

B. Diesel oil

D. All the same

11- Which of the following additives has a minimum effect on octane number in gasoline composition ?

A. n- paraffin

B. Aromatic

C. Iso-paraffin

D. none of these

12- The most popular antiknocking agent but not environmental eco-friendly is

A. C_2H_5-OH

B. $Pb_4C_2H_5$

C. TEL

D. MTBE

13- Which of the following hydrocarbon are most desirable in gasoline?

A. Paraffins

B. Naphthenes

C. Isoparaffins

D. Aromatic

14- Cetane no of α -methyl naphthalene is

A. 15

B. zero

C. 100

D. 17

15- The chemical structure of DEGMME is

A. $Me-OCH_2-CH_2-OH$

B. $HO-CH_2-CH_2-O-CH_2-CH_2-OH$

C. $H-OCH_2-CH_2-O-CH_3$

D. All False

16. Ethylene glycol added to gasoline where, it acts as an.....agent.

A. Anti-knocking

B. Anti-gum forming

C. Anti-icing

D. Dewaxing

17- PISI is the diesel additive which used as

A. Anti-gum

B. Deposit Control additives

C. Anti-Icing

D. Cold flow improver

18- (FM) is the fraction modifiers used in fuel are intended to reduce power loss from friction in internal combustion engines, is the most powerful additive to reduced the frictions:

A. Glycine dioleate

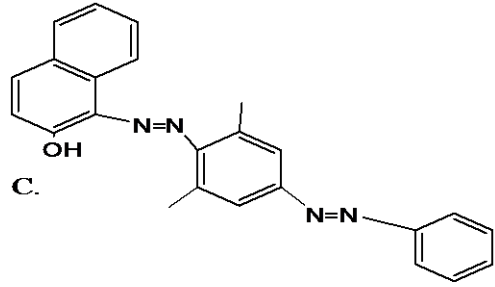
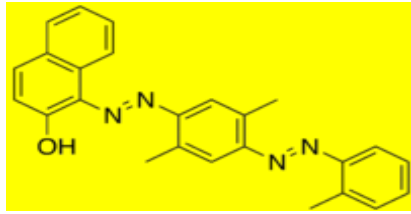
B. Glycerol mono-oleate

C. Glycerol dioleate

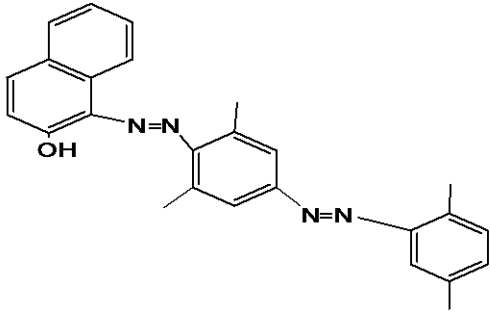
D. Glycine mono-oleate

19- The chemical structure of Solvent red 26 is

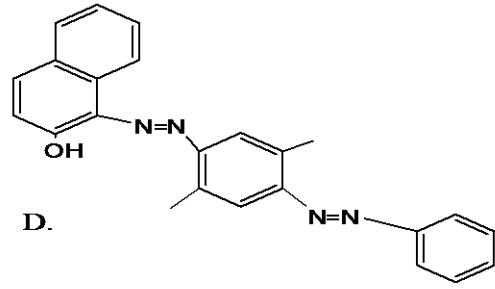
A.



B.

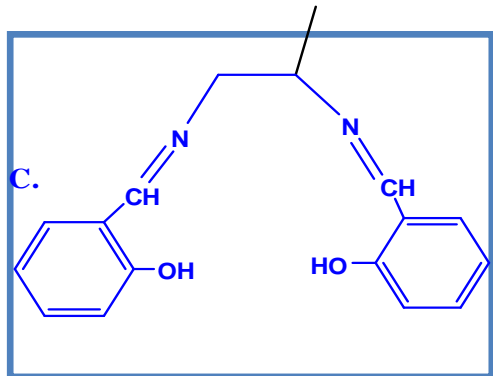
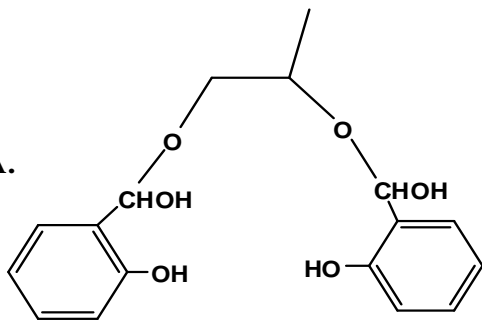


D.

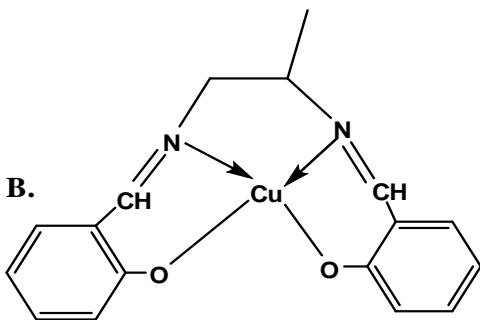


20- Metal deactivator which prevent the reduced the oxidation stability of gasoline, the most one used

A.



B.



D. B&C

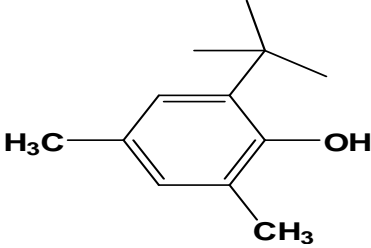
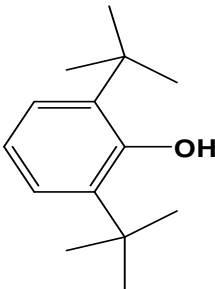
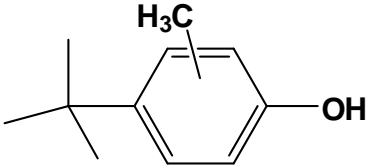
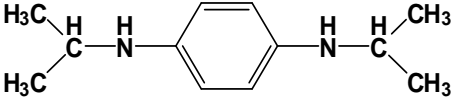
21- The purpose of lubrication is

- A. To reduce friction.
- B. To reduce wear.
- C. Transfer heat produced.
- D. All of above.

22-Viscosity index of a lubricating oil

- A. should be low.
- B. none of these.
- C. is the measure of variation of viscosity with temperature.
- D. is the measure of its flash point.

23- The structure formula for BHT is :

<p>A.</p> 	<p>C.</p> 
<p>B.</p> 	<p>D.</p> 

24- Can be used as metal deactivator for lubricant

- A. bis-di-salicylidine 1,2-propanediamine
- B. Benzotriazole
- C. Tetrahydrofuran
- D. EG

25-is used as a raw material for manufacture of fertilizer urea.

- A. Benzene B. Ammonia C. Methane D. Butadiene

26- Cumene is main petrochemical produced from

- A. Propylene B. Acetylene C. Butane D. None of them

27- $\text{CH}_4 + \text{O}_2 \longrightarrow$

- A. CH_2O_2 B. CH_3OH C. $\text{CH}_3\text{-O-CH}_3$ D. No product

28- The property of reducing friction is known as

- A. Lubricity B. Frictionty C. Viscosity D. Hydric stability

29- Synthesis gas is a mixture of

- A. CO/H_2 B. CO_2/H_2 C. $\text{H}_2\text{O}/\text{CO}$ D. No One

30- $\text{CH}_4 \longrightarrow \text{CH}_3\text{Cl} \longrightarrow \text{CH}_3\text{OH}$ Methyl alcohol is referred to..... as petrochemicals.

- A. Primary B. Secondary C. Down stream D. Both a&c

31- Methane is the major hydrocarbon of

- A. N G B. C N C. L N D. L G

32- is a fraction obtained during refining of petroleum.

- A. Naphtha B. Toluene C. Reformed naphtha D. Ethyne

33- Petroleum is exist as solids in the form of oil.....

- A. Crude B. Shales C. Gas D. Diesel

34-is a complex mixture of hydrocarbons formed by the decomposition of fossil remains.

- A. Petroleum B. Petrochemicals C. Detergent D. Naphtha

35-The process that convert higher hydrocarbon to smaller gaseous hydrocarbons is...

- A. Heating B. Oxidation C. Cracking D. Refining

36- The major petrochemicals produced from ethylene :

A. Vinyl Chloride B. Polyethylene C. Ethylene Oxide D. All of them

37-The starting material used for the production of petrochemicals.

A. L P G B. Pentane C. Xylene D. Feedstock

38- on polymerization give BUNA-S

A. Butadiene B. Isopropyl benzene C. Styrene D. Both a&c

39- One of the most common feedstock is

A. synthetic fiber B. synthetic rubber C. synthetic detergent D. NG

40- DDT is

A. Dichlorodiphenyl trichloromethane B. Dichlorodiphenyl trichloroethane C. Dichlorodiphenyl trichloropropane D. Both a&b

