)

Key Points
Watch whether the driver constantly keeps foot on clutch pedal.

Points to Watch for:
— Clutch released in stopping when speed is 15 kph or over;
— Foot on clutch when not shifting (riding clutch);
— Engine stalls in stopping;
— Coasts downhill or around corners;
— Does not engage clutch smoothly;
— Clashes gears.
— Seat too far back to permit good brake pedal pressure, or too close;
— Unnecessary one-hand driving.

THE QUICK STOP (Skill Test)

To be done only if you are in doubt, re: driver or brakes. Have the driver depress brakes in response to a quick command to stop the vehicle (only when safe to do so).

Key Points

Look for following cars.   Do not give the test where cars are parked on both sides of a narrow street. Applicant is liable to swerve or slide into parked vehicles. Do not give the test if the street is slippery or if the vehicle is loaded with loose objects.

Points to Watch for:
— Stopping distance
— Vehicle swerves considerably;
— Necessary to pump brakes;
— Vehicle turns sideways.

BACKING (Skill Test)

This is a skill problem in driving backwards in a straight line and is normally given immediately after the quick stop.

Instructions

"Please back straight down the street just as if you were backing down a driveway."

Key Points

Give full credit for use of outside mirror on vehicles in which it is not practical to look back, if mirror is adjusted properly and vision not obscured. Make certain it is safe to back before you tell the driver to do so.

Points to Watch for:
— Backing too fast;
— Does not look back all the time while backing, but looks ahead and coasts last five feet;
— Opens door and leans out of vehicle to look back while vehicle is in motion;
— Uses mirror to back instead of turning head to look back through rear window;
— Fails to check traffic to left before starting to back;
— Backs into curb or across center of road.

PARALLEL PARKING (Skill Test)

This tests the driver's judgment and ability to park parallel to the curb.

Instructions

"In the middle of the next block, I would like you to pull up beside that green vehicle and then park behind it as if you were parking in a space between two cars."

Points to Watch for:
– Uses rear-view mirror to back instead of looking out through window;
– Bumps other cars sharply;
– Leaves vehicle more than 45 centimetres from the curb;
– Backs over curb;
– When leaving space, fails to check traffic.

SPEED AND BRAKING (General)

Key Points
Observe especially smoothness of operation.   Hesitation and uncertainty are indications that habits have not been completely formed.

Points to Watch for:
– Stops very abruptly and starts with a jerk.   Score "jerky starts" under "clutch";
– Hesitates as though timid or uncertain of what to do.   Good drivers should not have to think through simple operations;
– Races engine before starting or vehicle standing;
– Stops and starts while shifting or when not necessary;
– Hurries or seems to be trying to get through quickly;
– Exceeds speed limit.

POSITION IN ROAD

This is an observation made in connection with other problems. A feeling for position in the roadway is an important part of good driving.

Key Points
Score as part of turning or keeping lanes.

Points to Watch for:

– Straddles lane lines on right half of road;
– Straddles center line (except when passing);
– Bumps or scrapes the curb or runs off the pavement where there is no curb;
– Swings wide or cuts corners when turning left or right;
– Moves into wrong lane for left or right turn;
– Blocks crosswalk when stopping for signal, sign or traffic.

STOP ON UPGRADE (Skill Test)

This is to find out the driver's ability to safely control his vehicle on a grade.

Instructions

"As you drive up this hill, pull over to the side and park your vehicle parallel to the curb near the telephone pole (or some other landmark) as if you were going to leave it there for a short time."

Points to Watch for:
- Hand brake not set;
- Ignition not turned off;
- Front wheels not cramped properly;
- Gears not properly set;
- Vehicle rolls back;
- Leaves vehicle more than 18 inches from curb.

START ON GRADE (Skill Test)

This test is to find out the driver's ability to control his vehicle and start without rolling back.

Instructions

The test can be combined with the parts on an upgrade by having the driver start again after parking.

Key Points
Watch the driver's hand and foot work (if applicable). Watch carefully to see if he checks traffic before pulling out into the traffic lane.

Points to Watch for :
- Rolls back;
- Stalls engine;
- Does not release hand brake before starting;
- Looks back in mirror rather than out through window for traffic behind.

TRAFFIC SIGNALS (Traffic)

This observation is to determine whether the driver understands and watches traffic lights.

Key Points
If no lights are available, question the driver as to the meaning and location of lights, but do not score.

Points to Watch for:
- Stops across crosswalk;
- Brakes suddenly because he failed to anticipate light changing;
- Straddles lanes in stopping;
- Stops in intersection;
- Intersection is entered on amber or red light;
- Fails to make full stop on right turn at red light where such turn is permitted.

STOP SIGN (Traffic)

This observation is to find out whether the driver looks for traffic control devices and makes use of them.

Key Points

Be careful when directing applicant.   You may have told him earlier to go "straight through" and he may interpret your remarks to mean to go straight through without stopping.

Points to Watch for:
- Stops across marked crosswalk, or stops blocking waiting pedestrians;
- Straddles lane at stop sign;
- Neglects to look in all directions before starting;
- Fails to come to complete stop;
- Fails to notice stop sign.

RIGHT TURNS (Traffic)

This test is to find out whether the driver can exercise the required skill and judgment to perform a right turn.

Key points

Score off for turning from wrong lane only if the driver's vehicle is far enough to the left to permit a vehicle to overtake on the right.

Points to Watch for:
- Signal not given soon enough;
- Signal indistinct or too brief;
- Signal continued after turn is begun (manual);
- Driver fails to get into proper lane in time;
- Climbs curb when turning;
- Goes into turn too fast and has to apply brakes in turn;
- Turns into wrong lane;
- Coasts with clutch disengaged on turn;
- Has to shift to lower gear after starting turn;
- Turns from wrong lane;
- Crowds other cars to get into lane;
- Swings wide on turn.

LEFT TURNS (Traffic)

Instructions

Similar to those for right turn.

Key Points

Score off for turning from wrong lane only if driver's vehicle is far enough from the center to encourage overtaking on left or suggest that a right turn is to be made.

Points to Watch for:

– Signal not given soon enough;
– Signal indistinct or too brief;
– Signal continued after turn is begun (manual);
– Driver fails to get into proper lane in time;
– Goes into turn too fast and has to apply brakes in the turn;
– Turns into wrong lane;
– Coasts with clutch disengaged on turn;
– Has to shift to lower gear after starting turn;
– Swings wide or cuts corners;
– Turns from wrong lane;
– Crowds other vehicles to get into lane.

ATTENTION AND DISTRACTION (Traffic)

Key Points

Do not score off for failure to follow instructions which are not clearly given or understood.   Watch whether the driver "glues" his eyes to the road or whether he glances to the right and left occasionally.

Points to Watch for:

– Doesn't follow instructions on where to go or what to do;
– Considerably irrelevant conversation;
– Takes eyes off the road to talk or make vehicle adjustments for more than one second at a time.

KEEPING LANE (Traffic)

This observation is made for the purpose of finding out whether the driver keeps his vehicle where it belongs, and whether he respects other drivers.

Key Points

Do not score off for failure to drift over to the right lane in business and residential areas where there are parked vehicles. Be careful on scoring to observe whether the driver drives too closely to parked vehicles.

Points to Watch for:

– Straddles lane when it is clearly marked;
– Drives unnecessarily close to vehicles parked on the right;
– Crosses center line when not overtaking;
– At intersection, going straight ahead, straddles lanes and takes up space which could be used by another vehicle;
– Changes unnecessarily from one lane to another.

FOLLOWING (Traffic)

This observation is made to determine how well the driver judges' distance and speed, and whether he makes efficient use of street area.

Key Points

Pay careful attention to following when streets are wet or slippery. Note whether driver, in following, looks ahead to study traffic.   Note also whether he follows so closely that he cannot see traffic signs on the right, or whether he "blindly" follows other vehicles.

Points to Watch for:
— Follows so closely that he would not be able to stop in time in an emergency.
— Does not look ahead or around vehicle in front because he is too close.

OVERTAKING (Traffic)

This observation is made, when possible, to find out whether the driver has his vehicle under control, whether he can estimate the speed of other vehicles, and whether he chooses the proper time and place to overtake.

Key Points

Watch driver's confidence as to his ability to overtake, whether he hesitates and then speeds up or makes overtaking more in one steady operation.

Points to Watch for:
— Misjudges speed of oncoming traffic and must pull back into lane.
— Starts to overtake in wrong place, such as when a double-parked vehicle is nearby.
— Cuts in too sharply after overtaking.
— Does not check traffic behind before overtaking.
— No arm or mechanical signal to following cars of intention to change lanes.
— Overtakes on right in violation of law.

USE OF HORN (Traffic)

This observation is made to find out if the driver makes use of horn as safety device or whether he uses it to demand right of way.

Key Points

Do not suggest use of horn but simply watch performance.   Note difference between a "blast" and a "beep".

Points to Watch for:
— Fails to warn inattentive pedestrian, or in overtaking.
— Blows horn in going through intersection.
— Uses horn to hurry driver waiting at an intersection.

BEING OVERTAKEN (Traffic)

This observation is made to determine whether the driver shares the street with other highway users.

Key Points
Observe, if possible, whether the driver slows down when the driver behind has signaled that he is about to overtake.

Points to Watch for:
— Fails to give way to right on signal from vehicle overtaking on left.
— Speed is not decreased.

APPROACH TO CORNER (Traffic)

This observation is made to see if the driver is one who anticipates danger in time to do what is necessary.

Key points
Watch whether the driver looks in both directions, and whether he takes an additional look at the left. Watch speed to see if the driver could stop in time if he had to.

Points to Watch for:
— Does not look sufficiently well in all directions to find out what traffic may be coming.
— Stops before entering intersection although there is no stop signs and no traffic going through.
— Has to slow down by applying brakes after he has entered intersection.

RIGHT OF WAY (Traffic)

This observation is made to find out whether the driver shares the road equally with other drivers.

Key Points
Try to find out whether the driver "bluffs" for the right of way even though he may be legally entitled to it. This applies to the right of way of both pedestrians and vehicles.

Points to Watch for:
— Edges too close to pedestrian in crosswalk and gives appearance of demanding the right of way.
— Is overly aggressive in taking right of way even though legally within the law.
— Other cars are forced to stop suddenly because of his failure to grant right of way.

APPENDIX III: JURISDICTIONAL PRACTICES – 2018

Part 2 Knowledge Testing (Chapter 2 Test Construction)

Content

Standard	• To the fullest extent possible, the test items should be drawn from all knowledge domains which contain information on all key driver licensing requirements, as identified in this standard.
Jurisdictional Practices	Most Canadian jurisdictions draw their questions from a manual or guide where available.

Item Format

Standard	• Testing items to be structured as multiple-choice, following the guidelines below.
Jurisdictional Practices	Most Canadian jurisdictions primarily use multiple choice with limited true/false and communigraphic style questions.

Wording of Items

Standard	• Items should be worded to maximize the likelihood that applicants who know the answer will answer the item correctly and those who do not know it will answer incorrectly (validity).
Jurisdictional Practices	None

Determining the Questions

Standard	• Pass/fail rates to be reviewed to maintain the accuracy and fairness of the test.
Jurisdictional Practices	None

Evaluating Knowledge Tests

Standard	• A minimum of 80% is required to pass a knowledge test.
Jurisdictional Practices	Most Canadian jurisdictions have a minimum 80% pass threshold for their knowledge tests for all classes.

Reading Impairment

Standard	• Jurisdictions will have policies in place to address requirements for oral testing.
Jurisdictional Practices	BC (class 5-8 only), Alberta, Saskatchewan, Manitoba, Ontario, Que, NT and the Yukon all provide some level of oral knowledge testing. Manitoba, New Brunswick and Ontario offer one-on-one oral tests in English or French where the questions will be read to the customer by a staff member. In Manitoba, the customer can request one of these tests once they have attempted the knowledge test at least twice, with at least one attempt via computer. In Ontario, an applicant can request the oral test right away. In New Brunswick, an oral test can be requested when scheduling appointment.

Foreign Language Testing

Standard	• Policies and processes should be in place to ensure the integrity of the translation process and outcomes, to ensure the equitable testing of foreign-speaking applicants, and to prevent cheating (**see following section**).
Jurisdictional Practices	In BC, classes 5-8 are available in English, French, Cantonese, Mandarin, Punjabi, Croatian, Farsi, Arabic, Russian, Vietnamese, Spanish. Commercial class knowledge tests are taken in English only. In Alberta, tests are available in 25 languages including Arabic, Chinese (Traditional), English, Farsi, French, Hindi, Punjabi, Spanish, Tagalog (Philippines), and Vietnamese. Saskatchewan uses Google translate for over 100 languages. However, it has been found that accuracy varies with the language. Manitoba provides knowledge tests in Amharic, Arabic, Bosnian, Simplified Chinese, Cree, Croatian, Czech, Farsi, German (High), Hindi, Hungarian, Italian, Khmer/Cambodian, Korean, Kurdish, Lao, Polish, Portuguese, Punjabi, Romanian, Russian, Saulteaux, Serbian, Spanish, Tagalog, Ukrainian, and Vietnamese. Ontario makes knowledge tests available in over 20 languages including English and French. Quebec's knowledge tests are available in English, French, Arabic, Mandarin, and Spanish. Both NT and Yukon offer knowledge tests in English and French only.

Standard	• Language translators used for knowledge testing will be approved by the jurisdiction. • Interpreters for the deaf and hard of hearing used for knowledge testing will be approved by the jurisdiction. • Jurisdictions will have policies in place to address the risks and consequences of cheating.
Jurisdictional Practices	Most jurisdictions provide some level of translation or interpreter services for applicants who are impaired by a language barrier. In B.C., interpreters and translators provide different services. An interpreter is able to interpret a knowledge test and a translator can translate documents such as a licence or driving record. Manitoba offers recorded oral tests when the customer's preferred language is not available in electronic or paper format, or if they have attempted the knowledge test at least twice, with at least one attempt via computer. The customer provides the interpreter. The test is monitored and recorded by a Service Centre staff member. The interpreter reads the questions and answers from a computer- generated paper test. If the customer passes the test, the recording and the paper test are sent to a certified interpreter for auditing. For class 5 tests, there is no additional charge for this service. In Alberta, effective November 10, 2017, changes were made to the Translator Identification Number (TIN) Program. There are now requirements for registering with Alberta Transportation to provide sight translation of Class 3, 6 and 7 driver's licence knowledge tests. The following documents are required, in addition to an application form: • Criminal Record Check including a vulnerable sector check, provided by a law enforcement agency and dated within 90 days of the date of TIN application • Signed and witnessed Code of Conduct (available at http://www.transportation.alberta.ca/531.htm) • Proof of language aptitude for each language to be translated (except English): i. CILISAT test results for languages listed at www.cisoc.net/en/cilisat ii. Special Investigations Unit (SIU) interview and approval within the past five (5) years of the date of TIN application for languages NOT listed at www.cisoc.net/en/cilisat • Proof of affiliation with one of Alberta Transportation's Approved Translator Organizations (list available at http://www.transportation.alberta.ca/531.htm) OR proof of employment by a Service Alberta Registry Agency All successful applicants receive a Letter of Approval citing a new Translator Identification Number. All new TINs will automatically expire in two (2) years from

the date on the Letter of Approval. It is the responsibility of the TIN holder to provide renewal documents at least 30 days before the TIN expiry date.

In Ontario, an approved interpreter must be employed (or have been employed) in interpreter services, be a member (or have been a member) of a professional association that provides interpreter services or be an experienced interpreter who is a member of the clergy. For the central, Greater Toronto Area (GTA), and eastern regions of Ontario, approved interpreters must be members of a provincial association that provides accreditation or certification or be accredited by a provincial or federal government. Interpreters must provide proof of qualification.

BC, Saskatchewan, Manitoba, Ontario, and the Yukon allow interpreters for the deaf and hard of hearing.

Part 2 Knowledge Testing (Chapter 3 Testing Administration)

Test Security, Fraud Prevention and Cheating

Standard	- Questions for all forms of knowledge test will be randomly assigned. - Written versions of the test will remain with the licensing or testing authority and not the applicant. - Jurisdictions will have policies in place for consequences of cheating on knowledge tests. - Unapproved electronic devices are not to be used during the test.
Jurisdictional Practices	BC has a number of policies to reduce the potential for cheating: - Have the examinee complete the test at a kiosk, or table within view of staff. - Carefully check identification documents, reference dictionaries, and signatures. - Ensure the examinee understands that no conversation is allowed. - Ensure that the examinee understands that the test is "closed-book" (i.e., they cannot look up the answers in the *RoadSense for Drivers/Riders* or any other reference book while taking the test). - Keep paper tests in a secure place. Dispose of any used tests in a secure manner. In BC, individuals caught cheating on a knowledge test for the first time are subject to a 30-day prohibition from re-taking the test. A second infraction results in a 60-day prohibition.

Scheduling Knowledge Re-tests

Standard	• Applicants who fail the knowledge test are required to wait at least one day before being re-tested.
Jurisdictional Practices	Most jurisdictions have a waiting period before an applicant can re-take the knowledge test. Both BC and Manitoba have a 7 day wait period for GDL applicants. Quebec has a 28-day waiting period. No Canadian jurisdiction currently has a maximum number of times that the test may be written. Like Canada, US states do not have consistent policies with respect to when a re-test can be taken. North Carolina requires waiting five business days before trying again. Ohio has a seven-day waiting period. California allows you to take the written test up to three times in one day. The waiting period in Tennessee depends on the score, which, at worst, could last 30 days. An older study done by CIECA of European jurisdictions, also recognized the differences in waiting periods for theory (knowledge) testing across countries. While it didn't specify a desired waiting time, the study recommended a waiting period between theory (knowledge) tests of between 3 and 7 days.[22]

Part 2 Knowledge Testing (Chapter 4 Higher Class Vehicles Classes 1-4)

Standard	• If permitted, above standards for passenger vehicles should be an absolute minimum and compliance monitoring strictly adhered to.
Jurisdictional Practices	Oral testing is permitted in English and French in Saskatchewan, Manitoba, Ontario, Quebec, the Yukon and New Brunswick. In addition, BC and Alberta allow for translators in English only, for those who are dyslexic and hearing impaired.

Foreign Languages and Use of Translators & Interpreters

Standard	• Translators used for knowledge testing will be approved by the jurisdiction.
Jurisdictional Practices	Eight jurisdictions (Manitoba, Ontario, New Brunswick, Nunavut, Quebec, Yukon, Saskatchewan and the Northwest Territories) currently allow for translation of knowledge tests.

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[22] International Commission for Driver Testing. (1998). *Report on the Theoretical Test.* Brussels: CIECA.
http://www.cieca.eu/sites/default/files/documents/projects_and_studies/ConclCatBtheoryEn_1.pdf

Part 3 Performance Testing (Chapter 2 Road Test)

Administration

Standard	- Driver has valid and appropriate driver licence. - Vehicle is properly registered and insured. - All other legal requirements and conditions are met prior to beginning the road test. - An individual will not be permitted to begin a road test where a driver examiner reasonably believes that the applicant is impaired by drugs or alcohol.
Jurisdictional Practices	Most jurisdictions including Ontario, Quebec, New Brunswick, Manitoba, Saskatchewan, Alberta and B.C. do not allow anyone except the driver examiner in the vehicle during the road test with the exception of staff for training and evaluation. Alberta and Manitoba allow translators and interpreters at the beginning and end of test but not on road.

Vehicle Check

Standard	Road test vehicles must be inspected prior to commencing a road test and deemed safe and legal for on-road driving. Inspections must be completed by a certified or jurisdictionally approved driver examiner.
Jurisdictional Practices	BC's guidelines state that the vehicle must be capable of getting through the road test route without breaking down and must have no obvious defects that are likely to cause a peace officer to pull the vehicle over during the road test. A Road Test Vehicle Defects form MV2040 is to be completed where certain minor vehicle defects such as a cracked windshield or missing front licence plate are discovered prior to conducting a road test. The examinee will be required to sign the form to acknowledge that they are willing to continue with the road test, knowing that should the vehicle be stopped by law enforcement, a violation ticket may be issued

Skill Categories

Standard	Required skills in each category: *Attentional Skills* - Attention-sharing - Controlling and maneuvering a vehicle while attending to traffic controls and other road users (search, signaling, space management) - Attention shifting - Shifting attention as needed (ahead, to the side, and to mirrors, observation checking and visual scanning) *Perceptual Skills*

	• Spatial judgment - Judging the nature and magnitude of changes in speed and direction of other road users • Gap judgment - Judging the adequacy of gaps when merging, crossing, or entering traffic • Distance judgment - Judging the adequacy of distance of an oncoming vehicle when passing • Hazard detection - Detecting hazards; characteristics and movement of other road users in the roadway environment, for example, pedestrians, cyclists, emergency vehicles and potholes. *Motor Skills* • Acceleration - Regulating pedal force to accelerate on level and inclined surfaces. • Shifting - Coordinating clutch, accelerator, and shift lever if manual transmission is used. • Maintaining speed - Regulating accelerator force in order to maintain a steady speed • Lane keeping - Coordinating speed and steering in order to keep the vehicle position within lane on straight and curved paths. • Turning - Coordinating speed and steering when turning corners; left and right-hand turns. • Slowing - Regulating brake and accelerator to reduce speed • Stopping - Coordinating brake, accelerator (and clutch) to bring the vehicle to a stop at a given point • Backing - All of the above in moving the vehicle backward • Adjusting to limited traction - All of the above when operating on slippery surfaces • Parking - On level surfaces, on hills, between vehicles
Jurisdictional Practices	In Ontario, if there is no hill available to assess parking, applicants will be asked to park as if they were situated on a hill. The 2nd level test in Ontario includes freeway driving. The applicant will be asked if they have practiced and if they haven't then they may not be allowed to continue with the test.

Route Selection

Standard	• Number of routes - Several routes should be devised for each licence testing location.
Jurisdictional Practices	None

Standard	Disqualifying Situations:
	- serious violations of traffic law such as speeding, careless driving, crossing double lines, not stopping at a stop sign - acts that endanger the driver examiner or the public - examiner intervention - a crash - lack of cooperation, aggressive/threatening/abusive (physical and/or verbal) behaviour toward driver examiner or refusal to perform a requested manoeuvre - offering bribes or a "gratuity"
Jurisdictional Practices	Most Canadian jurisdictions have policies in place that reflect the standard elements above.

Part 3 Performance Testing (Chapter 4 Scheduling Road Re-Tests)

Standard	Applicants who fail the road test are required to wait at least one week before being re-tested.

Jurisdictional Practices	the majority of jurisdiction have policies on when a road test may be re-taken:
	
	British Columbia 1st failure - 14 days
	                             2nd failure - 30 days
	                             3rd failure - 60 days
	Alberta once per day
	Saskatchewan 2 weeks
	Manitoba 14 days
	Ontario 10 days
	Quebec 28 days
	New Brunswick 1st fail - 1 week
	                             2nd fail - 2 weeks
	                           3rd & subsequent fails - 3 weeks
	Prince Edward Island 2 weeks/14 days
	Yukon GDL - 1 month
	                             Non-GDL - 1 week
	Northwest Territories Same as Yukon
	
	In the Yukon, the waiting period may be extended to two or more weeks at the examiner's discretion depending on driving skills on the first road test.
	
	In P.E.I., if the driver examiner feels at any time, on any test, that the client requires further training outside of the two-week waiting period then they are asked to complete a training course. Client must show proof of completion of training course before client is booked for next road test.

Part 3 Performance Testing (Chapter 6 Motorcycles)

Standard	**Preparation** • Vehicle inspection • Motorcycle controls • Motorcycle riding gear **Motorcycle Control** • Getting under way and riding slowly **Motorcycle Operation** • Shift smoothly • Maintain directional control • Use of both brakes • Use of mirrors and head checks • Gap selection • Prevailing speed **Lane Positioning** • Visibility • Lane protection • Space cushioning • Escape route • Surface hazards • Stop position in lane **Turning** • Visual directional control • Speed management **Emergency Situations** • Quick stop • Obstacle avoidance
Jurisdictional Practices	Most jurisdictions assess for observational skills and hazard perception. This is somewhat unique for motorcycles in that what may not be a hazard in a passenger or higher-class vehicle, may well be a hazard for a motorcycle, for example, small potholes, pointed road lines, oil in the lane, manhole covers, etc.

Scheduling Road Re-tests (motorcycles)

Standard	• Applicants who fail the road test are required to wait at least one week before being re-tested.
Jurisdictional Practices	Ontario - provides a 3-day waiting period for motorcycle road re-tests. Quebec - if an applicant fails the motorcycle closed track test, they must wait 14 days to re-test. Failure of the on-road motorcycle test results in a 56 day wait period

Part 3 Performance Testing (Chapter 8 Higher-Class Vehicles Classes 1-4)

Pre-drive Vehicle Check

Standard	• Pre-drive vehicle checks will be in compliance with NSC 13 – Daily Vehicle Trip Inspection.
	
	• Vehicle elements to be checked:
	    ○ signal and brake lights
	    ○ headlights and horn working
	    ○ brakes working, including air brakes
	    ○ windshield (cracks and tinting)
	    ○ seatbelts working
	    ○ vehicle properly licenced and insured
	    ○ emergency equipment

Jurisdictional Practices	Given that the requirements for NSC 13 are detailed, it is expected that jurisdictional practices would be consistent with that standard.

On-road Assessment

Standard	• In addition to the applicable standard elements for passenger vehicles, the following are unique requirements for on-road testing for higher class licences:
	    ○ backing up
	    ○ starting and stopping smoothly
	    ○ shifting gears
	    ○ attention shifting (the ability to shift attention as needed, e.g., to the side, ahead, to mirrors)
	    ○ attention sharing (the ability to control and maneuver a vehicle while attending to traffic controls and other road users)

Jurisdictional Practices	While many jurisdictions have a time limit for backing up manoeuvre, some do not. At least three jurisdictions provide a maximum number of tries (i.e., three).

Administrative

Standard	• No internal cameras are allowed during the road test. • Except for training purposes and driver examiner performance evaluation, the only people allowed in a vehicle during a road test are the Driver Examiner and the customer.
Jurisdictional Practices	Parking assist technologies have been addressed by some jurisdictions. In most cases they may not be used at all and alternately, they may only be used as an additional tool.

Scheduling Road Re-tests (class 1-4)

Standard	• Applicants who fail the road test are required to wait at least one week before being re-tested.
Jurisdictional Practices	The majority of Canadian jurisdictions do have policies on when a higher-class road test may be re-taken:

	British Columbia: pre-trip inspection & motorcycle skills test
	                                                  7 days
	                            Passenger vehicle, motorcycle and heavy trailer road test
	                                                        1st time - 14 days
	                                                        2nd time - 30 days
	                                                        3rd time - 60 days
	                                                          Commercial road test
	                                                        1st time - 14 days
	                                                          2nd time - 30 days

	Alberta 1 day
	Saskatchewan 1 day (can be extended)
	Manitoba next day
	Ontario 10 days
	Quebec 7 days

	New Brunswick 1st fail - 1 weeks
	                                     2nd fail - 2 weeks
	                                     3rd and subsequent fails – 3 weeks

	Prince Edward Island 2 weeks/14 days
	Yukon 1-2 weeks or more depending on the driving skills displayed during the first road test

Part 4 Air Brake Testing (Chapter 2 Knowledge Test)

Standard	• Applicants will have a valid driver licence prior to applying for an air brake endorsement
	• The following areas are included in an air brake knowledge test:
	    o vehicle braking systems
	    o air supply subsystem
	    o air brake subsystems
	    o foundation brakes
	    o demands on brakes while driving
	    o air brake compliance
	    o inspecting air brake components
	    o inspection air brake system operation
	    o inspecting air brake adjustment
	    o reporting requirements

Jurisdictional Practices	Some jurisdictions allow for acquisition of an air brake endorsement for drivers with a novice licence.

	Several jurisdictions provide different approaches based on class of licence or vehicle to be operated.
	Some jurisdictions allow for third party testing for air brake endorsements based on a standardized curriculum and assessment process.
	Alberta and Manitoba have an exemption for 2 axle, single vehicles registered as a farm vehicle.
	An air brake course is required by some jurisdictions (Alberta).

Air brake practical assessment

Standard	The following elements are tested as part of the air brake practical assessment: o preparing the vehicle for inspection o foundation brake components and chambers at each wheel o brake drums or rotors at each wheel o all accessible air lines o air tanks and drain valves o air compressors o low-air warning device o air pressure build-up time and air loss rate o air-compressor governor settings o tractor (towing vehicle) protection valve o automatic application of the trailer spring brakes o spring (parking/emergency) brakes
Jurisdictional Practices	Some provinces have a requirement for applicants to bring specified equipment to the practical test, for example, Ontario requires wheel chocks, a watch, and a device for measuring the pushrods (among other things). Alberta requires the third-party tester to bring a tow vehicle which can be a tractor or body job coupled to an air brake trailer and device for holding a service brake application to check the brake adjustment.