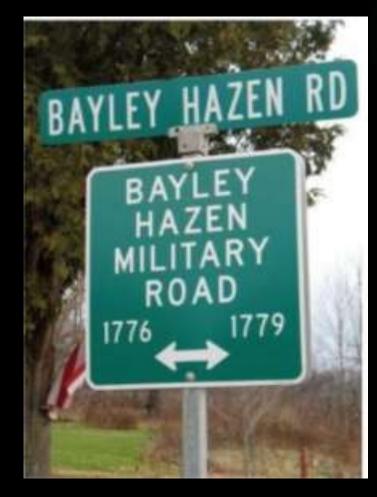


Q:) Which of the following is not an example of regulatory sign? A: Stop sign B: Give way sign C: one-way sign **D**: **T**-intersection sign







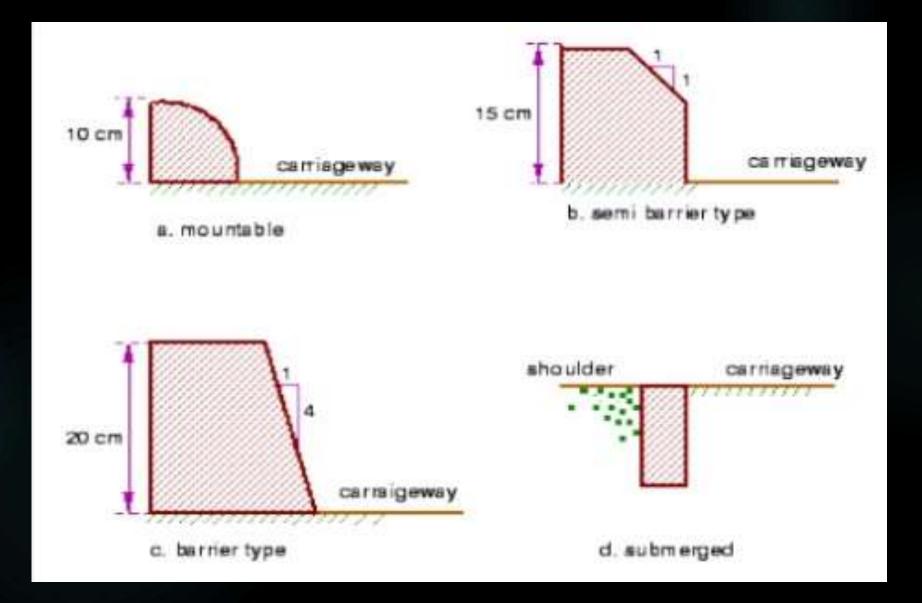
Q:) An artificially built, raised platform of any suitable hape at an intersection for the channelization of traffic is called A:Kerb **B**: Traffic signal C: None of the given options D: Central island

Q:) What are the number of potential conflict points of two roads having two lanes and two way traffic : A:11 **B:6 C**:24 D:32

Q:) Ratio of width of the car parking area required at kerb for 30° parking approximately A: 0.8 **B**: 0.7 C:2.0 D:0.5

Q:) The shape of 'give Way' sign in the traffic signal is: A: Rectangle **B: Octagonal** C: Circle D: Inverted triangle

Q:) What is the height of kerb stone in case of semi-barriers type kerb? A:10 cm B: 7.5 cm C:15 cm D:20 cm



Q:) Traffic conflicts that may occur in a rotary inter-section are A: merging and diverging **B**: Crossing and merging **C**: Crossing and Diverging **D**: Crossing. Merging and Diverging

Q: An engineer is designing a twophase traffic signal system with an allred time for pedestrian crossing as 15 s. If webster's method I used, then what will be the total lost time? A: 19s **B**:15s C:17 D:13

Q:) The background color of the information traffic sign board is? A: White

B : Yellow C : Green D : Red

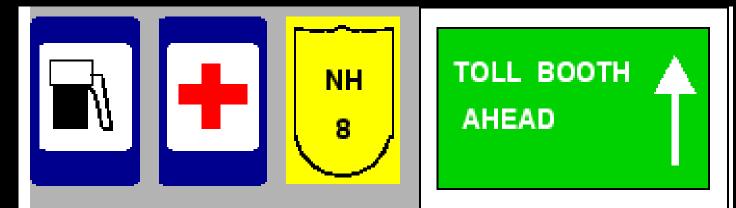


Figure 3: Examples of informative signs (route markers, destination signs, mile posts, service centre information etc)

Q: Which among the following is **NOT performed on bitumen?** A: Softening Point Test **B**: Viscosity test C: Los Angeles test **D**: Penetration

Q:) The minimum ductility range prescribed for bitumen to be used in pavement construction is : A:75-100 cm B: 50 - 75 cmC: 50 - 60 cmD: 5 - 60 cm

Q:) The unit standard load, in kg/cm for a standard penetration of 2.5 mm in CBR test setup is: A:1370 B:2055 **C**:70 D:105

Q: While conducting the softening point test on bitumen, the result is expressed as: A: Temperature B: Time C: Viscosity D: Flow

Q:) In highway construction engineering, the equipment HMA means-

- A : Hot Mix Aggregate plant B : Hot Mix Admixture
- C: Hard Mix Asphalt
- D: hot Mix Asphalt

Asphalt pavement refers to any paved road surfaced with asphalt. Hot Mix Asphalt (HMA) is a combination of approximately 95% stone, sand, or gravel bound together by asphalt cement, a product of crude oil. Asphalt cement is heated aggregate, combined, and mixed with the aggregate at an HMA facility.

Q:) heating asphalt with sand and mineral fillers produces: A: Mastic asphalt **B**: Asphaltic terrazzo C: Distilled asphalt D: Asphaltic felt

Q:) Which one of the following defects indicates progressive disintegration bituminous premix carpet surfacing by loss of aggregates? A: pot holes **B**: Ravelling C: Edge brecking D: Rutting

Q:) What are the standards for testing of road macadam in Aggregate impact test?

- A : 14 kg wt, 38cm drop, 15 blows B : 14 kg wt, 38cm drop, 20 blows
- C: 18 kg wt, 35cm drop, 15 blows
- D: 18 kg wt, 30cm drop, 20 blows

Q:) In CBR test, If the CBR value at 5mm is greater than that at 2.5 mm: A: The higher value should be chosen B: The test should be repeated C: Average value of the two should be used D: none of these

Q:) Bitumen of grade 60/70 means: A: Its penetration value is 60 mm to 70mm B: Its penetration value is 60 cm to 70cm C: Its penetration value is 60 mm and softening points id 70 D: Its specific gravity id 0.6 to 0.7

Q:) VG 30 grade of paving bitumen is suitable for 7 day Average Maximum Air temperature (0°C) ranging between A: 30 – 38 B: 0 - 30C: 38 – 45 D:45-60

Q:) The maximum stripping value of aggregate in bituminous construction should NOT be more then: A:18% **B**: 25 % C:5% D:10%

Specifications:

Indian Road Congress (IRC) has specified the maximum stripping value as 5 percent for aggregates to be used in bituminous construction like surface dressing penetration macadam, bituminous macadam and carpet.

The **stripping value of aggregates** is determined as the ratio of the uncovered area observed visually to the total area of **aggregates**, expressed as a percentage. Bitumen and tar adhere well to all normal types of **aggregates** provided they are dry and are not exceptionally dusty.

Q:) The viscous liquid obtained from the destructive distillation of organic material is known as..... A: Paint B: Slag C:Tar D: none of these

Q:) In the softening point test of the bitumen with the help of ring and ball apparatus, what is the diameter (cm) of the steel ball A: 0.35 B:0.65 C:0.95 D:1.25

Q:) Usually, what is the maximum permissible Los Angeles abrasion value (%) for dense bituminous macadam? A:45 **B**:25 C:55 D:35

Q:) The strength of the subgrade of roads is expressed by: A: Bearing capacity B: Modulus of subgrade reaction C:C.B.R value D: Maximum dry density at O.M.C

Q :) Mud pumping is a problem occurring in which type of pavement

- A: Moorum roads
- **B**: Earthen roads
- C : Flexible bitumen roads
- D: Rigid concrete roads

Q:) The value of rigidity factor for design of flexible pavement is-A: less than 1 for lower tyre pressure (<7kg/cm²) **B**: Greater than 1 for lower tyre pressure (<7kg/cm²) C: Equal to 1 for lower tyre pressure D: Equal to 0 for loer pressure

Q:) In case of highway construction, water bound macadam (WBM) grading no. 1 (G-1) consists of coarse aggregates in the range of A: 63 mm – 40 mm **B : 90 mm – 45mm** C: 50 mm – 20mm D: none of the above

Grade 1 - particles of size 90 mm to 40 mm.Grade 2 - particles of size 63 to 40 mm.Grade 3 - particles of size 50 to 20 mm.

The grade 1 aggregates having size of 90 mm to 40 mm are preferred for the sub-base material and grade 2 for the base and grade 1 for the surface course.

Q:) Joint filler used during highway construction are

- A : Soft wood
- B : Impregnated fibre boardC : Both (A) and (B)D : none of the above

Joints comprise a filler which separates the slabs, and a sealing compound which is **used** to fill the top 25 mm of the joint to prevent the entry of water and grit.

Suitable jointing materials include impregnated fibre board, cork, sheet bitumen, and rubber.

