Q.1. The government of India has recently amended the ________________ to bring Cooperative banks under the regulatory mechanism of Reserve Bank of India?

a) Banking Regulation Act, 1949  
b) The Bankers'Books Evidence Act, 1891  
c) The Reserve Bank of India Act, 1934  
d) Recovery of Debts due to Banks and Financial Institutions Act, 1993  
e) None of the above

Explanation: The Union Cabinet chaired by the Prime Minister Narendra Modi, has decided to bring Cooperative banks under the regulatory mechanism of Reserve Bank of India on 5th February 2020.

- The government approved amendments to the Banking Regulation Act, 1949 to ensure greater accountability and transparency in the functioning of Cooperative Banks.
- According to the data released by RBI, Urban cooperative banks (UCBs) reported nearly 1,000 cases of fraud worth more than Rs 220 crore in the last five fiscals.
- After the amendment, such banks will come under RBI's (Reserve Bank of India) regulation.
- And, the Cooperative Banks need to fulfil regulatory requirements set for scheduled commercial banks and will also be audited as per RBI norms.
- The amendments is made considering the collapse of Punjab and Maharashtra Co-operative (PMC) Bank last year.
- After the Cabinet nod, the proposal will go for the Parliamentary approval.

Q.2. The Reserve Bank of India has increased the Insurance cover on bank deposits per depositor for all banks in the country from Rs 1 lakh currently to ____________?

a) Rs 4 lakh  
b) Rs 5 lakh  
c) Rs 7 lakh  
d) Rs 10 lakh  
e) None of the above

Explanation: Deposit Insurance and Credit Guarantee Corporation (DICGC), a wholly-owned subsidiary of the Reserve Bank of India provides the insurance coverage to the depositors.

- The DICGC has raised the limit of insurance cover for depositors in insured banks to provide a greater measure of protection to depositors in banks and boost the confidence of people in the banking system.
- The insurance coverage norm of the RBI is effective from 4th February 2020, with the approval of Government of India.
- Deposit insurance was static at one lakh rupees since 1993.
- Finance Minister Nirmala Sitharaman had made the announcement regarding increasing insurance cover to five lakh rupees in her Budget Speech 2020-21.
Now, the banks will pay a premium of 12 paise against 10 paise per 100 rupees deposited after the increased insurance coverage.

The deposit insurance scheme covers all banks operating in India, including:
- Private sector
- Cooperative
- Branches of foreign banks

Exemptions have been given to:
- Deposits of foreign governments
- Deposits of Central and State Governments
- Inter-bank deposits

Q.3. As per the latest norms of RBI for credit and debit cards, banks shall provide all cardholders to switch ON/OFF or change all transaction limits via which channel/channels?

a) Mobile application  
b) Internet banking  
c) ATMs  
d) Interactive Voice Response (IVR)  
e) All the above

**Explanation:** The Reserve Bank of India issued new rules for credit and debit cards on 15th January 2020 to improve user convenience and increase the security of card transactions.

- RBI asks banks to allow at the time of issue or re-issue, all cards (physical and virtual) should be enabled for use only at contact-based points of usage [ATMs and Point of Sale (PoS) devices] within India.
- The instructions given by the RBI assume significance amid rising instances of cyber frauds.
- Customers will have to separately set up services on their card for international transactions, online transactions, card-not-present transactions and contactless transactions.
- The new rules will be applicable for new cards issued by the banks from 16th March 2020.
- Those with old cards can decide whether to disable any of these features.
- Issuers shall provide to all cardholders 24x7 access to switch ON/OFF or change all transaction limits via all available channels — mobile application/internet banking / ATMs / Interactive Voice Response (IVR).
- The new provisions are not mandatory for prepaid gift cards and those used at mass transit systems.
Q.4. RBI has recently amended the KYC norms to introduce a video based digital technology to help the banks and lending institutions to onboard customers remotely, the newly introduced technology is?

a) V-PCI  
b) V-CIP  
c) V-PIC  
d) V-ICP  
e) None of these

Explanation:
- Under the new norm, banks and other lending institutions regulated by RBI are allowed to use a Video based Customer Identification Process (V-CIP).
- The video KYC will be consent based, means the bank will have to take the consent of the customer for V-CIP.
- The move will help the banks and lending institutions to onboard customers remotely.
- The V-CIP will make it easier for banks and other regulated entities to adhere to the RBI's Know Your Customer (KYC) norms by leveraging the digital technology.
- RBI has allowed the V-CIP as:
  - A consent based alternate method of establishing the customer's identity
  - For customer on-boarding with a view to leveraging the digital channels for Customer Identification Process (CIP) by regulated entities (REs)
  - The video recording is stored in a safe and secure manner and bears the date and time stamp.
- The central government had introduced V-CIP with making amendment in the guidelines under the Prevention of Money-laundering (Maintenance of Records) Rules, 2005.

Q.5. As per the revised Supervisory Action Framework of RBI, a UCB may come under SAF when its net NPAs exceed ____% of its net advances?

a) 2%  
b) 4%  
c) 6%  
d) 8%  
e) None of the above

Explanation:
- The step is taken to ensure expeditious resolution of financial stress being faced by the UCBs, in the backdrop of the scam in Punjab and Maharashtra Cooperative (PMC) Bank causing distress to over 9 lakh depositors.
  - As per the revised norms, a UCB may come under SAF when:
    - Its net NPAs exceed 6% of its net advances
  - It incurs losses for two consecutive financial years or has accumulated losses on its balance-sheet.
  - The RBI will continue to monitor asset quality, profitability and capital/net worth of UCBs under the revised SAF.
  - Depending upon the stress severity, the RBI may ask them to curtail their lending powers, among other safeguards.
  - In case the normal functioning of the UCB no longer considered to be in the interest of its depositors/public, RBI can consider the issue of show cause notice for cancellation of a banking license.

Q.6. RBI has directed all (Urban) Co-operative Banks (UCBs) having total assets of ________ and above as on 31st March of the previous financial year to report exposures on all borrowers having aggregate exposures of __________ and more to the CRISIL?
Q. 7. Deen Dayal Antyodaya Yojana-National Rural Livelihood Mission was launched under which ministry?

a) Ministry of Agriculture and Farmers Welfare  
b) Ministry of Agro and Rural Industries  
c) Ministry of Health and Family Welfare  
d) Ministry of Rural Development  
e) None of the above

Explanation: DDAY-NRLM was launched by the Ministry of Rural Development (MoRD), Government of India in June 2011 as a restructured version of Swarna Jayanti Gram Swarozgar Yojana (SGSY). The mission seeks to alleviate rural poverty through building sustainable community institutions (SHGs) of the poor. This is a centrally sponsored programme and is implemented in partnership with the State governments.

Q. 8: Which out of the following circuit/circuits is/are part of ‘Swadesh Darshan’ scheme?

a) Krishna Circuit  
b) Buddhist Circuit  
c) Rural Circuit  
d) B and c  
e) a ,b and c

Explanation: SDS is an Integrated Development of theme based tourist circuits is the flagship scheme of Ministry of Tourism for development of tourism infrastructure in the country. The scheme has following objectives:

- Position tourism as a major engine of economic growth and job creation;
- Develop circuits having tourist potential in a planned and prioritized
- In January 2015 Ministry of Tourism launched the Swadesh Darshan Scheme (Central Sector Scheme) with following five circuits Himalayan Circuit, North East Circuit, Krishna Circuit, Buddhist Circuit and Coastal Circuit. Later during 2015, 2016 and 2017, 10 more thematic circuits namely Desert Circuit, Tribal Circuit, Eco Circuit, Wildlife Circuit, Rural Circuit, Spiritual Circuit, Ramayana Circuit, Heritage Circuit, Tirthankar Circuit and Sufi Circuit were added in the scheme making it to 15 thematic circuits.

Q. 9: choose the correct statement/statements about “Mahatma Gandhi Bunkar Bima Yojana”

a) Rs 300 crore, Rs 3 crore  
b) Rs 400 crore, Rs 4 crore  
c) Rs 500 crore, Rs 5 crore  
d) Rs 600 crore, Rs 6 crore  
e) None of the above

Explanation: The Co-operative Banks (UCBs) having total assets of Rs 500 crore and above as on 31st March of the previous financial year shall report credit information, including classification of an account as Special Mention Account (SMA), on all borrowers having aggregate exposures of Rs 5 crore.

Special Mention Account (SMA) is an account which is exhibiting signs of incipient stress resulting in the borrower defaulting in timely servicing of her debt obligations, though the account has not yet been classified as NPA as per the extant RBI guidelines.

The RBI has created a Central Repository of Information on Large Credits (CRILC) of commercial banks, all India financial institutions and certain non-banking financial companies.

CRILC was formed with multiple objectives but primarily includes:
- Strengthening offsite supervision
- Early recognition of financial distress
a) The weaver must earn at least 50% of his income from handloom weaving
b) The weaver must be between 18 to 59 years of age
c) The scheme’s objective is to provide insurance cover to handloom weavers only
d) All are correct
e) None of the above

**Explanation:** The weaver’s income must earn at least 50% of his income from handloom weaving.

- All weavers must be between 18 to 59 years of age which includes minorities, women weavers and weavers belonging to North East Region are eligible to apply for this insurance scheme.
- The basic objective of Mahatma Gandhi Bunkar Bima Yojana is to provide insurance cover to handloom weavers in case of natural death (Rs. 60,000/-), accidental death (Rs. 1,50,000/-), total disability (Rs. 1,50,000/-) and partial disability (Rs. 75,000/-).
- Government of India had launched the Bunkar Bima Yojana for Handloom Weavers to provide insurance cover by associating with Life Insurance Corporation of India (LIC)

Q. 10: PM Kisan Sampada Yojana (PMKSY) was launched under the ministry of?

a) Ministry of Food Processing Industries
b) Ministry of Agriculture and Farmers Welfare
c) Ministry of Rural Development
d) Ministry of Commerce and Industries
e) None of the above

**Explanation:**

PMKSY is implemented by Ministry of Food Processing Industries (MoFPI) with the objective to supplement agriculture, modernize processing and decrease Agri-Waste. It aims for creation of modern infrastructure with efficient supply chain management from farm gate to retail outlet. It helps in providing better prices to farmers and create huge employment opportunities especially in the rural areas.

Q. 11: What percentage of rural population is involved in agriculture sector in the country?

a) About 50%
b) About 85%
c) About 64%

d) About 30%

e) None of the above

Explanation:

- The periodic labour force survey (PLFS) data indicates working population in the agriculture sector of men and women has decreased from 80% and 88% in 1977-78 to 55% and 73% in 2017-18 respectively.

- It is observed that 64% of rural employment is in the agriculture sector, while the share of agriculture in rural output is just 39%.

Q. 12. In the context of RBI norms for asset reconstruction companies (ARCs) to acquire financial assets, choose the correct statement?

- RBI has put restriction on the ARCs from buying financial assets from their sponsor firms and lenders (bank or financial institution) on a bilateral basis.
- As per the amendment made in the Sarfaesi Act, 2002 RBI had permitted ARCs to acquire financial assets from other ARCs.

a) Only 1
b) Only 2
c) Both 1 and 2
d) Either 1 or 2
e) None of the above

Explanation:

- RBI has put restriction on the ARCs from buying financial assets from its sponsor firms and lenders (bank or financial institution) on a bilateral basis.

- Asset Reconstruction Company (India) (Arcil), which is sponsored by State Bank of India (SBI), ICICI Bank, Punjab National Bank (PNB) and IDBI Bank is likely to be affected the most.

- RBI has also restricted ARCs to buy financial assets from a bank or financial institution, which is:
  o A lender to the ARC
  o A subscriber to the fund raised by the ARC for its operations
  o An entity in the group to which the ARC belongs

- However, the ARCs are allowed to participate in auctions of such assets provided-
  o Such auctions are conducted in a transparent manner
  o On arm’s length basis
  o The prices are determined by market forces

Q. 13. The Reserve Bank of India has revised the Real GDP growth in its Fifth Bi-monthly Monetary Policy, 2019-20 from 6.1% in the October policy to ______?

a) 4.2%
b) 5.7%
c) 5.0%
d) 5.1%
e) None of the above

Explanation:

Main Highlights of Fifth Bi-monthly Monetary Policy, 2019-20 are:

- The MPC voted unanimously to keep the policy rate unchanged at 5.15%.
• It decided to continue with the accommodative stance as long as it is necessary to revive growth, while ensuring that inflation remains within the target.

• The MPC revised the CPI inflation projection upwards to 5.1-4.7 % for H2:2019-20 and 4.0-3.8 % for H1:2020-21.

• Real GDP growth for 2019-20 is revised downwards from 6.1 % in the October policy to 5.0 % – 4.9-5.5 % in H2 and 5.9-6.3 per cent for H1:2020-21.

Q. 14. RBI has recently announced that it has decided to bring Urban Co-operative Banks (UCBs) with assets of ___________ and above under the Central Repository of Information on Large Credits - CRILC reporting framework?

a) Rs 100 crore
b) Rs 200 crore
c) Rs 400 crore
d) Rs 500 crore
e) None of the above

Explanation: The RBI has created a Central Repository of Information on Large Credits (CRILC) of scheduled commercial banks, all India financial institutions and certain non-banking financial companies with multiple objectives, which, among others, include strengthening offsite supervision and early recognition of financial distress, according to the RBI’s Statement on Developmental and Regulatory Policies.

Q: 15. Which organization releases the Emission Gap Report 2019?

a) WHO
b) ILO
c) UNWTO
d) UNEP
e) None of these

Explanation:

• Who released the Emission Gap Report 2019?
  o It is the United Nations Environment Programme (UNEP) that has released the Emission Gap Report 2019.
  o Headquarters: Nairobi, Kenya

• What exactly is the Emissions Gap?
  o Emissions Gap is also known as the Commitment Gap. Emissions Gap is basically the difference between the lowest levels of emissions what the World needs to follow and what is being done in reality to curb the hazardous levels of climate change.

Q.16. The newly introduced Prepaid Payment Instrument (PPI) of RBI is a __________ PPI?

a. Closed system PPI
b. Semi-closed PPI
c. Open PPIs
d. Either a or b
e. None of them

Explanation: The instrument has been introduced to give increased impetus to small ticket digital payments to merchants, local shops and retail outlets.

• The new semi-closed Prepaid Payment Instrument (PPI) can be used only for making retail payments and will come with a monthly rechargeable limit of Rs 10,000.
• The Rs 10,000 amount can only be uploaded only from a bank account linked with the customer’s verified mobile number.
• An annual limit of Rs 1.2 lakh has also been fixed by the RBI, that can be recharged on these accounts.
• The banks and existing non-bank PPI players can issue the new payment instrument and would verify the credentials of customers.
• The verification process involves the use of an OTP sent to the user’s verified mobile number and a digital identification document recognized by the Department of Revenue.

Closed System Payment Instruments
They are usually issued by businesses/organizations for buying their own products or services only.

• These instruments do not permit cash withdrawal.
• RBI approval is not required to issue these Payments Instruments.
• E.g. - Delhi Metro Prepaid card - these can be used for their respective establishments only.

Semi-Closed System Payment Instruments
These Payment Instruments can be used for the purchase of goods and services at a group of clearly identified merchants/locations/places which have a specific contract with the issuer to accept the Payment Instrument.

• Do not permit cash withdrawal.
• E.g. - Sodexo cards are redeemable at designated stores only.
• They can be recharged or topped up.

3. Semi-Open System Payment Instruments
These payment instruments can be used at any card accepting point of sale terminals for purchase of goods and services.

• Do not permit cash withdrawals.
• E.g. - Gift cards

4. Open System Payment Instruments
• These Payment systems can be used for the purchase of goods and services including financial services like fund transfer at any card accepting merchant location (Point of sale terminal) and also permits cash withdrawal at ATM.
  These can be or sometimes can’t be recharged or Topped up.
• Only Banks can issue these Instruments.
• Cash withdrawal permitted. Example: MasterCard, Rupay (Indian one), Visa etc.

Q. 17. The Finance Minister has recently announced that all companies with a turnover of ______________ or more will be mandated to provide the facility of payment through RuPay and UPI platform, without any Merchant Discount Rate (MDR)?

   a. Rs 25 crore
   b. Rs 50 crore
   c. Rs 100 crore
   d. Rs 500 crore
   e. None of the above

Explanation: Union Finance Minister Smt. Nirmala Sitharaman has said that no Merchant Discount Rate (MDR) will be applicable on transactions through RuPay and UPI platforms.

• She said that no MDR charge would be charged from 1st January 2020.
The step is taken to promote digital payments along with indigenously developed digital payment medium like RuPay and BHIM UPI over the payment gateway promoted by foreign companies.

Q.18. RBI has directed all (Urban) Co-operative Banks (UCBs) having total assets of _________ and above as on 31st March of the previous financial year to report exposures on all borrowers having aggregate exposures of _________ and more to the CRISIL?

a. Rs 300 crore, Rs 3 crore  
b. Rs 400 crore, Rs 4 crore  
c. Rs 500 crore, Rs 5 crore  
d. Rs 600 crore, Rs 6 crore  
e. None of the above

Explanation:

- The Co-operative Banks (UCBs) having total assets of Rs 500 crore and above as on 31st March of the previous financial year shall report credit information, including classification of an account as Special Mention Account (SMA), on all borrowers having aggregate exposures of Rs 5 crore.
- Special Mention Account (SMA) is an account which is exhibiting signs of incipient stress resulting in the borrower defaulting in timely servicing of her debt obligations, though the account has not yet been classified as NPA as per the extant RBI guidelines.
- The RBI has created a Central Repository of Information on Large Credits (CRILC) of commercial banks, all India financial institutions and certain non-banking financial companies.

Q.19. In the context of RBI norms for asset reconstruction companies (ARCs) to acquire financial assets, choose the correct statement?

1. RBI has put restriction on the ARCs from buying financial assets from their sponsor firms and lenders (bank or financial institution) on a bilateral basis.

2. As per the amendment made in the Sarfaesi Act, 2002 RBI had permitted ARCs to acquire financial assets from other ARCs.

   a) Only 1  
   b) Only 2
c) Both 1 and 2

d) Neither 1 and 2

e) None of the above

Explanation:

- RBI has put restriction on the ARCs from buying financial assets from its sponsor firms and lenders (bank or financial institution) on a bilateral basis.
- Asset Reconstruction Company (India) (Arcil), which is sponsored by State Bank of India (SBI), ICICI Bank, Punjab National Bank (PNB) and IDBI Bank is likely to be affected the most.
- RBI has also restricted ARCs to buy financial assets from a bank or financial institution, which is:
  - A lender to the ARC
  - A subscriber to the fund raised by the ARC for its operations
  - An entity in the group to which the ARC belongs

Q. 20. What is the limit on the aggregate exposure of a lender to all borrowers at any point of time, across all NBFC-P2P platforms?

a) Rs. 10 lacs
b) Rs. 25 lacs
c) Rs. 50 lacs
d) Rs. 60 lacs
e) None of these

Explanation: NBFC-P2P shall maintain a Leverage Ratio not exceeding 2.

- The aggregate exposure of a lender to all borrowers at any point of time, across all P2P platforms, shall be subject to a cap of Rs.50,00,000/- provided that such investments of the lenders on P2P platforms are consistent with their net-worth.
- The lender investing more than Rs.10,00,000 across P2P platforms shall produce a certificate to P2P platforms from a practicing Chartered Accountant certifying minimum networth of Rs.50,00,000.
- The aggregate loans taken by a borrower at any point of time, across all P2Ps, shall be subject to a cap of Rs.10,00,000/-. 
- The exposure of a single lender to the same borrower, across all P2Ps, shall not exceed Rs.50,000/-. 
- The maturity of the loans shall not exceed 36 months.
- P2Ps shall obtain a certificate from the borrower or lender, as applicable, that the limits prescribed above are being adhered to.

Q.21 The Gaganyan mission of ISRO is scheduled to be launched in which year?

a) 2020
b) 2021
c) 2022
d) 2024
e) None of these

Ans.21 (A) The training of the Astronauts would begin from the third week of January 2020. Gaganyaan is a fully autonomous spacecraft designed to carry a 3-member crew to orbit at 400 km altitude and safely return to the Earth after a mission duration of up to seven days.

Q.22 Phase 1 of the eDGCA project has been recently launched by which ministry?

a) Ministry of Culture
b) Ministry of Civil Aviation
c) Ministry of Coal  
d) Ministry of Chemicals and Fertilizers  
e) None of these  

Ans.22 (B) Secretary of Ministry of Civil Aviation, Pradeep Kharola has launched the Phase-1 services of the e-Governance project of Directorate General of Civil Aviation (DGCA).

Q.23 What is the gross GST revenue collected in the month of December, 2019?

a) Rs 1,03,492 crore  
b) Rs 95,380 crore  
c) Rs 1,03,184 crore  
d) Rs 99,734 crore  
e) None of these  

Ans.23 (C) The government has settled Rs 21,814 crore to CGST and Rs 15,366 crore to SGST from IGST as regular settlement. Goods and Services Tax (GST) is an indirect tax (or consumption tax) used in India on the supply of goods and services.

Q.24 Which App has been recently launched by the RBI to help visually challenged people to identify denomination of currency notes?

a) VANI  
b) MANI  
c) SANI  
d) PANI  
e) None of these  

Ans.24 (B) Reserve Bank of India (RBI) has launched a mobile app named Mobile Aided Note Identifier (MANI) to help visually challenged people to identify denomination of currency notes.

Q.25 Which among the following has been recently launched by the Election Commission to allow the political parties to track the status of the applications on a real time basis?

a) Political Parties Tracking System  
b) Political Parties Registration System  
c) Political Parties Registration Tracking Management System  
d) Political Parties Registration Tracking and Information System  
e) None of these  

Ans.25 (C) The Political Parties Registration Tracking Management System is launched to enable applicants to track the status of the applications on a real time basis. The new norms have come into force from 1st Jan 2020.

Q.26 Which year is chosen as the National tourism year of Nepal by the Nepal Government?

a) 2019  
b) 2020  
c) 2021  
d) 2022  
e) None of these  

Ans.26 (B) The ambitious campaign is aimed to promote tourism in Nepal and attract 2 million tourists during the year 2020. Visit Nepal 2020 campaign was also launched in all the seven provinces of Nepal.
Q.27 The '107th Indian Science Congress' (ISC), 2019 is being held in which state?

a) Kerala  
b) Karnataka  
c) Tamil Nadu  
d) Odisha  
e) None of these  

**Ans.27 (B)** The '107th Indian Science Congress' (ISC), will be held from 3rd-7th January 2020 at University of Agricultural Sciences (UASB), Bangalore, Karnataka.

Q.28 The 5th Ice Hockey Association of India (IHAI) National Ice Hockey Championship -2020 is being held in?

a) Kargil  
b) Srinagar  
c) Leh  
d) Pulwama  
e) None of these  

**Ans.28 (C)** The tournament will continue till 7th January in Karzoo Ice Hockey Rink in Leh, where the Army, Chandigarh, Delhi, Haryana, Maharashtra and home team Ladakh are fighting for the championship in U-20 boys’ category.

Q.29 India’s trade deficit with China is currently at _______?

a) $83.6 billion  
b) $33.6 billion  
c) $53.6 billion  
d) $63.6 billion  
e) None of these  

**Ans.9 (C)** A total of 371 items will be restricted from March 2020 which includes toys, plastic goods, Sport items, furniture especially from China. This step was needed to shrink the trade deficit with China which is currently at $53.6 billion.
Q.30 Which state has received the Krishi Karman Award for the best-performing state in Overall Food-grain Production Category-III (production less than 1 million tone) for the year 2017-18?

a) Chhattisgarh  
b) Uttar Pradesh  
c) Manipur  
d) Punjab  
e) None of these

Ans.30 (C) Manipur was selected for the prestigious award as the best-performing state in Overall Food-grain Production Category-III (production less than 1 million tones) for the year 2017-18.

Q.31 The World Braille Day is observed across the world on ________?

a) 4th December  
b) 4th January  
c) 14th January  
d) 24th December  
e) None of these

Ans.31 (B) The world Braille Day is being celebrated annually on 4th January across the world. The day is marked remembering the birth anniversary of Louis Braille, the inventor of Braille - for people with visual disabilities.

Q.32 In which state of India, the 2nd tallest statue of Sardar Vallabhbhai Patel in the world is recently unveiled?

a) Maharashtra  
b) Gujarat  
c) Uttar Pradesh  
d) Rajasthan  
e) None of these

Ans.32 (B) Gujarat Chief Minister Vijay Rupani unveiled the second tallest statue of Sardar Vallabbhbhai Patel in the world at Ahmedabad on 3rd Jan 2020. The total cost on the bronze made statue was around Rs 3.25 crore.

Q.33 Which Indian has become the world no.1 in the latest International Table Tennis Federation (ITTF) rankings in the Under-21 men’s singles category?

a) G. Sathiyan  
b) Achanta Sharath Kamal  
c) Manav Thakkar  
d) Manika Batra  
e) None of these

Ans.33 (C) Manav Thakkar has now become the fourth Indian to achieve the feat after Harmeet Desai, G Sathiyan and Soumyajit Ghosh. Thakkar was also world no. 1 in the Under-18 category in February 2018.

Q.34 In which Zoo of India, successful hatching of a pair of the endangered Greater Adjutant chicks (Hargila) was carried out recently?

a) Assam State Zoo  
b) Manipur State zoo  
c) Tripura State zoo  
d) Meghalaya State zoo  
e) None of these
Ans.34 (A) Although Greater Adjutant storks have been kept in zoos throughout the world, they have not successfully bred until now. The captive breeding of this species at Assam State Zoo (also called Guwahati Zoo) is a great contribution to the conservation of this endangered species.

Q.35 The merchant discount rate is the rate charged to a merchant for payment processing services on?

1. Debit card transactions
2. Credit card transactions
a) 1 only
b) 2 only
c) Both 1 and 2
d) Neither 1 or 2
e) None of the above

Ans.35 (C) Merchant Discount Rate is the fee accrued by banks, and is generally levied from the merchants processing the debit and credit card transactions.

Q.36 The Tagline of the United Commercial (UCO) Bank is?

a) Together we can
b) Good Bank of Good People
c) Honours Your Trust
d) Trusted Family Bank
e) None of these

Ans.36 (C) State owned United Commercial (UCO) Bank has recovered Rs 800-900 crore in the 3rd quarter (ending December) by corporate debt resolution of four accounts under the bankruptcy law.

Q.37 Who is the winner of the award for the Best actor in a film in drama category at the 77th Golden Globes, 2020?

a) Brad Pitt
b) Joaquin Phoenix
c) Taron Egerton
d) Brian Cox
e) None of these

Ans.37 (B) The 77th Golden Globes is happened at the Beverly Hilton in Beverly Hills, on 5th January 2020.

Q.38 The Headquarter of the public sector “Indian overseas bank” is at?

a) Mumbai
b) Chennai
c) New Delhi
d) Bangalore
e) None of these

Ans.38 (B) The bank has received the amount as contribution of the government in preferential allotment of equity shares during the financial year 2019-20 as government's investment. Indian Overseas Bank Headquarter is Chennai.

Q.39 What is India’s rank in the recently released Travel & Tourism Competitiveness Index?

a) 11th
b) 23rd
c) 34th
d) 42nd
e) None of these

**Ans.39 (C)** In the year 2019, India’s rank in the Index has moved to 34th position from 65th rank in 2013. Foreign Tourist Arrivals has registered a growth of 3.2% in the year 2019 in India.

Q.40 The Antarrasatriya Yoga Diwas Media Samman (AYDMS) was instituted in which year?

a) 2016
b) 2017
c) 2018
d) 2019
e) None of these

**Ans.40 (D)** Antarrasatriya Yoga Diwas Media Samman (AYDMS) was instituted in June 2019 to mark media contribution in spreading the message of Yoga.

---

**ENGLISH LANGUAGE**

Direction (41-50): Read the passage carefully and answer the questions given below it. There are some blanks given in the passage based on which some questions are framed, and some words are highlighted as well to help you answer some of the questions.

Gandhi felt his end was near. He had lost the wish and hope to live the full span of life “in view of the - (A)___________darkness”. If, however, people ushered in a new era of peace and amity, he would “be ‘commanded’ to wish to live the full span”, he told Margaret Bourke-White on January 29. Days and hours before his assassination, as he repeatedly referred to it, he must have been ruminating on death, which he often called the great friend.

Economy was a (B)virtue for Gandhi, and he would not leave even the obverse side of an envelope unused. Would he have seen death as something to be put to good use? We speak of his death in terms of martyrdom, as his final sacrifice in his life-long yajna. What were his own thoughts? He possibly started the decidedly stoic practice of (C)contemplation of death during the civic resistance struggle in South Africa. The Gita and its message of the
eternity of soul, along with the death of Socrates and Jesus Christ offered him a way of making sense of the end of life — as life brought to perfection.

From the Gita, the “perennial guide to conduct” for him, he derived his philosophy as a way of life and also of death. He believed it was composed “to remove the fear of death”. Speaking on the shraddha day of C R Das in Kolkata in 1925, he singled out this verse: “What is non-Being is never known to have been, and what is Being is never known not to have been. Of both these the secret has been seen by the seers of the truth.” (Gita, II, 16) He then added, “If Hinduism has asserted anything in the clearest possible terms, it is that the body and all that we behold is asat.”

In 1904, exhorting the Indian community in South Africa to strengthen the movement, Gandhi spoke of sacrifice as “the law of life”, running through and governing every walk of life. “We can do nothing or get nothing without paying a price for it, as it would be said in commercial (D)parlance or, in other words, without sacrifice. It would secure the salvation of the community to which we belong; we must pay for it, that is, sacrifice self ....Christ dies on the Cross of Calvary, and left Christianity as a glorious heritage.” The image of Christ crucified endured with him. After seeing a painting of the crucified Christ in the Sistine Chapel of Rome, he commented, “I saw there at once that nations like individuals could only be made through the agony of the cross and in no other way”.

Gandhi was so moved by Plato’s Defence and Death of Socrates, that (as with John Ruskin’s Unto This Last) that he paraphrased it in Gujarati for the readers of the Indian Opinion in 1908. “Ek Satyavirni Katha Athva Socratesno Bachav” notes, “I want to explain (A)/to you the meaning of death as I see it. (B)/Believe that what has happened to me is a good thing and (C)/that those who believe that death is an evil must be mistaken.(D)”

Gandhi acknowledged many interpretations of the term yajna, but saw only one meaning acceptable to all faiths: “To be ready even to lay down one’s life for true welfare.” “Life comes out of death. A seed must disintegrate under earth and perish before it can grow into grain. Harishchandra went through endless suffering to honour his word as a man of truth, Jesus put on a crown of thorns to win salvation for his people, allowed his hands and feet to be nailed and suffered (E) agonies before he gave up the ghost. This has been the law of yajna from immemorial times. Without yajna this earth cannot exist even for a moment.”

The yajna he had in mind in 1948, amid the aftermath of Partition, was aimed at nurturing Hindu-Muslim unity. Offering something we value in order to keep the universe in balance is yajna. What can be more valuable than life itself? This has an interesting parallel in western philosophy. The French philosopher Brice Parain argued that the Logos (language and rationality) is constantly under threat of disorder, as in thermodynamics. The only way to sustain the Logos is the death of an individual. He was referring to the death of Socrates.

Q: 41. Which of the words can fill the blank marked as (A) in the first Para of the given passage?
   a) striking
   b) declining
   c) incumbent
   d) prevailing
   e) None of these

Answer. D
Explanation: The correct statement- Gandhi felt his end was near. He had lost the wish and hope to live the full span of life “in view of the (A)prevailing darkness”. Striking and declining cannot be used because if striking is used it will make no sense and declining is less appropriate. Prevailing is more appropriate because it speaks of the situation of that time. Incumbent means necessary for someone as a duty or responsibility. This word is clearly irrelevant here.

Q: 42. According to Mahatma Gandhi, the Gita was composed for what sole reason?
   a) to keep evil spirits away
   b) to die at one’s desired time
   c) to remove the fear of death
d) to make someone understand the meaning of karma

e) None of these

Answer: c

Explanation: It is clearly mentioned in the third paragraph of the given passage “Gandhi believed the Gita was composed to remove the fear of death.” Thus option C is the correct choice for this question here.

Q: 43. What is the meaning of “the law of life”, as mentioned in the passage?

a) Death
b) Gandhi’s own sacrifice
c) Life after Death
d) Civil disobedience
e) None of these

Answer: b

Explanation: It is clearly mentioned in the passage—“In 1904, exhorting the Indian community in South Africa to strengthen the movement, Gandhi spoke of sacrifice as “the law of life”, running through and governing every walk of life.”

Q: 44. What is the antonym of the word which is mentioned in the passage in (B)?

a) character
b) antithesis
c) ethic
d) imperfection
e) generosity

Answer: d

Explanation: Imperfection is the word with nearly opposite meaning to the word virtue. Virtue means behavior showing high moral standards or righteousness. Antithesis means a person or thing that is the direct opposite of someone or something else. The rest of the options are synonyms of the word virtue.

Q: 45. What is the antonym of the word, which is mentioned in the passage in (C)?

a) ambition
b) cogitation
c) disdain
d) musing
e) reverie

Answer: c

Explanation: Contemplation means the action of looking thoughtfully at something for a long time. Disdain is just the opposite of contemplation. The rest of the options are words which have similar meaning with contemplation. Hence option C is the correct choice here.

Q: 46. What is the synonym of the word which is mentioned in the passage in (D)?

a) patois
b) standard
c) listening
d) eerie
e) ebullient

Answer: a

Explanation: Parlance is a particular way of speaking or using words, especially a way common to those with a particular job or interest. Patois is the word with similar meaning of parlance. Options B and C are antonyms of the
word parlance. Options D, that is, eerie means something that is bizarre or frightening. Option E, that is, ebullient means agitated or effusive.

Q: 47. According to Gandhi what was the proper meaning and significance of Yajna?
   a) To seek the ultimate truth in life
   b) To be ready even to lay down one’s life for true welfare
   c) To live the life of an ascetic
   d) To renounce all material wealth
   e) None of these

Answer: b
Explanation: As given in the sixth paragraph of the given passage according to Gandhi the proper meaning of Yajna is ‘to be ready even to lay down one’s life for true welfare.’ Hence option B is the correct answer choice here.

Q: 48. Find which part contains an error(if any). Mark that option as your answer.
   a) I want to explain
   b) to you the meaning of death as I see it.
   c) Believe that what has happened to me is a good thing and
   d) that those who believe that death is an evil must be mistaken.
   e) No Error

Answer: e
Explanation: The given sentence in the passage does not contain an error. Hence option E is the correct answer choice here.

Q: 49. What was the main aim of the yajna he had in mind in 1948, amid the aftermath of Partition?
   a) In order to prevent the British from destroying the Nation
   b) Its main aim was to divide and rule
   c) The sole aim was to appease the Muslims
   d) It was aimed at nurturing Hindu-Muslim unity
   e) None of these

Answer: d
Explanation: As mentioned in the last paragraph in the passage, the main aim of the yajna Gandhi had in mind in 1948, amid the aftermath of Partition was to nurture Hindu-Muslim unity.
Q: 50. What is the antonym of the word, which is mentioned in the passage in (E)?
   a) anguish
   b) torment
   c) throes
   d) dolor
   e) contentment

Answer: e
Explanation: Agony means ‘extreme physical or mental suffering’. Anguish, throes, dolor and torment are all synonyms of the word agony. Contentment is the word just the opposite meaning of agony. Contentment means a state of happiness and satisfaction.

Rearrange The Following Sections Into A Meaningful Paragraph And Answer The Questions Given Below:

A) There are around 4900 large dams in India and several thousand smaller ones.
B) The safety criteria include increasing the spillway (a design structure to ease water build-up) and preventing ‘over-topping’ in which the dam overflows and causes it to fail.
C) According to a Water Ministry official familiar with the dam safety bill, recent analysis of the state of India’s dams found that half of them did not meet contemporary safety standards.
D) More recently, the Chennai floods of 2015, due to unusually-heavy winter rains, were thought to have been compounded by an unprecedented release of water from the Chembarambakkam dam into the Adyar River.
E) About 300 are in various stages of construction. However, large reservoirs and water storage structures, in the past few decades, are not seen as a model of safety.
F) Kerala, for instance, continues to fight with Tamil Nadu over threats posed by the Mullaperiyar dam on the river Periyar.

Q: 51. Which of the following will be the first sentence after rearrangement?
   I. C
   II. B
   III. A
   IV. E
V. F

Solution: III AEFDCB A, being the introductory sentence, continued by E. F continues by giving instance of kerala. F is continued by D which gives additional knowledge of incidents on dam failures. After such failure there is the analysis report by Water Ministry officials (C) and at last the concluding sentence (B). So the correct formation is AEFDCB.

Q: 52. Which of the following will be the third sentence after rearrangement?

I. C
II. B
III. A
IV. E
V. F

Solution: V AEFDCB A, being the introductory sentence, continued by E. F continues by giving instance of kerala. F is continued by D which gives additional knowledge of incidents on dam failures. After such failure there is the analysis report by Water Ministry officials (C) and at last the concluding sentence (B). So the correct formation is AEFDCB.

Q: 53: Which of the following will be the fourth sentence after rearrangement?

I. A
II. D
III. E
IV. B
V. F

Solution: II AEFDCB A, being the introductory sentence, continued by E. F continues by giving instance of kerala. F is continued by D which gives additional knowledge of incidents on dam failures. After such failure there is the analysis report by Water Ministry officials (C) and at last the concluding sentence (B). So the correct formation is AEFDCB.

Q: 54: Which of the following will be the sixth sentence after rearrangement?

I. A
II. D
III. E
IV. B
V. F

Solution: IV AEFDCB A, being the introductory sentence, continued by E. F continues by giving instance of kerala. F is continued by D which gives additional knowledge of incidents on dam failures. After such failure there is the analysis report by Water Ministry officials (C) and at last the concluding sentence (B). So the correct formation is AEFDCB.

Q: 55: Which of the following will be the second sentence after rearrangement?

I. A
II. D
III. E
IV. B
V. F
Solution: III AEFDCB A, being the introductory sentence, continued by E. F continues by giving instance of Kerala. F is continued by D which gives additional knowledge of incidents on dam failures. After such failure there is the analysis report by Water Ministry officials (C) and at last the concluding sentence (B). So the correct formation is AEFDCB.

Q: 56: Choose the synonym of the word bold in the following sentence.

While in prison the man did nothing but repine for his freedom

I. While in prison the man did nothing but Exception for his freedom
II. While in prison the man did nothing but Fret for his freedom
III. While in prison the man did nothing but Rejoice for his freedom
IV. While in prison the man did nothing but Repented for his freedom
V. While in prison the man did nothing but prayed for his freedom

Answer- (2)

Fret is the synonym for repine.

Repine means to feel or express discontent. All the other options are completely different from the word. Rejoice is the antonym for Repine.

Q: 57: Choose the antonym of the word bold in the following sentence.

His response was immediate and emphatic.

I. His response was immediate and affirm.
II. His response was immediate and equivocal.
III. His response was immediate and idle.
IV. His response was immediate and unsure.
V. His response was immediate and vague.

Answer- (4)

Unsure is most opposite in meaning to Emphatic.

Emphatic means expressing something forcibly and clearly. All the other options are the synonyms for Emphatic.

Q: 58: Choose the synonym of the word bold in the following sentence.

The adequacy of the security arrangements has been questioned.

I. The Insufficiency of the security arrangements has been questioned.
II. The Competence of the security arrangements has been questioned.
III. The Prejudice of the security arrangements has been questioned.
IV. The Power of the security arrangements has been questioned.
V. The exactness of the security arrangements has been questioned.

Answer- (2)

Competence is most similar in meaning to the word Adequacy.

Adequacy means to be adequate. Insufficiency is the antonym for Adequacy.

Q: 59: Choose the synonym of the word bold in the following sentence.

The state will soon extradite Cal to the island nation where he is wanted for assaulting a young girl.
I. The state will soon **hold** Cal to the island nation where he is wanted for assaulting a young girl.

II. The state will soon **oppose** Cal to the island nation where he is wanted for assaulting a young girl.

III. The state will soon **acknowledge** Cal to the island nation where he is wanted for assaulting a young girl.

IV. The state will soon **derive** Cal to the island nation where he is wanted for assaulting a young girl.

V. The state will soon **expel** Cal to the island nation where he is wanted for assaulting a young girl.

**Answer- (5)**

Expel is most similar to meaning to the word Extradite.

Extradite means to hand over (a person accused or convicted of a crime) to the jurisdiction of the foreign state in which the crime was committed. Hold is the antonym for Extradite.

Q: **60:** Choose the antonym of the word **bold** in the following sentence.

You can never **unravel** the complexity of Cancer's emotional makeup.

I. You can never **crack** the complexity of Cancer's emotional makeup.

II. You can never **resolve** the complexity of Cancer's emotional makeup.

III. You can never **tangle** the complexity of Cancer's emotional makeup.

IV. You can never **decipher** the complexity of Cancer's emotional makeup.

V. You can never **settle** the complexity of Cancer's emotional makeup.

**Answer- (3)**

- Tangle is most opposite in meaning to the word Unravel.
- Unravel means to investigate and solve or explain something. All the other options are the synonyms of Unravel.

**In the given sentences some words are bold which are correct except that you need to find out which part of the sentence is contextually and grammatically wrong:**

Q: **61:** Talking on other projects of Indo-Russia cooperation, Chemezov said apart from the Ka-226, the two sides have an enterprise that has been working for a long time producing cruise missiles Brahmos.

I. Talking on other projects of Indo-Russia cooperation,

II. apart from the Ka-226, the two sides have an

III. enterprise that has been working for

IV. producing cruise missiles Brahmos.

V. No error

**Solution: a)** talking about is a correct usage.

Q: **62:** Federer had had surgery for the first time in his career in his left knee in February and after the Wimbledon setback, he did not **finish the season**, missing the US Open and the Rio Olympics.

I. Federer had had surgery for the first time

II. in his left knee in February and after

III. the Wimbledon setback he did not

IV. missing the US Open and the Rio Olympics.

V. No error

**Solution: b)** on his left knee will be used.
Q: 63: Many people thought Roger Federer’s Grand Slam-winning days were behind him, but he defied his age and conventional logic to seal his 18th major title in the Australian Open on Sunday.

I. Many people thought Roger Federer’s Grand Slam
II. were behind him, but he defied his age
III. and conventional logic to seal
IV. in the Australian Open on Sunday.
V. No error.

Solution: d) at will be used instead of in. At is used if specific position or specific point of time is given.

Q: 64: Airports Authority of India (AAI) will raise its capital expenditure by 25% in the fiscal year starting 1 April to expand existing airports and builds hangars for hundreds of planes that airlines are ordering.

I. Airports Authority of India (AAI) will raise its
II. by 25% in the fiscal year starting 1 April to expand
III. and builds hangars for hundreds of
IV. of planes that airlines are ordering.
V. No error

Solution: e) no error

Q: 65: Machines of the size of a portable room cooler has been installed outside washrooms of Kolkata airport to allow passengers to report the cleanliness of washrooms by pressing one of the two buttons.

I. Machines of the size of a portable
II. has been installed outside washrooms of Kolkata airport
III. to report the cleanliness of washrooms by
IV. pressing one of the two buttons.
V. No error

Solution: b) have been installed will be used instead of has been installed.
A section of an article is given. Here some words are missing. You need to comprehend the paragraphs and find out the suitable word, from the provided options, which fulfill the blank grammatically and contextually correct.

Sales of George Orwell's ____________ (66) novel Nineteen Eighty-Four have spiked twice recently, both times in response to political events. In early 2017, the idea of ‘alternative facts’ called to mind Winston Smith, the book’s protagonist and, as a clerk in the Ministry of Truth, a professional alternator of facts. And in 2013, the US National Security Agency whistleblower Edward Snowden ____________ (67) widespread government surveillance explicitly to what Orwell had imagined: ‘The types of collection in the book – microphones and video cameras, TVs that _________ (68) us – are nothing compared to what we have available today.’

Snowden was right. Re-reading Nineteen Eighty-Four in 2018, one is struck by the ‘TVs that watch us’, which Orwell called telescreens. The telescreen is one of the first objects we ____________ (69): ‘The instrument (the telescreen, it was called) could be dimmed, but there was no way of ____________ (70) completely.’ It is omnipresent, in every private room and public space, right up until the end of the book, when it is ‘still pouring forth its tale of prisoners and booty and slaughter’ even after Smith has resigned himself to its rule.

Q: 66:
I- Dystopian
II- Fictional
III- Fabricated
IV- Mythical
V- None of the above

Solution: I as the Orwell speculates on how the future might turn out by emphasizing the ways a present situation could turn ugly so dystopian is the best word to describe the novel.

Q: 67:
I- Analyzed
II- Distinguishing
III- scrutinizes
IV- Compared
V- None of the above

Solution: IV it is talking about the past event so II and II will be eliminated. Compared is the best choice. Hence IV is the right choice.

Q: 68:
I- See
II- Discern
III- Watch
IV- Perceive
V- None of the above

Solution: III discern is to recognize and find out. Perceive is to become conscious or aware of anything. Here only watch fulfil the blank correctly so it is the only choice.

Q: 69:
I- Experience
II- Confront
III- Encounter
IV- None of the above
V- Both II and III

Solution: V both confront and encounter means face something and both can fulfil the blank coherently correct.

Q: 70:

I- Starting it
II- Shutting it off
III- Convene
IV- both II and III
V- none of the above

Solution: II it is said in the former part of sentence telescreen can be dimmed so starting it will not be the correct choice. It can be dimmed but it cannot be stopped.

In question given below there are two statements, each statement consists of two blanks. You have to choose the option which provides the correct set of words that fits both the blanks in both the statements appropriately and in the same order making them meaningful and grammatically correct.

Q: 71.
(1) With a firm_______, the government should be able to focus more on the strategy to further ________ growth and demand
(2) They can't accept the attack on their electoral ________ which has the chances to negatively_______ their voters.
(a) edict, deter
(b) mandate, stimulate
(c) directives, appease
(d) denial, prompt
(e) authority, dissuade

Ans. Option(b)
Sol. Edict - an official order or proclamation issued by a person in authority. Deter - discourage (someone) from doing something by instilling doubt
Mandate - an official order or commission to do something. Stimulate - raise levels of physiological or nervous activity in (the body or any biological system).
Directives: Instruction (an official or authoritative instruction). Appease: satisfy, fulfil (assuage or satisfy (a demand or a feeling).
Denial: contradiction (the act of denying something). Prompt: Quick (done without delay; immediate).
Authority: Power Command, Dissuade: Prevent, turn aside
Hence, option(B) fits in the given context.

Q: 72.
(1) It is a great misfortune that an internal ________ has moved ________ towards a full-blown crisis.
(2) While ________ still exists between the status of men and women in the world, the tide of history is flowing ________ in favour of women.
(a) controversy, wrongly
(b) unity, adamantly
(c) cleft, impeccably
(d) concordance, doggedly
(e) rift, inexorably
Ans. Option(e)
Sol. controversy: Dispute, wrongly: Incorrectly
Unity: union, adamantly: inflexible
cleft: split, impeccably: Flawless
Concordance: Agreement, consistency, doggedly: Intently
rift: Fault, crack inexorably: Sure, Unavoidable
according to the sentence we need a negative word for the first blank and a strong word for second blank to support it, thus, the right option is (e).

Q: 73.
(1) He appeared to be the ______ as everyone in the party was _______ about him.
(2) Being the______ of the meeting, he was busy _______ about the new project laid by his company.
(a) cynosure, talking
(b) nonentity, discussing
(c) hotshot, skeptical
(d) linchpin, aporetic
(e) boss, incredulous

Ans. Option(a)
Sol. Cynosure-the centre of attention or admiration talking: engaging in speech, nonentity: A person of no importance, discussing: Talk about
hotshot: Master, genius sceptical: doubtful
linchpin: A person or things vital to an organization, aporetic: expressing doubt
boss: Head or Chief incredulous: unbelieving
we need positive word for both the blank, hence option(a) suits the sentence.

Q: 74.
(1) As the sun rose higher in the sky, the temperature_______ into hundreds and Martha felt her energy begin to _______.
(2) The _______ prices of the onion in the last month its consumption.
(a) increased, improve
(b) drifted, lessen
(c) ascended, enhance
(d) soared, dwindle
(e) towered, increase

Ans. Option(d)
Sol. increased: built improve: update or change
drifted: Floated, lessen: Decrease
ascended: Rose, Sprouted, enhance: Become, flatter
soared: fly or rise high in the air, sailed, glid, dwindle: decrease, lessen
towered: Overlooked, increase: Further, Build
option(d) fits in the sentence.

Q: 75.
(1) The Soldier refused to accept a _____ for his bravery because he felt he was _______ performing his duty.
(2) The Inexperienced Singer was surprised to receive a ____________ for __________ singing in the chorus.
(a) Compliment, ambiguously
(b) reward, effortlessly
(c) plaudit, Simply
(d) Bestowal, Normally
(e) citation, callously
Ans. Option(c)
Sol. Compliment: Praise, Honour, ambiguously: open to argument
reward: Pay, compensation, effortlessly: easy, uncomplicated
plaudit: an expression of praise or approval, Simply: only, just
Bestowal: Conferring something especially an honor Normally: Unusually
Citation: Quote, reference callously: Unfeelingly
In both the sentences, we need a affirmative word to satisfy the situation, thus, option(c) is the right choice.

In the following question, a section of an article is given with a blank. You need to comprehend the paragraph and find out the correct option which can be placed in blank and mark your answer accordingly

Q: 76: The decision by the Ministry of Corporate Affairs to crack down on so-called ‘shell companies’, disqualify select directors in these entities and debar them from taking board positions for a specified period of time cannot be faulted. This would begin the clean-up of the Augean stables of firms set up in many cases with less than bona fide intent and having virtually no business operations. However, the Union government’s move to publicise the identities of some of these individuals with a view to ‘naming and shaming’ them is fraught with risk; the devil, as always, is in the detail.

This was in evidence when the Securities Appellate Tribunal recently gave relief to some entities over trading curbs hastily imposed on them by SEBI. Also, given the sheer scale of the task at hand, with the ministry identifying more than 1.06 lakh directors for disqualification, it is imperative that there be great care and diligence to ensure that the authorities do not penalise anyone who for non-mala fide reasons failed to comply with the relevant provisions of the Companies Act.

a) While the underlying motive for this action, as cited by the ministry, of “breaking the network of shell companies” in the government’s fight against black money is laudable, there is a real danger of inadvertently tainting genuine firms and individuals.

b) At a broader level, the Centre and the regulatory arms need to address the underlying systemic shortcomings that have allowed so many companies, both listed and unlisted, to become vehicles of malfeasance.
c) The government has already shown it is prepared to act in terms of enacting the necessary legislation to address banking sector stress by adopting the Insolvency and Bankruptcy Code.

d) Both I and II

e) None of the above

Solution: I) as the paragraph is talking about cracking down of the shell companies and the sentence before the blank tells the action plan against these companies and the former sentence is telling about the relief given to some bona fide companies which were imposed by SEBI. Only in I it is talking about both the action plan and told about the danger for genuine firms. So I) is the correct choice.

Q: 77: Iraqi Kurdistan’s decision to go ahead with a proposed independence referendum, despite strong opposition both from within and outside Iraq, has created a regional political storm in West Asia. The Iraqi Supreme Court has already asked the Kurdistan Regional Government to suspend the vote, scheduled for September 25, till its legality is settled. Iraqi Prime Minister Haider al-Abadi has threatened to use force if the referendum turns violent. The Turkish government has ordered a military drill on the Iraqi border, while Iran has also issued a warning. Such opposition is largely driven by fears that a ‘yes’ vote in the referendum, which is almost certain, would enhance the nationalist aspirations of Kurds living in other countries and further destabilise the region. (__________________________) In Turkey, Kurdish rebels are involved in a protracted civil war, while in Syria they have established a regional government. They are all keenly awaiting the outcome of the Iraqi vote.

a) Now that the IS threat has been largely contained, both sides can refocus their energies on settling the dispute between themselves.

b) With the push for referendum, Kurds are trying to change the status quo

c) Besides Iraq, Kurds, the fourth largest ethnic group in West Asia but without a state, are scattered in various countries, including Turkey, Iran and Syria.

d) Kurds had been brutally repressed until the regional government was formed following the first Gulf War of 1991.

e) Though independence remains the proclaimed goal of Iraqi Kurdistan, Mr. Barzani himself has often signalled compromise.

Solution: III In the whole paragraph it was not talked about IS which makes I wrong. II and IV does not fit in the blank logically. V is talking about the goal which is again not mentioned in the given paragraph. Which makes option III the only right choice.

Q: 78: (__________________________) citing a slowdown in consumption and manufacturing due to demonetisation and an ongoing decline in private investment and credit constraints due to impaired bank balance sheets. The World Bank’s Global Economic Prospects January 2017 report added that the Indian economy is subsequently set to recover its growth momentum, with growth rising to 7.6 per cent in FY18 and further strengthening to 7.8 per cent in FY20. “Unexpected ‘demonetization’ — the phasing out of large-denomination currency notes which were subsequently replaced with new ones — weighed on growth in the third quarter of FY2017,” the report added. “Weak industrial production and manufacturing and services purchasing managers’ indexes (PMI), further suggest a setback to activity in the fourth quarter of FY2017.”

a) The World Bank has remained stagnant its growth forecast for India to 7 per cent in 2016-17,

b) The World Bank has lowered its growth forecast for India to 7 per cent from 7.6 per cent in 2016-17,

c) The World Bank has increased its growth forecast for India to 7.8 per cent from 7 per cent in 2016-17,

d) A retrenchment of private investment, reflecting excess capacity, corporate deleveraging, and credit constraints due to impaired commercial banks’ balance sheets, also had an adverse effect on activity,

e) None of the above
Solution: II As it is citing a slowdown in economy, so the forecast can neither be increased nor be remained stagnant. It has to decrease which makes option II correct choice. IV is talking out of context so it cannot be fit.

Q: 79: GIFT has been set up by the Gujarat government as India’s first International Financial Services Centre (IFSC) that brings together world class infrastructure, connectivity, people and technology on a single platform for businesses across the world. IFSC at GIFT City is probably the first such centre to be launched after the 2008 global financial crisis. In some ways, the light-touch regulatory philosophy epitomised by IFSCs came to be questioned in the aftermath of the crisis. (______________________________________________________)

a) For us, in India, good policy housekeeping should be the cornerstone. It is easy and quick to fritter away gains regarding macroeconomic stability.

b) Investment in public transport, specifically railways and Urban MRTS can lead to reduced costs and productivity gains as also help us to lower our oil import bill, and, as collateral benefit, improve air quality in our cities.

c) The mandates for these have to be narrow, and thus perforce be deployed judiciously, within a regulatory framework, which RBI has suggested.

d) However, GIFT City has the advantage of drawing the right lessons in this regard to avoid pitfalls.

e) None of the above

Solution: IV Except IV all the others are out of context which makes IV the only option correct.

Q: 80: ICRA has downgraded Tata Teleservices (Maharashtra) Ltd.’s credit rating, citing weak operational and financial performance. The rating agency further said that it was also “monitoring” the ongoing tussle at the group level after the sudden sacking of Cyrus Mistry as group chairman. (________________________________________________________) ICRA has downgraded the long-term rating to A- from A for the Rs.359 crore term loans, Rs.465 crore long-term fund based/non-fund based limits and Rs.188 crore unallocated limits of the company. The outlook on the long-term rating has been reaffirmed at negative. The rating action factors in the continuing weak operational and financial performance of the company marked by year on year decline in revenues over the last three quarters, consistent pressures on profitability and strained debt coverage indicators.

a) Incidentally, the downgrade by ICRA comes just a day after leading rating agency Crisil downgraded the bank loan facilities of the company to ‘CRISIL A-/Negative/CRISIL A2+’ from ‘CRISIL A/Negative/CRISIL A1’.

b) The Q2 performance was further impacted by higher amortisation expense and finance cost owing to capitalisation of spectrum acquired in the March 2015 auctions

c) It has taken note of the recent announcement regarding the replacement of the chairman at Tata Sons.

d) Both I and II

e) None of the above

Solution: I As the sentences before blank are telling that ICRA has downgraded the ratings of Tata Teleservices and after the blank it is telling how much. And in option I, it is saying Crisil has also downgraded its rating just before the day ICRA announced which is correctly carrying the preceded sentence forward.

REASONING ABILITY

Directions : Study the following information carefully and answer the questions given below:
N, P, R, S, T, V, W and Z are eight people who live on eight different floors of a building but not necessarily in the same order. The lowermost floor is numbered one, the one above it is numbered two and so on till the topmost floor is numbered eight. They work in eight different banks viz, UCO Bank, SBI, ICICI Bank, PNB, Union Bank, Indian Bank, Dena Bank and Andhra Bank but not necessarily in the same order. They work at three different posts such that at
least two persons work on the same post but not more than three persons. These posts are PO, Clerk and Manager but not necessarily in the same order.

- The one who works at PNB lives on an even-numbered floor
- Only three people live between the one who works at PNB and R. Those who are clerks live at odd-numbered floor but not at the ground floor.
- Only one person lives between the persons who work at Dena Bank and at Andhra Bank. There is a Clerk between Dena Bank's employees and Andhra Bank employee. Andhra Bank's employees lives at second floor.
- Only two people live between R and S. S does not live on the lowersmost floor. One manager lives on the topmost floor. There is an equal gap of floors between two pairs of floors at which the managers live. The gap is of two floors
- Only three people live between S and the one who works at Union Bank and only two people live between N and the one who works at Dena Bank.
- T lives immediately above N. T lives on an even-numbered floor. N does not work at Union Bank. N does not live either at floor number 3 or 5
- P lives immediately above W. Only one person lives between W and one who works at ICICI Bank. The one who works at Indian Bank lives immediately above the one who works at UCO Bank.
- V does not work at PNB and N does not work at SBI. V does live on ground floor and the one who work at SBI live immediately below Dena Bank.

Q: 81: Which of the following pairs represent those who live immediately above and immediately below P?

I. W, S
II. Z, W
III. S, W
IV. R, Z
V. W, Z

Q: 82: In which of the following banks does N work?

I. ICICI Bank
II. PNB
III. Indian Bank
IV. UCO Bank
V. SBI

Q: 83: Who among the following works at Union Bank?

I. V
II. P
III. Z
IV. N
V. T

Q: 84: Which among the following is group of POs?

I. Z, P, R
II. N, W, V
III. P, Z, T
IV. T, V, Z
V. P, V, Z
Q: 85: Which of the following is matched correctly?

I. W - 3rd floor - Union Bank – PO  
II. R - 2nd floor - Andhara Bank – Manager  
III. S - 5th floor - UCO Bank – Clerk  
IV. V - 7th floor - Union Bank – Manager  
V. All are true  

Q: 86: P lives on which of the following floors?

I. 1st floor  
II. 3rd floor  
III. 2nd floor  
IV. 4th floor  
V. Other than the given options  

Q: 87: How many persons are there between the floors on which Z and R lives?

I. Three  
II. Four  
III. Two  
IV. One  
V. None of these  

Solution:

<table>
<thead>
<tr>
<th>People</th>
<th>Floors</th>
<th>Banks</th>
<th>Post</th>
</tr>
</thead>
<tbody>
<tr>
<td>T</td>
<td>8</td>
<td>Indian Bank</td>
<td>Manager</td>
</tr>
<tr>
<td>N</td>
<td>7</td>
<td>UCO Bank</td>
<td>Clerk</td>
</tr>
<tr>
<td>Z</td>
<td>6</td>
<td>PNB</td>
<td></td>
</tr>
<tr>
<td>S</td>
<td>5</td>
<td>ICICI Bank</td>
<td>Manager</td>
</tr>
<tr>
<td>P</td>
<td>4</td>
<td>Dena Bank</td>
<td>P.O</td>
</tr>
<tr>
<td>W</td>
<td>3</td>
<td>SBI</td>
<td>Clerk</td>
</tr>
</tbody>
</table>
DIRECTIONS: STUDY THE GIVEN INFORMATION CAREFULLY AND ANSWER THE GIVEN QUESTIONS.

Eight people are sitting in two parallel rows containing four people in such a way that there is an equal distance between adjacent persons. In row-1, M, N, O and P are seated and all of them are facing North and in row-2 W, X, Y and Z are seated and all are facing South (but not necessarily in the same order.) Thus, in the given arrangement each person seated in a row faces another person of the other row. O sits second to the right of one who sits at an extreme ends of the line. O faces an immediate neighbour of W. X sits to the immediate right of W. The one who faces X sits at one of the positions to the left of P. P does not face W. M sits to the immediate left of the one who faces Z.

Q: 88: Which of the following represents the immediate neighbours of the one who faces Z?
   I. Only O
   II. N and M
   III. Only N
   IV. Only M
   V. M and P

Q: 89: Which of the following represents the people sitting to the immediate right of O and immediate right of Z respectively?
   I. P, W
   II. N, W
   III. N, Y
   IV. P, X
   V. M, W

Q: 90: Who sits to the immediate right of the one who faces an immediate neighbour of W?
   I. Only P
   II. P and N
   III. Only M
   IV. Only O
   V. M and P

Q: 91: Which of the following represents the correct position of N?
   I. Immediate left of the one who faces Y
   II. Second to the right of O
   III. Immediate left of P
   IV. Second to the left of the one who faces Z
   V. None of the given options

Q: 92: Who amongst the following faces P?
   I. Either Z or W
   II. X
   III. Z
   IV. Y
   V. W
Solution: According to the given information, the sitting arrangement is as follows:

According to the given information, the sitting arrangement is as follows:

88. (e) 'O' faces Z and immediate neighbours of 'O' are M and P.
89. (a) People sitting immediate right of 'O' is P and immediate right of Z is W.
90. (e) Immediate neighbours of W are X and Z and N faces X and Z. M sits at immediate right of N and P sits at immediate right of O.
91. (d) 'O' faces Z and second to the left of 'O' is 'N'.
92. (d) Y faces P.

Directions: Study the following information to answer the given questions:

In a certain code
'for profit order now' is written as 'ho ja ye ga',
'right now for him' is written as 'ga ve ja se',
'place order for profit' is written as 'ga bi ho ye'
and 'only in right order' is written as ve du ye zo'.

Q: 93: What is the code for 'him'?
   I. ga
   II. ve
   III. ja
   IV. se
   V. Cannot be determined

Q: 94: What does 'bi' stand for?
   I. profit
   II. order
   III. place
   IV. for
   V. now

Q: 95: ‘fo ve du’ could be a code for which of the following?
   I. in right spirits
   II. only in profit
   III. order only him
   IV. place in right
   V. order only now

Q: 96: What is the code for 'profit?'
   I. ye
   II. ga
   III. bi
   IV. ja
   V. ho
Q: 97: Which of the following may represent 'only for now'?
   I. ja bi zo
   II. du zo ga
   III. zo ga ja
   IV. zo ga ye
   V. du bi ja

Q: 98: What is the code for 'order'?
   I. ye
   II. ga
   III. bi
   IV. ja
   V. ho

93. The code for 'him' is 'se'.
94. 'bi' stands for 'place'.
95. ve = right; du = only/in; fo' may for 'spirits'.
96. The code for 'profit' is 'ho'.
97. Only = du/zo; for = ga; now = ja.
98. The code for 'order' is 'ye'.

Directions: In the following questions, select the set of conclusion which logically follows from the given statements.

Q: 99: Statements
   I: All foxes are plates.
   II: All plates are trees.

Conclusions
   I: All foxes are trees.
   II: All trees are foxes.
   III: Some trees are foxes.
   IV: Some trees are plates.

(a) All conclusions are correct.
(b) Only conclusions I, III, and IV follow.
(c) Only conclusions II, III, and IV follow.
(d) Only conclusions I and IV follow.
(e) None of the above.
Solution: (b) When all foxes are plates and all plates are trees, then naturally all foxes will be trees and some trees will then have to be foxes. And when all plates are trees then some trees will have to be plates. Therefore, only conclusions I, III and IV are correct.

Q: 100: Statements
I: Some cubes are squares.
II: All squares are circles.

Conclusions
I: All cubes are circles.
II: Some circles are cubes.
III: Some circles are squares.
IV: All squares are cubes.

(a) Only conclusion I follows.
(b) Only conclusion I, II and III follow.
(c) All conclusions are correct.
(d) Only conclusions II and III follow.
(e) None of the above.
Solution: (d) When it is given that some cubes are squares and all squares are circles, then some cubes will naturally be circles, though all cubes cannot be circles. When some cubes are circles, then some circles will have to be cubes. And when all squares are circles, then circles will have to be squares. As per given statement II, all squares are circles. Therefore all squares cannot be cubes. As such only conclusions II and III are correct.

Directions: Study the following information carefully and answer the questions given below. A word and number arrangement machine when given an input line of words and numbers rearranges them following a particular rule in each step. The following is an illustration of input and rearrangement (All the numbers are two digit numbers).

Input:  gate 20 86 just not 71 for 67 38 bake sun 55
Step I: bake gate 20 just not 71 for 67 38 sun 55 86
Step II: for bake 20 just no 67 38 sun 55 86 71
Step III: gate for bake 20 just not 38 sun 55 86 71 67
Step IV: just gate for bake 20 not 38 sun 86 71 67 55
Step V: not just gate for bake 20 sun 86 71 67 55 38
Step VI: sun not just gate for bake 86 71 67 55 38 20
Step VI is the last step of the above input. As per the rules followed in the above steps, find out in each of the following questions the appropriate step for the given input.

Input:  31 rise gem 15 92 47 aim big 25 does 56 not 85 63 with moon

Q: 101: How many steps will be required to complete the rearrangement?
(a) Eight
(b) Six
(c) Seven
(d) Five
(e) Nine

Q: 102: Which word/number would be at seventh position from the left of step IV?
(a) rise
(b) aim
(c) big
(d) 15
(e) does

Q: 103: Which step number is the following output?
Rise not moon gem does big aim 15 with 92 85 63 56 47 31 25
(a) Step V
(b) Step VII
(c) Step IV
(d) Step VIII
(e) Step III

Q: 104: Which of the following represents the position of 92 in step VI
(a) Ninth from the left
(b) Fifth from the right
(c) Sixth from the right
(d) Ninth from the right
(e) Seventh from the left

Q: 105: Which word/number would be at fifth position from the right in the last step?
(a) Gem
(b) 63
(c) 56
(d) 85
(e) Other than those given as options

Solutions: According to the given information, we have the following arrangement

Input: 31 rise gem 15 92 47 aim big 25 does 56 not 85 63 with moon
Step I: aim 31 rise gem 15 47 big 25 does 56 not 85 63 with moon 92
Step II: big aim 31 rise gem 15 47 25 does 56 not 63 with moon 92 85
Step III: does big aim 31 rise gem 15 47 25 56 not with moon 92 85 63
Step IV: gem does big aim 31 rise 15 47 25 not with moon 92 85 63 56
Step V: moon gem does big aim 31 rise 15 25 not with 92 85 63 56 47
Step VI: not moon gem does big aim rise 15 25 with 92 85 63 56 47 31
Step VII: rise not moon gem does big aim 15 with 92 85 63 56 47 31 25
Step VIII: with rise not moon gem does big aim 92 85 63 56 47 31 25 15

101. (a) Eight steps are required to complete rearrangement
102. (d) '15' is at seventh position from the left end in the step IV
103. (b) The given output is the step VII
104. (c) '92' is at sixth position from the right end in step VI
105. (c) '56' is at fifth position from the right in the last

Directions: In each question below is given a statement followed by three assumptions number I, II and III. An assumption is something supposed or taken for granted. You have to consider the statement along with the assumptions and decide which of the assumptions is implicit in the statement. Then decide which of the alternatives is the correct answer.

Q: 106: Statement:
"Use Riya Cold Cream for fair complexion" - an advertisement.
Assumptions:
I. People like to use cream for fair complexion.
II. People are easily fooled.
III. People respond to advertisements.

(a) Only I is implicit.
(b) Only II is implicit.
(c) Only I and III are implicit.
(d) Only I and II are implicit.
(e) All are implicit.

Solution: (c) The advertisement itself denotes that people like to use cream for fair complexion and they do respond to advertisements. Advertisements are for awareness of the product not for fooling people.

Q: 107: Statement:

“Slogans against smoking in office should be put on the notice board”-an employee in an office suggests.

Assumptions:
I. The employee felt that his suggestion will be considered.
II. People smoke in the office.
III. Some people will stop smoking after reading the slogans.

(a) Only I is implicit.
(b) Only I and II are implicit.
(c) Only II and III are implicit.
(d) None is implicit.
(e) All are implicit.

Solution: (e) Suggestion for putting up the notice is made because some people must be smoking in office. Notice board is read by people in office and some may stop smoking after reading the slogans.

Directions: Each of the questions below consists of a question and two statements numbered I and II given below it. You have to decide whether the data provided in the statements are sufficient to answer the questions. Read both the statements and give your answer.

(A) if the data in Statement I alone are sufficient to answer the question, while the data in Statement II alone are not sufficient to answer the question.
(B) if the data in Statement II alone are sufficient to answer the question, while the data in Statement I alone are not sufficient to answer the question.
(C) if the data either in Statement I alone or in Statement II alone are sufficient to answer the question.
(D) if the data given in both Statements I and II together are necessary to answer the question.
(E) If data in both Statements I and II is not sufficient to answer the question.

Q: 108: Which direction is Shashidhar facing?

I. In the early morning Shashidhar was standing with a puppet and the shadow of the puppet was falling to the right of Shashidhar.
II. In the early morning Shashidhar was standing on the ground. His shadow was falling behind him when he turned to his left.

Ans. C

By Statement (I), we know that the shadow of the puppet is formed in the west during morning, the right side of Shashidhar will be West, and thus he is facing South. While Statement (II) suggests that the left side of Shashidhar lies East, so he is facing the South. Hence, Statements (I) or (II) alone is sufficient to answer the question.


I. Each one of them teaches only one subject. B teaches Mathematics, while E teaches Science. A or C does not teach Geography. A or D does not teach English.
II. C and E are teachers of English and Science respectively and A is the teacher of Mathematics.

Ans. A
Data of Statement I may be tabulated as shown below:

<table>
<thead>
<tr>
<th>Name</th>
<th>Subject</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>History</td>
</tr>
<tr>
<td>B</td>
<td>Mathematics</td>
</tr>
<tr>
<td>C</td>
<td>English</td>
</tr>
<tr>
<td>D</td>
<td>Geography</td>
</tr>
<tr>
<td>E</td>
<td>Science</td>
</tr>
</tbody>
</table>

Thus, it is clear that A teaches History. Data of Statement II may be tabulated as shown below.

<table>
<thead>
<tr>
<th>Name</th>
<th>Subject</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>Mathematics</td>
</tr>
<tr>
<td>B</td>
<td></td>
</tr>
<tr>
<td>C</td>
<td>English</td>
</tr>
<tr>
<td>D</td>
<td></td>
</tr>
<tr>
<td>E</td>
<td>Science</td>
</tr>
</tbody>
</table>

It is not possible from here to decide who teaches History. Hence, Statement I above is sufficient to answer the question.

Q: 110: In a row of boys facing South who is at immediate left to Ramakant?

I. Suresh is at immediate right to Chandrakant, who is fourth to the right of Ramakant.
II. Suresh is third to the right of Ramakant and Naresh is second to the right of Suresh.

Ans e
Using statement I:

Suresh | Chandrakant | Ramakant

By using the given information, we cannot determine who is at immediate left to Ramakant.

Using statement II:

Naresh | Suresh | Ramakant
By using the given information, we cannot determine who is at immediate left to Ramakant.

Q: 111: Who has secured the maximum marks among six friends A, B, C, D, E and F?

I. B secured less marks than A and F but not less than C, D and E
II. F secured more marks than B but not as much as A.

Ans. D

Let ‘>’ denote ‘secured more marks’. By Statement (I), A,F>B>C,D,E; and by statement (II), we have A>F>B; therefore, from (i) and (ii) A>F>B>C,D,E. Hence, both the statements are together sufficient to answer the question.

Q: 112: What will be the position of hour hand of a clock at 7:30 pm?

I. There are English alphabets on the dial of the clock instead of digits.
II. The hour hand is at P at 7 O'clock.

Ans. E

From both the statements, it follows that hour hand will be after P at 7:30 pm.

Directions: Daya, Kamini and Shilpa are standing at the corners of an equilateral triangle piece of plot as shown below in Fig.

Q: 113: Daya, Kamini and Shilpa run along the sides in clockwise direction from the original position and stop after covering (One and a half) $1\frac{1}{2}$ of sides.

Which one of the following statements is true?
(a) Kamini is to the North-west of Daya
(b) Daya is to the South-west of Shilpa
(c) Daya is to the South-east of Kamini
(d) Daya is to the South-west of Kamini
(e) Daya is to the West of Shilpa

Solution: (d) From the given fig., it is clear that Daya is to the South-west of Kamini.
Q: 114: From the positions mentioned in Question, if all of them run in the anticlock wise direction covering two side and then stop. Which one of the following statement is true?
(a) Daya is to the South of Shilpa
(b) Kamini is to the South-west of Shilpa
(c) Daya is to the south of Kamini
(d) Daya is to the East of Shilpa
(e) Daya is to the South-east of Shilpa

Solution: (b) From the given Fig., it is clear that Kamini is to the South-west of Shilpa.

Q: 115: In a row of 40 girls, when Kamal was shifted to her left by 4 places her number from the left end of the row became 10. What was the number of Sujata from the right end of the row if Sujata was three places to the right of Kamal's original position?
(a) 22
(b) 26
(c) 25
(d) 23
(e) None of these

Answer: (d) Kamal when shifted to her left by 4 places she becomes 10th from the left. It means she was 15th from the left originally. 3 places to the right of kamal’s original position means 18th from the left.
Number of Sujata from the right end = 40 -18 + 1 = 23

In these questions, relationship between different elements is shown in the statement. The statements are followed by two conclusions. Choose the correct answer given below: Give answer

1) If only conclusion I is true.
2) If only conclusion II is true.
3) If either conclusion I or II is true.
4) If neither conclusion I nor II is true.
5) If both conclusions I and II are true.

Q: 116: Statements:
P < R < T = V, X = R < Y, Z > Y
Conclusions:
I. P > Y
II. Z > V
Ans: 4
Solution:
Given statements: P < R < T = V, X = R < Y, Z > Y
I. P > Y → False (As P < R < Y)
II. Z > V → False (As there is no direct relation between Z and V)
Hence, neither I nor II follow.

Q: 117: Statements:
U ≥ V < W; X = V; U < Y; Z < X < Y
Conclusions:
I. X > W
II. U < Y
Ans: 4
Solution:
Given statements: U ≥ V < W; X = V; U < Y; Z < X < Y
I. X > W → False (As X = V < W → X < W)
II. U < Y → False (as U ≥ V and V = X < Y → thus clear relation between U and Y cannot be determined)
Hence, neither I nor II follow.

Q: 118: Statements:
I ≤ J > K = L; L < M; M = I > N; O < N
Conclusions:
I. K < N
II. J > O
Ans: 2
Solution:
Given statements: I ≤ J > K = L; L < M; M = I > N; O < N
On combining: I ≤ J > K = L < M; M = I > N > O
I. K < N → False (as K = L < M → K < M and M = I > N → N < M → thus clear relation between K and N cannot be determined)
II. J > O → True (as J ≥ I > N > O)
Hence, conclusion II follows.

Q: 119: Statements:
N ≥ O = P, P ≤ Q ≤ R, S = T > Q
Conclusions:
I. S < N
II. R > N
Ans: 4
Solution:
Given statements: N ≥ O = P, P ≤ Q ≤ R, S = T > Q
   I. S < N → False (as there is no relation between S and N)
   II. R > N → false (as there is no relation between R and N)
Hence, neither I nor II follow.

Q: 120: Statements:
   D ≥ H = L > P, T < X = P > Z
Conclusions:
   I. D > Z
   II. H < X
An: 1
Solution:
Given statements: D ≥ H = L > P, T < X = P > Z
   I. D > Z → True (as D ≥ H = L > P > Z)
   II. H < X → False (as H = L > P = X)
Hence, only conclusion I follows.

QUANTITATIVE APTITUDE

The Bar diagram given below shows the productions in the unit of thousand pieces of three types of biscuits by a company in the five consecutive years. Study the diagram and answer the following questions:
Q: 121. The percentage drop in the number of glucose biscuits manufactured from 1994 to 1995 is
1. 10%
2. 15%
3. 25%
4. 20%
5. None of these

Solution: (3) Required Percentage drop = \(\frac{30 - 22.5}{30} \times 100 = \frac{7.5}{30} \times 100 = 25\%\)

Q: 122: The Difference (in the unit of thousand pieces) between the total number of cream cracker biscuits manufactured in the years 1993, 1995 and 1997 and the total number of biscuits of the same type in the year 1994 and 1996 is:
1. 15
2. 25
3. 30
4. 20
5. None of these

Solution: (2) Required Difference = \([(12.5 + 27.5 + 30) - (25 + 20)]\) thousands = 70 - 45 = 25 thousands

Q: 123: Total production of all the three types of biscuits was the least in the year:
1. 1993
2. 1997
3. 1996
4. 1995
5. None of these

Solution: (1)
Total Production =
Year 1993 => 65 thousands (least)
Year 1994 => 75 thousands
Year 1995 => 85 thousands (Maximum)
Year 1996 => 75 thousands
Year 1997 => 80 thousands

Q: 124: The production of all the three types of biscuits was maximum in:
1. 1995
2. 1994
3. 1996
4. 1993
5. None of these

Solution: (1) It is clear from the graph.

Q: 125: The Ratio of production of glucose biscuits in that year was maximum in:
1. 1994
2. 1993
3. 1996
4. 1997
5. None of these

Solution: (2)

Required Ratio
- Year 1993 = $\frac{30}{65} = \frac{6}{13}$ (Maximum)
- Year 1994 = $\frac{30}{75}$
- Year 1996 = $\frac{25}{75}$
- Year 1997 = $\frac{22.5}{75}$

Directions :- Study the information carefully to answer the following questions.

In a school, there are 700 students. All of them are divided into five different groups viz . Group A, Group B, Group C, Group D and Group E. The number of girls is 12 less than the number of boys in school. One fourth of the total number of students in school are in Group C. 16 per cent of the total number of students in school a in group A .Group E have 28 more students than in Group A. The respective ratio between the number of girls and boys in Group A is 1 : 3 .Number of students in Group D is 11 more than the number of students in Group A. There are equal number of boys and girls in Group E. 44 per cent of the number of students in Group B are boys .two thirds of the students in Group D are girls.

Q: 126. What is the respective ratio between the number of students in Group B and the number of students in Group D ?
1) 41 : 50
2) 50 : 43
3) 43 : 50
4) 50 : 41
5) None of these

Q: 127. Total number of girls In Group A and Group D together are how many more/less than the total number of boys in Group B and Group C together?
Q: 128. What is the respective ratio between the number of girls in Group B and the number of boys in Group E?
1) 7:6
2) 6:5
3) 5:6
4) 6:7
5) None of these

Q: 129. Number of boys in Group C is approximately what percentage of the total number of girls in the school?
1) 28%
2) 21%
3) 35%
4) 72%
5) None of these

Q: 130. What is the total number of students in Group A, Group C and Group D together?
1) 409
2) 420
3) 410
4) 459
5) None of these

Solution:

<table>
<thead>
<tr>
<th>Group</th>
<th>Boys (356)</th>
<th>Girls (344)</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>84</td>
<td>28</td>
<td>112</td>
</tr>
<tr>
<td>B</td>
<td>66</td>
<td>84</td>
<td>150</td>
</tr>
<tr>
<td>C</td>
<td>95</td>
<td>80</td>
<td>175</td>
</tr>
<tr>
<td>D</td>
<td>41</td>
<td>82</td>
<td>123</td>
</tr>
<tr>
<td>E</td>
<td>70</td>
<td>70</td>
<td>140</td>
</tr>
</tbody>
</table>

1. 4)
   Required ratio = 150 : 123 = 50 : 41

2. 5)
   Number of girls in A & D together = 28 + 28 = 110
   Number of boys in B & C together = 65 + 95 = 161

3. 2)
   Required ratio = 84 : 70 = 6 : 5

4. 1)
   Required percentage = (95 * 100) / 344 = 27.6 = 28%

5. 3)
   Required number of students = 112 + 175 + 123 = 410

Directions: Study Following table and answer carefully.

<table>
<thead>
<tr>
<th>City Year</th>
<th>J</th>
<th>K</th>
<th>L</th>
<th>M</th>
<th>N</th>
<th>P</th>
</tr>
</thead>
</table>
### Question 131

Total population of city M for all the given years together is what percent of the total population of city P for all the given years together? (rounded off to nearest integer)

1. 32
2. 36
3. 38
4. 29
5. 28

**Solution:**

\[
M = 9 + 12 + 13 + 15 + 17 + 19 = 85 \\
P = 31 + 35 + 36 + 38 + 39 + 44 = 223 \\
Percentage = \frac{(85 \times 100)}{223} = 38.11 = 38\%
\]

### Question 132

What is the respective ratio between total population of cities K, M & N together in 2004 & total population of cities L, J & P together in 2001?

1. 23 : 25
2. 21 : 23
3. 21 : 25
4. 21 : 22
5. 22 : 23

**Solution:**

\[
K, M \text{ & } N \text{ population in 2004} = 22 + 15 + 26 = 63 \\
L, J \text{ & } P \text{ population in 2001} = 23 + 12 + 31 = 66 \\
Ratio = 63 : 66 = 21 : 22
\]
Q: 133. If in 2004 7% of the population of city N was illiterate & 6% of the population of city K was illiterate what is the respective ratio between illiterate populations of cities N & K?

1. 91 : 68
2. 89 : 66
3. 92 : 67
4. 81 : 67
5. 91 : 66

Solution: 5)

N:K = (26*7) : (22*6) = 91: 66

Q: 134. Population of city M in 2002 is approximately what percent of the total population of all the six cities in that year?

1. 11
2. 9
3. 14
4. 7
5. 12

Solution: 2)

In 2002 All 6 cities population = 16+18+28+12+22+35 = 131
City M population = 12
Percentage = (12*100)/131 = 9.16 = 9%

Q: 135. In 2003, in city J, 48% of the population was female population & for city L it was 47%. What was the total male population (in lakhs) of these two cities in 2003?

1. 27.44
2. 23.44
3. 22.47
4. 24.24
5. 24.74

Solution: 5)

Male population in J 2003 = (52*17)/100 = 8.84
Male population in L 2003 = (53*30)/100 = 15.90
Total = 8.84+15.90=24.74 Lakh

Q: 136. In the following question two equations (A) and (B) given. You have to solve both:
I. 45a² - 17a -6 = 0
II. 15b² - 19b + 6 = 0

1. If a < b
2. If a < b
3. If a = b
4. If a > b
5. If a > b

Solution: 1)
Q: 137. In the following question two equations (A) and (B) given. You have to solve both:

I. \[35a^2 - 92a + 33 = 0\]
II. \[7b^2 + 39b - 18 = 0\]

1. If \(a < b\)
2. If \(a > b\)
3. If \(a = b\)
4. If \(a > b\)
5. If \(a < b\)

Solution: 2)

\[35a^2 - 92a + 33 = 0\]
\[35a^2 - (77 + 15) a + 33 = 0\]
\[35a^2 - 77a - 15a + 33 = 0\]
\[7a(5a - 11) - 3(5a - 11) = 0\]
\[(5a - 11)(7a - 3) = 0\]
\[a = \frac{11}{5}\]
\[a_2 = \frac{3}{7}\]

\[7b^2 + 39b - 18 = 0\]
\[7b^2 + (42 - 3) b - 18 = 0\]
\[7b^2 + 42b - 3b - 18 = 0\]
\[7b(b + 6) - 3(b + 6) = 0\]
\[(7b - 3)(b + 6) = 0\]
\[b_1 = \frac{3}{7}\]
\[b_2 = -6\]
Q: 138. In the following question two equations (A) and (B) given. You have to solve both:

i. \[ 2a^2 - 5\sqrt{12}a + 36 = 0 \]

ii. \[ 2b^2 - 11b + 15 = 0 \]

1. If \( a < b \)
2. If \( a > b \)
3. If \( a > b \)
4. If \( a < b \)
5. If \( a = b \)

Solution: 1)

\[ 2a^2 - 5\sqrt{12}a + 36 = 0 \]
\[ 2a^2 - (3\sqrt{12} + 2\sqrt{12})a + 36 = 0 \]
\[ 2a^2 - 3\sqrt{12}a - 2\sqrt{12}a + 36 = 0 \]
\[ a(2a - 3\sqrt{12}) - \sqrt{12}(2a - 3\sqrt{12}) = 0 \]
\[ (a - \sqrt{12})(2a - 3\sqrt{12}) = 0 \]
\[ a = \frac{3\sqrt{12}}{2} \]
\[ a_1 = \frac{3\sqrt{12}}{2} \]
\[ 2b^2 - 11b + 15 = 0 \]
\[ 2b^2 - (6 + 5)b + 15 = 0 \]
\[ 2b^2 - 6b - 5b + 15 = 0 \]
\[ 2b(b - 3) - 5(b - 3) = 0 \]
\[ (b - 3)(2b - 5) = 0 \]
\[ b_1 = \frac{5}{2} \]
\[ b_2 = 3 \]

Q: 139. In the following question two equations (A) and (B) given. You have to solve both:

I. \[ a^2 - 1024 = 0 \]

II. \[ b^4 - 39304 = 0 \]

1. If \( a = b \)
2. If \( a > b \)
3. If \( a > b \)
4. If \( a < b \)
5. If \( a < b \)

Solution: 5)
Q: 140. In the following question two equations (A) and (B) given. You have to solve both:
I. $2a^2 - 17a + 26 = 0$
II. $2b^2 + 19b + 39 = 0$
1. If $a > b$
2. If $a < b$
3. If $a < b$
4. If $a = b$
5. If $a > b$
Solution: 1)
Directions: Each of the questions below consists of a question based on an adjacent figure, and two statements numbered I and II given below it. You have to decide whether the data provided in the statements are sufficient to answer the question. Read both the statements and give your answer.

1. If the data in Statement I alone are sufficient to answer the question, while the data in Statement II alone are not sufficient to answer the question.
2. If the data in Statement II alone are sufficient to answer the question, while the data in Statement I alone are not sufficient to answer the question
3. If the data either in Statement I alone or in Statement II alone are sufficient to answer the question, and
4. If the data in both the Statements I and II together are necessary to answer the question.
5. If data in both Statements I and II is not sufficient to answer the question.

Q: 141. In the given figure, what is the diameter of circle?

\[ \frac{2a^2 - 17a + 26}{2a^2 - 13a - 2} = \frac{2a + 13}{2a - 13} = 0 \]

\[ a = \frac{13}{2} \]

\[ 2b^2 + 19b + 39 = 0 \]

\[ 2b^2 + (13 + 6)b + 39 = 0 \]

\[ b = -3 \]

\[ \frac{b}{2} + 13 + 3(2b + 13) = 0 \]

\[ (2b + 13)(b + 3) = 0 \]

\[ \frac{b}{2} = \frac{-13}{2} \]

I. The area of the largest section of the circle is 33 \( \pi \).

II. The length of the arc on the unshaded portion of the circle is \( \pi \).

Solution: 3)
Unshaded sector is 1/12th of the circle. So, by Statement I, we have the area of the shaded portion, \( \pi r^2 = 33 \pi \). Thus, dividing by 11\( \pi \) and multiplying by 12, we have \( r^2 = -36 \). Hence, \( r = 6 \) and diameter will be 12.
From Statement II, we have the length of the arc. It must be 1/12th of the circumference of the circle. That is, \( \pi = (1/12) (2 \pi r) \). Now, multiplying by 12 and dividing by 2\( \pi \), we have, \( r = 6 \) and the diameter will be 12.
Q: 142. In the given figure, what is the value of (c+d)?

I. b+f = 80°
II. a+b = 110°

Solution: 2)

Using Statement II, we know that the sum of angles in any triangle is 180°. Let the measure of angle ABC be m, using the property of vertical angles, being equal, we have the upper triangle a + b + m = 180° or 110° + m = 180°, or m = 70°. Similarly, looking for ∆ABC, we know that c + d + 70° = 180°, and c + d = 110°. However, Statement I gives us what (b+f) is, but the individual values could be almost anything, and it tells us very little about other angles.

Q: 143. What is the perimeter of BCDE in the given figure?

I. The perimeter of rectangle ABCD is 18.
II. The area of rectangle ABCD is 18.

Solution: 3)

Using Statement II alone, we know that the area of ABCD is 18, and one side is 3. Thus, the other side must be 6, and we conclude that the perimeter is (11 + 10 + 3 + 6) = 30. By Statement I, we know that the rectangle ABCD has a perimeter of 18 with one side 3, the other must be 6. Thus, BC = AD = 6, and ∆ AED is (6 + 8 + 10) a right angle triangle. Now, BE = 11, ED = 10, and DC = 3 and BC = 6. The perimeter is (11 + 10 + 3 + 6) = 30.
Q: 144. What is the radius of the circle with centre O in the given figure?

I. The area of the shaded region is $8\pi$.
II. The circumference of one of the smaller circles is $4\pi$.

Solution: 3)

Using Statement II alone, and the fact that the circumference of a circle is $2\pi r$, with the same notation, $\pi$ we have $2\pi \left(\frac{1}{2}r\right) = 4\pi$. Thus, $r = 4$. Using Statement I alone, denoting the radius of the larger circle $r$, each of the smaller circles has radius $\frac{1}{2}r$. Since, the area of a circle is $\pi r^2 - 2\left(\pi \left(\frac{1}{2}r\right)^2\right) = (\pi r^2 - \frac{1}{2} r^2)$ this must be equal to $8\pi$. Thus, $\frac{1}{2} \pi r^2 = 8\pi$, which means that $r^2 = 16$ and $r = 4$. 
145. In the given figure, is angle ABC a right angle?

I. \( l_1 \) is parallel to \( l_2 \).
II. \( x = 53^\circ \).

Solution: 4)
Since, the corresponding angles formed when two parallel lines are crossed by a transversal are equal, Statement I tells us that angle DCE = 37°, and thus by equality of vertical angles, angle ACB = 37°, but we do not know angle CAB, and we can conclude nothing about ABC. Similarly, from Statement II we know only one angle in \( \Delta ABC \). But by combining statement I and II, we know that the two angles total to 90°. Hence, the remaining angle ABC is also 90°.

Q: 146. Six playing cards are lying face down on a table, where two of them are kings. Two cards are drawn at random. Let \( a \) denote the probability that at least one or the cards drawn is king, and \( b \) denotes the probability of not drawing a king. The ratio \( a/b \) is:

1. \( \geq 0.25 \) and \( < 0.5 \)
2. \( \geq 0.5 \) and \( < 0.75 \)
3. \( \geq 0.75 \) and \( < 1.0 \)
4. \( \geq 1.0 \) and \( < 1.25 \)
5. \( \geq 1.25 \)

Solution: 5)
There are three scenarios.
Either two are kings, only one card is king, none of the two is king.
In all, the number of combinations of taking 2 cards out of 6 = \( 6 \choose 2 \)
\[
\frac{6!}{4!2!} = \frac{6 \times 5 \times 4!}{4! \times 2!} = 15
\]
Split of this is like this:
The number of combinations of the two cards being kings = \( 2 \choose 2 \) = 1
The number of combinations of only one card being a king = \( 2 \choose 1 \) \( 4 \choose 1 \) = 2 \( 4 \) = 8
The number of combinations of neither cards being a king = \( 4 \choose 2 \) = 6
Now, \( a = P(\text{at least one king}) - P(\text{one king}) + P(\text{two king}) \)
\[= (8 + 1) \frac{1}{5} = \frac{3}{5} \]
\( b = P(\text{no king}) = \frac{6}{15} = \frac{2}{5} \)
\[=> \frac{a}{b} = \frac{3}{2} = 1.5 \]

Q: 147. You enter a chess tournament where your probability of winning a game is 0.3 against half the players (call them Type 1), 0.4 against a quarter of the players (call them Type 2) and 0.5 against the remaining quarter of the
players (call them Type 3), You play a game against a randomly chosen opponent. What is the probability of winning the tournament?

1. 0.365
2. 0.452
3. 0.375
4. 0.236
5. None of the above

Solution: 3)

Let $A_i$ be the event of playing with an opponent of type

$P(A_1) = 0.5$, $P(A_2) = 0.25$, $P(A_3) = 0.25$,

Let $B$ be the event of winning

$P\left(\frac{B}{A_1}\right) = 0.3$, $P\left(\frac{B}{A_2}\right) = 0.4$, $P\left(\frac{B}{A_3}\right) = 0.5$,

Thus by total probability theorem, probability of winning is:

$P(B) = 0.5 \times 0.3 + 0.25 \times 0.4 + 0.25 \times 0.5 = 0.375$

Q: 148. Ashish studies late in the night and is hungry. He opens his mother’s snack cupboard without switching on the lights, knowing that his mother has kept 10 packets of chips and biscuits in the cupboard. He pulls out 3 packets from the cupboard and all of them turn out to be chips. What is the probability that the snack cupboard contains 1 packet of biscuits and 9 packets of chips?

1. $\frac{6}{55}$
2. $\frac{12}{73}$
3. $\frac{14}{55}$
4. $\frac{7}{50}$
5. None of the above

Solution: 3)

There are at least three Packets of Chips in the Cup Board.

$\therefore$ Total 10 Packets in all.

$\therefore \{\text{Number of packets of Chips, Number of packets of Biscuits}\} \rightarrow \{3, 7\} or \{4, 6\} or \{5, 5\} or \{6, 4\} or \{7, 3\} or \{8, 2\} or \{9, 1\} or \{10, 0\}$

The number of ways in which three packets of Chips can be drawn

$= 3c_3 + 4c_3 + 5c_3 + 6c_3 + 7c_3 + 8c_3 + 9c_3 + 10c_3$

$= 330$

The number of ways in which three packets of biscuit can be drawn when there are 9 packets of Chips

$= 9c_3 = \frac{9!}{3!(9-3)!} = \frac{9!}{3!6!}$

$= \frac{9 \times 8 \times 7 \times 6!}{3 \times 2 \times 6!} = 84$

$\therefore$ Required Probability $= \frac{84}{330} = \frac{14}{55}$

Q: 149. The answer sheets of 5 engineering students can be checked by any one of 9 professors. What is the probability that all the 5 answer sheets are checked by exactly 2 professors?

1. $\frac{20}{2187}$
2. $\frac{40}{2187}$
3. \(\frac{40}{729}\)
4. \(\frac{20}{729}\)
5. None of the above

Solution: 2)

The paper of each student can go to any of the nine professors.
As there are 5 students, there are \(9 \times 9 \times 9 \times 9 = 9^5\) ways in which the papers can be checked by the professors.

Now, number of ways of selecting two professors = \(\binom{9}{2}\)
The five papers can be checked by the two professors in 23 ways, but this will contain two ways in which the papers are checked by just one professor.

\(\therefore\) The number of ways in which 5 answer sheets are checked by exactly two professors
\(= \binom{9}{2} \times \left(2^5 - 2\right)\)
Number of ways in which each paper can be checked by a professor = 2
Number of ways such that 5 papers can be checked by those two professors = \(\binom{9}{2} \times \left(2^5 - 2\right)\)

Probability = \(\frac{\binom{9}{2} \times \left(2^5 - 2\right)}{9^5}\)
= \(\frac{36 \times (32 - 2)}{59,049}\)
= \(\frac{36 \times 30}{59,049} = \frac{1,080}{59,049} = \frac{40}{2,187}\)

Q: 150. The probability that in a household, LPG will last 60 days or more is 0.8 and that it will last at most 90 days is 0.6. The probability that the LPG will last 60 to 90 days is:

1. 0.40
2. 0.50
3. 0.75
4. 0.80
5. None of the above

Solution: 1)

Probability that LPG will last \(\geq\) 60 days = 0.8
\(\therefore\) Probability that the LPG will last < 60 days = \(1 - 0.8 = 0.2\)
Probability that the LPG will last \(\leq\) 90 days = 0.6
\(\therefore\) The probability that the LPG will last \(\geq\) 60 days and \(\leq\) 90 days will be = (probability that the LPG will last \(\leq\) 90 days) - (probability that a LPG will last < 60 days) = 0.6 - 0.2 = 0.4

Q: 151. The ratio in which an article costing Rs 76 per unit is mixed with an article costing Rs 42 per unit so that ratio of the mixture costing Rs 60 is:

1. 3:2
2. 5:4
3. 2:3
4. 4:3
5. 3:5

Solution: 3)

Cheaper article Superior article
Q: 152. A and B can do a work in 3 days. B and C can do the same work in 4 days and C and A can do it in 12 days. Find the time taken by them if they all work together.

1. 4\frac{1}{2} days
2. 3 days
3. 3\frac{1}{3} days
4. 4 days
5. 5 days

Solution: 2)

Work done by A and B in one day = \frac{1}{3} \text{ --------- (1)}

Work done by B and C in one day = \frac{1}{4} \text{ --------- (2)}

Work done by C and A in one day = \frac{1}{12} \text{ --------- (3)}

Adding (1), (2) and (3) we get ,

2(A+B+C) = \frac{1}{3} + \frac{1}{4} + \frac{1}{12}

A+B+C = \frac{1}{2} \times \frac{8}{12} = \frac{1}{3}

So, together they all finish the work in 3 days.

Q: 153. y is 45 % more efficient than x. If y alone can do a work in 20 days, then how long will x alone take to do the same work?

1. 29 days
2. 30 days  
3. 18 days  
4. 17 days  
5. None of these

Solution: 1)

If y is 45% more efficient than x,  
If y takes 100 days to do a work, then x takes 145 days to do the same work.  
Now if y takes 20 days, then x will take \( \frac{145}{100} \times 20 = 29 \) days

Directions: A person has 3 sons. He distributed his money among his sons equally. They invested 1,44,000, 1,52,000 and 1,32,000 Rs. in a business respectively. At the end of 1st quarter they earn a profit of 37450. They donated 20% of their profit and rest are invested in the business in the ratio of capital at the starting of 2nd quarter. Again at the starting of the 3rd quarter they invested equally amount in the business. At the starting of 4th quarter they invested in the ratio of 7:6:8 respectively. They invested their money for whole year and the profit earned by them is proportional to the investment and the period of investment.

Q: 154. If the amount invested by 1st son at the starting of 2nd quarter is equal to amount invested by the 3rd son at the starting of 4rd quarter then find total investment invested by all the sons at the starting of 4th quarter.

1. 32700  
2. 25850  
3. 26460  
4. 28900  
5. 27150

Solution: 3)

\[ 144000:152000:132000 = 36:38:33 \]

Donated amount = 37450 × 20% = 7490

Amount invested by sons at the starting of 2nd quarter is 37450 - 7490 = 29960

Amount invested by 1st son at the starting of 2nd quarter = 29960/107 × 36 = 10080 Rs.

So amount invested by the 3rd son at the starting of 4rd quarter = 10080 Rs.

Total investment invested by all the sons at the starting of 4th quarter = 10080/8 × 21 = 26460 Rs.

Q: 155. Find the amount that is donated at the end of 1st quarter.

1. 7740  
2. 7150  
3. 6950  
4. 7490  
5. 7580

Solution: 4)

= 37450 × 20% = 7490

Q: 156. If x : y = 3 : 4, find (4x + 5y) : (5x – 2y)?

1. 36:8
2. 37: 5
3. 36: 7
4. 32: 7
5. 31: 9

Solution: 4)

\[
\frac{x}{y} = \frac{3}{4} \quad \text{Given:}
\]

\[
\therefore \quad \frac{4x+5y}{5x-2y} = \frac{4\left(\frac{x}{y}\right)+5}{5\left(\frac{x}{y}\right)-2} \quad \text{[Dividing Nr & Dr by } y]\]

\[
= \frac{4 \times \frac{3}{4} + 5}{5 \times \frac{3}{4} - 2} = \frac{8 \times 4}{7} = \frac{32}{7}
\]

157. What should come at the place of question mark (?) in the following number series?
649.6875, 433.125, 173.25, 49.5, ?, 2

A. 13
B. 10
C. 11
D. 15
E. 9

Ans. C.

Solution:

158. What should come at the place of question mark (?) in the following number series?
11, 12, ?, 81, 328, 1645

A. 56
B. 36
C. 55
D. 26
E. 45

Ans. D.

Solution:

159. In still water, speed of boat is 10 km/hr. Speed of the stream is 4 km/hr. Therefore, in how much time will it cover a distance of 70 km downstream?

a. 4 hrs
b. 3 hrs
c. 5 hrs
d. 4.5 hrs
e. 6 hrs
Solution: (C) Speed of the boat \((B) = 10\)
Speed of the stream \((S) = 4\)
Therefore, Downstream speed = \(B + S = 10 + 4 = 14 \text{ km/hr}\)
Now, Speed (Downstream) = 14
Distance (Downstream) = 70
And according to what the formula says,

\[14 \text{ (Speed)} = \frac{70 \text{ (Distance)}}{x \text{ (Time)}}\]

\[x = \frac{70}{14} = 5 \text{ hrs (answer)}\]

160. A man starts cycling at 12.00 a.m. at a speed of 5kmph. A train A, starts running on a track with a speed of 100kmph at 5.00 a.m. Another train B, starts running on the adjacent parallel track with a speed of 120 kmph at 7.00 am from the same station and in the same direction. Find the distance travelled by the man when the two trains meet.

a) 68km
b) 85km
c) 90 km
d) 92km
e) 78 km

Solution: (b)

Let \(t\) be the time in hours after 5.00 am when the trains meet
Therefore distance covered
\[100 \ast t = 120 \ast (t-2)\]
\[T=12 \text{ hours}\]
I.e. the trains meet at 5pm till then the man cycles for 17 hours
Distance covered by the man =5\times17=85 \text{ km}
\(b\) (85km) is the right answer