

Objective Structured Clinical Examination 2017 Protocol

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Content and Format

The Objective Structured Clinical Examination (OSCE) is a station-type examination comprised of a morning session and an afternoon session on the same day.

The majority of the stations will have two questions and will require the candidate to review the information supplied (e.g. case history, dental charts, photographs, radiographs, casts, models, videos) and answer extended match type questions. Each extended match type question will have up to 15 answer options and one or more correct answers. Candidates will have five minutes at each station to answer the questions. After five minutes the candidates will move to the next station.

Some stations may require the candidate to review the information supplied and write an acceptable prescription for a medication commonly prescribed by general dentists in Canada.

The Question and Answer Framework for the OSCE is available in the Reference Materials & Resources section of the [NDEB website](#).

The blueprint below gives the content areas approximate percentage of questions in each area.

OSCE Blueprint	Approximate % of Questions
Local Anesthesia	5%
Endodontics	7%
Medical Emergencies	5%
Oral Medicine	10%
Oral Surgery	4%
Orthodontics	7%
Pain	4%
Pediatric Dentistry	6%
Periodontics	6%
Pharmacology/Therapeutics	7%
Oral Radiology	18%
Removable Partial Dentures	4%
Single Crowns/Operative Dentistry	16%
Total	100%

Examination items are developed based on the Competencies for a Beginning Dental Practitioner in Canada available in the Reference Materials & Resources section of the [NDEB website](#).

Schedule

	Time
Validation of registration	8:15 am
Orientation	8:45 am
Morning examination session	9:00 am to 11:30 am
Afternoon check-in	1:00 pm
Afternoon examination session	1:30 pm to 4:00 pm

Validation of Registration

During validation of registration, candidates will be issued an identification (ID) card. To receive the ID card, candidates must show current government issued photo identification, (e.g. driver's licence, passport, or military identification) in English or French for comparison to the ID card. The photo identification must show the candidate's name exactly as it appears in the candidate's online profile. It must be issued by a federal, provincial, territorial state, or municipal authority, and not be expired. If the photo identification does not have an expiry date, it must have been issued within the last 10 years.

Candidates who do not provide government photo identification will not be admitted.

Instructions

You will receive an ID card with your NAME and ID NUMBER and an answer score sheet. The illustration below is an example of how to correctly enter required identification information.

Enter **YOUR** Name

Noircir le cercle en entier: ○ ● ○ ○ ○ ○ Blacken the entire circle: ○ ● ○ ○ ○ ○

Enter **YOUR** ID number

Nom de famille/Last Name:

LASTNAME												
A	●	A	A	A	●	A	A	A	A	A	A	A
B	B	B	B	B	B	B	B	B	B	B	B	B
C	C	C	C	C	C	C	C	C	C	C	C	C
D	D	D	D	D	D	D	D	D	D	D	D	D
E	E	E	E	E	E	●	E	E	E	E	E	E
F	F	F	F	F	F	F	F	F	F	F	F	F
G	G	G	G	G	G	G	G	G	G	G	G	G
H	H	H	H	H	H	H	H	H	H	H	H	H
I	I	I	I	I	I	I	I	I	I	I	I	I
J	J	J	J	J	J	J	J	J	J	J	J	J
K	K	K	K	K	K	K	K	K	K	K	K	K
●	L	L	L	L	L	L	L	L	L	L	L	L
M	M	M	M	M	M	●	M	M	M	M	M	M
N	N	N	N	N	N	N	N	N	N	N	N	N
O	O	O	O	O	O	O	O	O	O	O	O	O
P	P	P	P	P	P	P	P	P	P	P	P	P
Q	Q	Q	Q	Q	Q	Q	Q	Q	Q	Q	Q	Q
R	R	R	R	R	R	R	R	R	R	R	R	R
S	●	S	S	S	S	S	S	S	S	S	S	S
T	T	●	T	T	T	T	T	T	T	T	T	T
U	U	U	U	U	U	U	U	U	U	U	U	U
V	V	V	V	V	V	V	V	V	V	V	V	V
W	W	W	W	W	W	W	W	W	W	W	W	W
X	X	X	X	X	X	X	X	X	X	X	X	X
Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y
Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z

Prénom/First Name:

FIRSTNAME												
A	A	A	A	A	A	●	A	A	A	A	A	A
B	B	B	B	B	B	B	B	B	B	B	B	B
C	C	C	C	C	C	C	C	C	C	C	C	C
D	D	D	D	D	D	D	D	D	D	D	D	D
E	E	E	E	E	E	E	E	E	●	E	E	E
●	F	F	F	F	F	F	F	F	F	F	F	F
G	G	G	G	G	G	G	G	G	G	G	G	G
H	H	H	H	H	H	H	H	H	H	H	H	H
I	●	I	I	I	I	I	I	I	I	I	I	I
J	J	J	J	J	J	J	J	J	J	J	J	J
K	K	K	K	K	K	K	K	K	K	K	K	K
L	L	L	L	L	L	L	L	L	L	L	L	L
M	M	M	M	M	M	M	M	●	M	M	M	M
N	N	N	N	N	N	N	N	N	N	N	N	N
O	O	O	O	O	O	O	O	O	O	O	O	O
P	P	P	P	P	P	P	P	P	P	P	P	P
Q	Q	Q	Q	Q	Q	Q	Q	Q	Q	Q	Q	Q
R	R	●	R	R	R	R	R	R	R	R	R	R
S	S	S	●	S	S	S	S	S	S	S	S	S
T	T	T	T	●	T	T	T	T	T	T	T	T
U	U	U	U	U	U	U	U	U	U	U	U	U
V	V	V	V	V	V	V	V	V	V	V	V	V
W	W	W	W	W	W	W	W	W	W	W	W	W
X	X	X	X	X	X	X	X	X	X	X	X	X
Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y
Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z	Z

No d'identification/ Id Number:

1	2	3	4	5	6
0	0	0	0	0	0
●	1	1	1	1	1
2	●	2	2	2	2
3	3	●	3	3	3
4	4	4	●	4	4
5	5	5	5	●	5
6	6	6	6	6	●
7	7	7	7	7	7
8	8	8	8	8	8
9	9	9	9	9	9

OSCE / ÉCOS

THE NATIONAL DENTAL EXAMINING BOARD OF CANADA
LE BUREAU NATIONAL D'EXAMEN DENTAIRE DU CANADA

- Enter your name and your ID number in the indicated areas on the answer score sheet.
- Each question is followed by a choice of answers. Record your answer(s) on the answer score sheet using a standard (wood) lead pencil (No. 2 or HB) only. When entering answers, make heavy black marks that completely fill the appropriate circle(s).
- If you change your answer, make sure that the original mark is thoroughly erased.
- Do not make stray marks on the answer score sheet.
- Ensure that you record your answer(s) in the correct place opposite the correct question number.
- You must transfer all answers to the answer score sheet within the session time.
- You may use magnification aids, such as magnifying glasses or loupes.
- Radiograph images are to be viewed as if you are facing the patient.
- The answer score sheet and ID card must be returned at the end of the session. If any of these are not returned, you will receive a score of zero.
- The FDI two-digit tooth numbering system below is used in all examinations.

FDI / UNIVERSAL NUMBERING SYSTEM

PERMANENT DENTITION

FDI	1.8	1.7	1.6	1.5	1.4	1.3	1.2	1.1	2.1	2.2	2.3	2.4	2.5	2.6	2.7	2.8	FDI
Universal	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	Universal
Universal	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	Universal
FDI	4.8	4.7	4.6	4.5	4.4	4.3	4.2	4.1	3.1	3.2	3.3	3.4	3.5	3.6	3.7	3.8	FDI
RIGHT									LEFT								

PRIMARY DENTITION

FDI	5.5	5.4	5.3	5.2	5.1	6.1	6.2	6.3	6.4	6.5	FDI
Universal	A	B	C	D	E	F	G	H	I	J	Universal
Universal	T	S	R	Q	P	O	N	M	L	K	Universal
FDI	8.5	8.4	8.3	8.2	8.1	7.1	7.2	7.3	7.4	7.5	FDI
RIGHT						LEFT					

Sample Questions

The Question and Answer Frameworks for all questions used in the OSCE are available in the Reference Materials & Resources section of the [NDEB website](#). Candidates are strongly encouraged to visit the website in preparation for the examination.

Sample questions below illustrate the formats generally used in the OSCE.

Single correct answer

Some questions have one correct answer, indicated by the direction "Select **ONE** correct answer." Select the most likely answer or most appropriate answer.

Sample Question: 1 (Select **ONE** correct answer.)
Orthodontic treatment (dental and/or skeletal) for this patient

- A. is not required at this time.
- B. should be initiated during the primary dentition.
- C. should be initiated during the early mixed dentition (after eruption of the first permanent molars and incisors).
- D. should be initiated during the late mixed dentition prior to the pubertal growth spurt.
- E. should be initiated immediately following the eruption of the permanent second molars.
- F. should be initiated after the completion of growth.

Answer: A B C D E F G H I J K L M N O

Many questions include patient case histories in the format illustrated below.

Using the following information and the print of radiograph ____, answer the following question on the answer score sheet.

Patient Information:

Age:	58	Blood Pressure:	120/80 mmHg
Gender:	Male	Pulse Rate:	72 bpm
Height:	180cm (5'11")	Respiration Rate:	14/min
Weight:	70kg (154lbs)	Temperature:	37°C (98.6°F)

Chief Complaint: "My dentures are loose."

History of Chief Complaint: Has noticed looseness increasing for past 2 years.

Dental History: Present dentures 20 years old.

Medical History:

Significant Findings:	None.
Current Medication:	None.
Allergies:	None.

Social/Family History:

Significant Findings: Smoker, ½ package/day for past 20 years.
Alcohol consumption: 7 drinks/week.

Clinical Examination:

Significant Findings:	
Extraoral:	None.
Intraoral:	See chart.

Sample Question: 2 (Select **ONE** correct answer.)

Which of the following is the most likely anatomical structure/diagnosis for the radiographic entity indicated by the arrow(s)?

- A. Normal tooth.
- B. Calcifying tooth crown.
- C. Developing root apex.
- D. Hypercementosis.
- E. Attrition.
- F. Tooth fracture.
- G. Rarefying osteitis/periradicular periodontitis.
- H. Periapical osseous dysplasia (periapical cemento-osseous dysplasia).
- I. Odontoma.
- J. Dens invaginatus/dens-in-dente.
- K. Dentin dysplasia.
- L. Dentinogenesis imperfecta.
- M. Amelogenesis imperfecta.
- N. Enamel hypoplasia/Turner's tooth.
- O. Regional odontodysplasia.

Answer: A B C D E F G H I J K L M N O

One or more correct answers

Some questions have one or more correct answers, indicated by the direction "Select **ONE OR MORE** correct answers." Select all answers that are correct. The maximum score for any question is one. The minimum score for any question is zero. Part marks will be awarded if some, but not all correct answers are selected, provided no incorrect answer is selected. Marks will be deducted for incorrect responses, but no question will receive a score less than zero. Some answers are neither definitely correct nor incorrect and have been given a value of zero. Selecting one of these answers will not affect the score given to a candidate; however, if a definitely incorrect answer is selected the candidate will receive a zero score for the entire question.

Using the print of radiograph Sample 1, answer the following question on the answer score sheet.



Radiograph Sample 1

Sample Question: 3 (Select **ONE OR MORE** correct answers.)

There is radiographic evidence of caries on the

- A. distal of tooth 4.3.
- B. mesial of tooth 4.4.
- C. distal of tooth 4.4.
- D. mesial of tooth 4.5.
- E. distal of tooth 4.5.
- F. mesial of tooth 4.6.
- G. distal of tooth 4.6.
- H. mesial of tooth 4.7.
- I. distal of tooth 4.7.
- J. mesial of tooth 4.8.
- K. distal of tooth 4.8.

Answer: A B C D E F G H I J K L M N O

The following is an illustration of the scoring system. The score for each answer is given to the left of each answer.

Sample Question: 4 (Select **ONE OR MORE** correct answers.)
There is radiographic evidence of caries on the

Value			Value		
-1	A.	distal of tooth 2.3.	0	G.	distal of tooth 2.6.
-1	B.	mesial of tooth 2.4.	0	H.	mesial of tooth 2.7.
-1	C.	distal of tooth 2.4.	-1	I.	distal of tooth 2.7.
.3	D.	mesial of tooth 2.5.	-1	J.	mesial of tooth 2.8.
.3	E.	distal of tooth 2.5.	0	K.	distal of tooth 2.8.
.4	F.	mesial of tooth 2.6.			

Answer: A B C D E F G H I J K L M N O for full mark.

Information for stations which include a periodontal chart

The following represents an example of a periodontal chart that may be used on some stations in the OSCE.

Each chart will utilize the following notation:

- The upper part of the chart denotes the findings on the vestibular (buccal and/or labial) surfaces of the teeth being discussed for the case.
- Missing teeth are denoted by a large "X."
- Probing depths, in millimetres, are listed in the next row below the tooth number.
- Recession is listed below the pocketing, in millimetres. If there is no number, there is no significant recession.
- Bleeding on probing is denoted by "•", and is listed directly below the pocket where bleeding was found.
- The middle part of the chart denotes the findings for the lingual surfaces, using the same categories as above.
- Mobility and furcation involvement apply to the entire tooth and can be found on the bottom part of the chart.
- Mobility for the tooth, if present, is listed as a "1, 2, or 3", using the Miller classification.
- The Class (I, II, III) of furcation involvement (if present) is listed with the surface indicated (B,L,M,D).

The following example is a chart of the maxillary second quadrant, with tooth 2.6 missing. The probing depths, in millimeters, are listed, going from mesial on the left, to distal on the right. In this example, there is 3mm of recession all along the buccal of teeth 2.4 and 2.5. No other recession is noted. There is bleeding on probing on the mesiobuccal and distobuccal of teeth 2.5 and 2.7, and all along the lingual of tooth 2.7. No other bleeding is noted. Tooth 2.7 has a buccal furcation Class III and a Class 2 mobility. There is no other mobility or furcation involvement on any other teeth/surfaces.

Vestibular

Tooth	2.3	2.4	2.5	2.6	2.7
Probing depth	3 2 4	4 5 4	4 4 6	 	4 7 6
Recession		3 3 3	3 3 3	 	
Bleeding on probing			• •	 	• •

Lingual

Tooth	2.3	2.4	2.5	2.6	2.7
Probing depth	2 2 2	3 4 4	4 3 5	 	5 5 6
Recession				 	
Bleeding on probing				 	• • •

Mobility					2
Furcation					B-III

Information for stations that require a written prescription

- For stations requiring the writing of a prescription, a blank prescription form, illustrated below, will be available at the station.
- Enter your ID number where indicated on the prescription. Write the appropriate prescription for the patient as described in the case history at the station.
- Use a pencil to write the prescription, but **DO NOT** sign the prescription. Signing the prescription or submitting a prescription written in ink will result in a zero score.
- Generic drug names must be used, not trade names alone.
- Deposit the prescription into the box at the station before leaving the station.

Station Sample

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STATION Sample

Question: NDEB ID# _____

Enter ID Number
ONLY

DOCTOR XXX XXXXX
100 ANYWHERE STREET
ANYWHERE CITY, CANADA

DATE: _____

NAME: _____

ADDRESS: _____

Rx

NO REPEAT

REPEAT ____ TIME(S)

SIGNATURE XXXXXXXXXX

(DO NOT SIGN PRESCRIPTION)

Questions that require the writing of a prescription will be scored from a minimum of zero to a maximum of four.

Sample grading guide for prescriptions

Correct prescription (no errors) = 4

Deductions will be made for the following errors:

Automatic Failures: (minus 4)

- Incorrect/missing patient name if not an over-the-counter drug
- No drug name
- Drug not available in Canada
- Incorrect class of drug
- Drug is life-threatening
- Significant duration error
- Total number of tablets is not listed
- Excessive dosage
- No instructions of any kind provided/critical error in instructions
- Prescription not submitted as directed
- More than one prescription submitted for the same question
- NDEB ID number incorrect/missing
- Prescription written in ink
- Prescription signed

Date/Patient/Structure (minus 1)

- Incorrect/missing date
- Incorrect/missing patient name if an over-the-counter drug
- Poor structure

Drug (minus 1)

- Unacceptable drug, but not life-threatening
- Incorrectly spelled drug
- Non-Canadian name
- Generic drug name not used (trade name only)

Dosage (minus 1)

- Generic drug name not used (trade name only)
- Unacceptable drug, but not life-threatening
- Unavailable/incorrect strength
- Incorrect total number of tablets
- Incorrect number of tablets per administration
- Above daily maximum dosage
- Repeat is not correct, leading to excessive duration

Instructions (minus 1)

- Incorrect frequency
- No PRN when indicated
- PRN without frequency
- PRN when not indicated
- Unclear handwriting
- Ambiguous instructions
- Repeat/no repeat is incorrect
- Unacceptable drug
- Missing instruction to complete prescription

Reference Texts

A list of textbooks and references commonly used in DDS/DMD programs can be found in the Reference Materials & Resources section of the [NDEB website](#).

Regulations

- Candidates must be punctual for all sessions. Candidates arriving late for a session may be denied entry to the examination.
- Family or friends must not accompany a candidate as space at the centre is provided only for candidates and staff.
- Candidates must have the ID card visible at all times and must return the card to the Test Administrator at the end of each session.
- Candidates must not bring devices with recording, transmitting or receiving abilities, such as radios, cameras, cell/smart phones, smart watches, or other electronic aids/devices into the examination room. Use of electronic aids or devices is strictly prohibited. Candidates found to have a prohibited electronic aid or device on their person during an examination will be immediately dismissed from the examination room and will receive a zero score for the examination.
- Candidates must not use dictionaries, calculators, or other informative material.
- Candidates may use ear plugs and magnification aids, such as magnifying glasses or loupes.
- Candidates must bring standard (wood) lead pencils (No. 2 or HB) and a block eraser. Items such as mechanical pencils, mechanical erasers, pens or felt-type markers are not allowed in the examination room.
- Candidates must read and sign the Confidentiality and Non-disclosure Agreement provided on the morning of the examination. This agreement must be signed in order to receive results. A sample Confidentiality and Non-disclosure Agreement is available in the candidate's online profile, under the "Information" tab.
- The ability of a candidate to read, interpret, and comply with instructions and other written material is part of the OSCE. Test Administrators and Invigilators will not answer questions involving content.
- All candidates must move to the next station immediately after hearing the signal.
- Any prescription not submitted as directed, not legible, submitted with a missing or incorrect ID number, or a signed prescription will receive a zero score.
- Candidates must stop writing at the indicated time. The transfer of answers to answer score sheets must be completed within the session time. Additional time will not be allowed.
- Candidates must leave all examination materials at their final station or as directed by the Test Administrator.
- Candidates who fail to return their ID card may receive a zero score for the examination.
- Candidates who do not abide with the above Regulations may receive a zero score for the examination.

Leaving and Re-entering the Examination Room

The OSCE is a station-type examination. This type of examination set-up makes the inclusion of washroom breaks extremely difficult. If, in an emergency situation, a candidate requires a washroom break, they must raise their hand and an invigilator will attempt to make arrangements while at rest station.

Once the examination is in progress, any candidate who leaves the examination room for any other reason **will not** be allowed to re-enter.

Food and Beverages

- Food is not allowed in the examination room. Candidates who require food, medicine or medical equipment in the examination room for medical reasons must submit a request pursuant to the NDEB special accommodations policy.
- Upon request, water may be provided to candidates at rest stations. Outside beverages are not permitted.

Examination Integrity

- All examination material is copyrighted. Any attempt to reproduce or assemble examination material is strictly prohibited and violators will be prosecuted.
- Candidates are prohibited from copying or otherwise obtaining answers from other candidates, from providing answers to other candidates, and from talking or otherwise disrupting the conduct of the examination. Candidates are responsible for ensuring that their answers are not visible to other candidates.
- Candidates must be aware that the NDEB uses a software program to identify suspicious answer similarities between pairs of candidates. The NDEB may void the results of both candidates involved in suspicious occurrences identified by the software program.
- Candidates are prohibited from removing test material, including ID cards and answer score sheets, from the examination room and from copying or making notes of any test item. Doing so will be considered as compromising the integrity of the examination. The consequences of such actions are outlined in the NDEB By-laws. The NDEB will verify that all ID cards are returned.
- As per the NDEB By-laws, the NDEB will not tolerate the reconstruction of questions through memorization or recollection and/or the distribution of the examination material for the purposes of preparing or assisting an individual to take the examination.
- Fraud, dishonesty, or other misconduct will not be tolerated. If during the conduct of the examination a candidate has compromised, in any manner whatsoever, the integrity of the process or conduct of the examination, as per NDEB By-laws, the NDEB may void the results of the examination and deny the candidate the privilege of taking or repeating any further examinations or assessments.

Special Accommodation

Special accommodations are granted on an individual basis and are dependent on the nature and extent of the request, documentation provided, and requirements of the examination.

Requesting accommodations and confidentiality of requests

Individuals can request a special accommodation due to a documented disability, medical diagnosis, or for a religious reason. Requests for special accommodation are confidential. The Special Accommodations Coordinator will review the supporting documentation and may discuss submissions with the Director of Examinations and Credential Verification, In-House Legal Counsel and/or the Registrar as required.

Requests for special accommodation must be submitted by email to accommodations@ndeb-bned.ca and must include a detailed outline of the requested accommodation(s) and attachments of all supporting documentation. Email attachments must be PDF or jpeg format. Submissions must be received by the registration deadline date.

Supporting documentation cannot be older than one year and must include:

- a detailed report or official letter from a qualified professional appropriate for evaluating the accommodation
- a detailed diagnosis
- a description of the candidate's condition and specific recommendations for accommodation(s)

The NDEB reserves the right to request further documentation. Last minute requests are difficult to arrange and cannot be guaranteed.

Granting special accommodations

The NDEB will determine the date, location, and accommodation conditions that can be offered.

Accommodation(s) are valid for one examination session and are not transferrable to subsequent sessions.

Details can be found on the [NDEB website](#).

Compassionate Appeal

Candidates who consider themselves disadvantaged by a personal circumstance beyond their control, occurring either immediately before or during an examination, may within one week of this personal circumstance occurring, request that the NDEB make a special consideration to void the results of the examination. Requests for compassionate appeals must be submitted by email to info@ndeb-bned.ca. The NDEB may grant permission for the candidate to withdraw from the examination. Candidates may also request special consideration for a refund for up to 50% of the examination fee. Details can be found in the *NDEB By-laws and Policies for Assessments and Examinations*, available on the [NDEB website](#).

Passing Standard

In order to assure a consistent level of difficulty, the NDEB uses test equating and re-scaling procedures to correlate candidate raw scores to scores on a reference examination and to a standardized passing score of 75. Candidates must obtain a minimum test equated, re-scaled score of 75 to be successful in the OSCE. Candidates who obtain a test equated, re-scaled score of 75 or greater will receive a result of Pass. Candidates who obtain a test equated, re-scaled score of less than 75 will receive a result of Fail and also their test equated, re-scaled score.

The OSCE may contain a number of questions that are being tested and these questions may not contribute to any candidate's result.

Results

The results of the OSCE will normally be released within six weeks from the date of the examination. Email notification will be sent when results are available in the candidate's online profile. Results will not be released by telephone, email, or fax.

Manual Rescore

Within three months of the release of results, candidates can request a manual rescore. Two NDEB staff members perform a manual rescore by comparing the answers on the candidate's answer score sheet with the master answer key. The result of the manual rescore will be the final score. In most circumstances, this process confirms that no errors were made during the scanning and electronic scoring process.

Only candidates who received a failing grade can request a manual rescore of their examination. Candidates with a pass result are not eligible for this service.

Repeats

A candidate can take the OSCE a maximum of three times.