Direction: In this question, three columns (I, II and III) and three sentences are given, which are divided into three parts. Column I ( $A, B$ and $C$ ) consists of first half of each sentence and it is fixed. Column II (D, E and F) and Column III (G,H and I) consist of the remaining half of each sentence. Match column I with column II and III, so that the sentences formed are both meaningful and grammatically correct. Choose the correct option as your answer.
1.

Column I
A) On 19 October 2017, the astronomer Robert Weryk
B) With her laptop in front of her
C) Mr. Zuckerman's extreme environmentalist anti-immigration sentiments
Column II
D) spotted an extraordinary splinter of rock, just a few hundred metres across,
E) is motivated by the presumption that the place we live is special
F) she's listening intently to a giant pair of headphones
Column III
G) Applying the technology in native town of California
H) held upside down so that the strap hangs below her chin
I) tumbling through our inner solar system
A. ADI, BFH and CEG
B. AID, BHF and CGE
C. AIB, BHD and CGF
D. ADI and BFH
E. None of the above
2.

Column I
A) Speculation might well be the creative engine of science
B) Democracy is a form of government based upon the fundamental assumption
C) The accused have been charged with conspiring with a senior royal Column II
D) but it's only when flights of imagination are followed up by intellectually
E) of equality of all individuals and of their equal rights to life
F) against the monarch, while seeking foreign assistance
Column III
G) honest, rigorous critique that we have a chance of learning more about our world
H) liberty and pursuit of happiness
I) who is the half-brother of the King to stoke unrest
ADG, BEH, CIF
A. AGD and BEH
B. ADH, BEG and CFI
C. ADG, BEH and CIF
D. AGD, BHE and CFI
E. None of the above
3.

Column I
A) The atmosphere was electric, the exchanges witty and
B) Some former social media influencers
C) After 12 years of fascism, six years of war, and the concentrated
Column II
D) highlight the dangers of curating a self-image with little purchase in reality
E) genocidal killing of the Holocaust
F) and thus the debates were well attended by professors and students alike
Column III
G) the arguments well thought out and well-honed,
H) have turned against their platforms and chosen to
I) investment to market is extremely risky.
AGF and BHD
A. AFG, BEH and CFI
B. AFI, BHE, and CIF
C. AGF and BHD
D. AFG and CDH
E. None of the above
4.

Column I
A) The actress took her second vaccine shot
B) Detailed reports from the north Germany suggest that
C) Renaissance philosophy started in the mid-14th century
Column II
D) for Covid exactly a month after her first dose
E) in one city alone, some 100,000 people bought confiscated
F) and saw the flowering of humanism, the rejection of scholasticism
Column III
G) and shared the update with fans on Instagram on Tuesday
H) goods from various auctions during the Nazi regime
I) and the renewal of interest in the ancients
A. ADG, BEH and CFI
B. AGD, BHE and CIF
C. ADH, BEI and CFG
D. AFH, BDI and CGE
$E$. None of the above
5.

Column I
A) Nihilism, over the course of time, has been given
B) Some people are lucky enough to look back at
C) The leader of the opposition vehemently criticized and slammed Column II
D) many meanings and has been interpreted in
E) as benefitted from the work-fromhome and remote education boom
F) the list of hospitals was provided by the government
Column III
G) many different ways by philosophers throughout history
H) most of them being state-run hospitals
I) vaccines, especially in the rural area
A. AEG and CFI
B. BEI
C. AGF, BEH and CFI
D. ADG
E. None of the above

Direction: Read the passage carefully and answer the questions that follow. A word is given in bold to help you locate it while answering on of them.
I don't think it's too soon to say that the COVID-19 global pandemic will likely be one of the defining events of 2020, and that it will have implications that last well into the decade. The situation is rapidly changing. The amount of people deemed safe to gather in a single place has dwindled from thousands, to hundreds, to ten. Restaurants, bars, movie theaters, and gyms in many major cities are shutting down. Meanwhile many office workers are facing new challenges of working remotely full time.
Essentially, people are coming to terms with the realities of our interconnected world and how difficult it is to temporarily separate those connections to others. To say that we are living in unprecedented times feels like an understatement. We received responses from many on how people are approaching this
period of isolation and uncertainty in huge overnight changes to their shopping behaviors. From bulkbuying to online shopping, people are changing what they're buying, when, and how.
As more cities are going under lockdowns, nonessential businesses are being ordered to close, and customers are generally avoiding public places. Limiting shopping for all but necessary essentials is becoming a new normal. Brands are having to adapt and be flexible to meet changing needs. As people have embraced social distancing as a way to slow the spread of the pandemic, there has naturally been a drop-off in brick-and-mortar shopping. That would seem to mean there would likely be an increase in online shopping as people turn to ecommerce to purchase the items they might have otherwise purchased in person.
No doubt, online retail has played a huge role in keeping the U.S. economy from suffering even greater damage during the pandemic. Stay-at-home orders and consumer

Online retail still doesn't completely satisfy most consumers, though. A study reported $90 \%$ of surveyed shoppers stated high shipping fees and home delivery lasting more than two days would deter an online purchase.
Amazon (the nation's second largest retailer behind only Walmart) cracked the code with its Prime service, offering free shipping and two-day (or faster) turnaround. Not surprisingly, Amazon saw tremendous sales growth in 2020. Other national retailers, including Walmart and Target, have poured resources into
strengthening their online shipping services.
For example, customers shop for items online, then pick up their merchandise either in the store or, even more conveniently, curbside in their cars.
However, the market shift in retail is posing tremendous challenges to small retailers: challenges that COVID-19 exacerbated. Surely, engaging in e-commerce is more than simply setting up a website and waiting for orders.
Source:
https://www.bigcommerce.com/blog
/covid-19-ecommerce/
6. Which of the following word/phrase can replace the highlighted phrase in the passage?

## Drop off

A. Rachet down
B. Distend
C. Taper off
D. Both $A$ and $C$
E. All A, B and C
7.

Which of the following assumptions strengthen the given argument in the passage?
Surely, engaging in e-commerce is more than simply setting up a website and waiting for orders.

1) E-commerce business involves a huge costs related to software, sales tax accounting and SEO.
2) The investors are augment their profits without adhering to tax liabilities.
3) Consumer behavior and loyalty is much dependent on their safety during the pandemic and immediate access to the retail products.
A. Only 1
B. Only 2
C. Both 1 and 3
D. Both 2 and 3
E. All of these
8. Which of the following statements best describes the main idea of the passage?
1) Understanding the COVID-19 Effect on Online Shopping behavior
2) Understanding the impact of pandemic on online retail industry
3) How has pandemic led to revival of brick and mortar shopping
A. Only 1
B. Only 2
C. Both 2 and 3
D. Only 3
E. Both 1 and 2
9. Which of the following can best describe the tone of the passage?
A. Commiserating
B. Grandiose
C. Derisive
D. Dogmatic
E. Incendiary
10. 10. 

What does the author mean when he mentions:
" To say that we are living in unprecedented times feels like an understatement. "
A. The author means that the overnight changes that this pandemic has cauused people to incorporate in them is though unwelcomed, but people are pushingn hard to adapt themselves to it. Such situation have never been expereineced before but the way people have adapted to it, we can say that the intensity of the challenge seems less now.
B. The overnight changes, isolation, separation from interconnected world, people are much affected and they are finding it hard to adapt to the new normal.
C. The intensity of the pandemic currently is quite low and people are able to adapt to it easily, seeming that such an experience is not anything new for them.
D. Both $A$ and $B$
E. Both $B$ and $C$
11. Which of the following statements should precede the emboldened line in the passage?
For example, customers shop for items online, then pick up their merchandise either in the store or, even more conveniently, curbside in their cars.
A. As online momentum builds, online return volumes will inevitably rise putting intense pressure on profit margins.
B. For many businesses striving to remain relevant and survive the disruption, their transition will likely mean a challenging readjustment as business models are aligned with the 'new normal'.
C. Omni-channel marketing - which combines the strengths of online and in-person retail - offers opportunities for brick-and-mortar retailers to serve customers in this new environment of increased comfort with web shopping.
D. As the European retail industry undergoes a period of transformation, businesses need to adopt a more detailed and data-driven approach to profitability.
E. Before using the product, consumers should check that product they received is what they actually ordered by comparing its description at the point of purchase with the product packaging information, and that there is no visible damage.

Direction: Read the given passage carefully and answer the questions
that follow. Certain word (s) are printed in bold to help you locate them while answering some of these. Genghis Khan got his dying wish: despite attempts by archaeologists and scientists to find the Mongolian ruler's final resting place, the location remains a secret 800 years after his death. The search for his tomb, though, has inspired an innovative project that could help protect polar bears.
"I randomly tuned into the radio one night and heard an expert talking about the use of synthetic aperture radar [SAR] to look for Genghis Khan's tomb," says a researcher involved in the project. "They were using SAR to penetrate layers of forest canopy in upper Mongolia, looking for the ruins of a burial structure."
Talking to engineers, the researcher learnt that SAR is used by the military to detect enemy camps, tanks and vehicles hidden beneath camouflage and is being studied as a potential tool for finding avalanche survivors. He and his team had been looking for a technology to detect polar bear dens. "It was very serendipitous that I heard that broadcast," he says. Successful pilot tests using SAR to find simulated polar bear dens took place in Alaska's Prudhoe Bay in 2014 and 2015. The project was resurrected with trials in March 2021 on a snowy mountain plateau in Utah's Manti-La Sal national forest. A SAR device was fitted to a Cessna O2A Skymaster that flew 3,000ft (900 metres) over researchers and students digging dens a metre under the snow. With a lack of polar bears in Utah, students crawled inside to act as targets, or laid out simulated bears made from cardboard and tinfoil.

Building dens is a critical period for polar bears. For months, vulnerable cubs rely on their mother's milk and the safety of the den to survive. As polar bears are driven further inland by receding sea ice, denning areas and oil and gas activity increasingly overlap. Disturbances can push fearful mothers to abandon their dens. The chances of survival for
$\qquad$ .
With fewer than 26,000 polar bears thought to be left globally and an estimated decline of $40 \%$ in some populations, such as the southern Beaufort Sea, every den and bear counts.
SAR detects objects by sending pulses of radio waves; sensors pick up the echo or "bounce" to map an area. The aim is to find the right frequency, a sweet spot, that can penetrate snow but still detect a bear. Getting reliable data on denning sites is vital. "The Arctic national wildlife refuge is the perfect example," says a researcher. "Industry wants to go in and pump oil. If we have a tool that definitively says exactly where polar bear dens are, that means keeping people away from those places. If we want bears, we need baby bears, so we've got to protect those dens." Source:
https://www.theguardian.com/enviro nment/2021/apr/27/polar-bears-genghis-khan-ai-radar-innovations-helping-protect-cubs-aoe
12. 12.

Which of the following assumptions are supported by the passage?
I) Synthetic Aperture Radar can penetrate denser surfaces for the most effective remote sensing among extant remote sensors.
II) Global Warming is directly related to the endangerment of polar bears.
III) Researchers need approximate data on denning sites to better protect them.
A. Only I
B. Only II
C. Both I and II
D. Both II and III
E. All I, II, and III
13. Given below is a possible inference that can be drawn from the facts stated in the passage. You have to examine the inference in the context of the passage and decide upon its degree of truth or falsity.
"Synthetic Aperture Radar is an amplitude-based remote sensing that tries to find the right amplitude of the echoes reflecting off surfaces and targets."
A. Definitely true
B. True
C. False
D. Definitely false
E. Cannot be determined
14. Which of the following themes is being discussed in the passage?
A. Climate change and its impact on arctic fauna.
B. Scientific Research as a way forward to combat climate change and species extinction.
C. Remote sensing as a way of combating the extinction of endangered species.
D. The role of sound wave frequency in developing modern remote sensing AI.
E. None of the above
15. Which of the following options correctly describe the tone of the passage?
A. Caustic
B. Informative
C. Assertive
D. Deprecatory
E. Condescending
16. Which of the following can effectively fill the blank in the fifth paragraph of the passage?
A. the weak and undeveloped cubs prematurely out on the snow and ice, are drastically reduced.
B. the strong and well developed cubs prematurely out on the snow and ice, are drastically reduced.
C. the weak and hyperdeveloped cubs out on the snow and ice, are drastically increased.
D. Both $A$ and $C$
E. None of the above.
17. Which of the following words as used in the passage can be replaced by the word "Fortuitous"?
A. Innovative
B. Aperture
C. Camouflage
D. Serendipitous
E. Vulnerable

Direction: Four statements are given below at $A, B, C$ and $D$. There may be some errors in the given statements. Mark the incorrect statement as the answer. If all the statements are incorrect, mark E i.e. All are incorrect as the answer.
18.18.

Question
A. A 400-year old lake on Hawaii island was evaporated due to lava from the weeks-long eruption of the Kilauea volcano, which paved over tide pools and coral gardens, leading to death of a number of sea creatures. B. On Hawaii island, lava from the weeks-long eruption of the Kilauea volcano has paved over tide pools and coral gardens, boiled a 400-year-old
lake until it evaporated and killed a number of sea creatures.
C. The evaporation of a 400-year old lake on Hawaii island resulted due to the spread of lava from the weekslong eruption of the Kilauea volcano, which paved over tide pools and coral gardens and a number of sea creatures.
D. Death of a number of sea creatures resulted from a 400-year old lake on Hawaii island evaporating due to lava from the weeks-long eruption of the Kilauea volcano, which paved over tide pools and coral gardens.
E. All are incorrect

## 19. Question

A. The National Award-winning actor, Naseeruddin Shah, has acted in more than 100 films till date and knows the industry like the back of his hand.
B. Luckily, the television series have also done a lot of permanent damage by propagating completely outdated and miscredited situations by showing the woman to always be at his husband's beck and call.
C. I see hope from those filmmakers because they are making movies without the pressure of a producer sitting on their heads and without having to worry about the budget.
D. Shah feels that most kids born into the industry believe that the industry owes them something by accommodating them.
E. All are incorrect
20. Question
A. From the gorgeous scenery and rich history to the culture and the personalities of the people who live here, the unique aspects of Scotland are so appealing that it should surely be our next travel destination.
B. The Scottish Highlands are just as beautiful as you've imagined and they
let you see the Scotland of your imagination.
C. Not all of Scotland is lush green the coastline is lined with beautiful white sandy beaches where you can dig your toes in the sand and listen to the roaring waves crashing onto the land.
D. The best way to feel the rhythm of traditional Scottish music is by attend a Scottish dance event for which you can dance in couples or small groups. E. All are incorrect

Direction: Out of the five statements given below, only one is grammatically correct. Choose the correct statement as your answer.
21. 21.

Question
A. Tape worms are those organisms which can breed in your intestine, that means they can also share the nutrition \& fats of your food.
B. People who practice KEN diet aren't allowed to eat or drink anything for a span of 10 days, and they even have to get a pipe inserted through their nose for the supply of basic nutrients.
C. Fascinating architecture - whether modern or historic - always attracts tourism because it's indicative of the kind of beauty only humans and not so machines can together create.
D. Push-ups are one of the exercise which strengthen your arms and upper body but give you a great physique.
E. However the movie didn't gain as much attention in India, Zubaan was the first Bollywood film to open the 20th edition of the Busan International Film Festival.
22. Question
A. 2018 so far has been the year of movies and shows that struck a chord with the audience, not just for their
storylines, but also for some amazing performances by certain actors.
B. The subject of the film demanded the actors to portray a myriad range of human emotion, especially vulnerability in the farce of emotional loss.
C. Adele's mother was a brilliant guitar player and a young Adele had begun developing an interest in music from her mother's age.
D. While studying in one of the most renowned schools of performing arts, Adele wanted to make her career in Artists and Repertoire, which entails overlooking the artistic development of recording artists and songwriters.
E. Not only is she a critically acclaimed singer, she's an incredible human being who's bold, powerful, and believes in taking charge of her own life.

## 23. Question

A. Not to far from the realms of the Thar desert, its shape-shifting sand dunes, mighty forts and palaces, the Kalbeliya dancers and scorching heat, there lies a city with lush green forests, pleasant weather and plenty of flora or fauna.
B. Achalgarh fort was build by Maharana Kumbha, the ruler of Mewar, who built a total of 32 forts in Rajasthan during his reign.
C. Krem Puri Cave is an incredibly complex maze of hundred of short passages and long stretches of corridors which are interconnected in a big network.
D. The Shyok River meets the Nubra or Siachan River to form the beautiful Nubra valley separates the Ladakh and Karakoram mountain ranges.
E. The Bhimbekta caves were discovered quite recently in 1957 and were declared a UNESCO World Heritage Site only in 2003.

Direction: In the following question, three statements have been given, and a word has been highlighted in each of them which may be the synonym or antonym of the word given in bold. Identify the statement(s) in which the word fits contextually to convey a logical meaning.
24.24.

## Hurdle

I. By going around the world in his wheelchair, Rick Hansen showed the world that an impediment shouldn't stop you from achieving your goals.
II. Bored, restless, fearful, she retreated to the back of the cave, searching it again for any sort of door or anything that might aid her escape.
III. If you're in the middle of a blistering guitar solo on an electric, you can fudge the details a little bit in a way that would never fly on an acoustic.
A. Only I
B. Only II
C. Both II and III
D. Both I and II
E. All I, II and III

Direction: In the following question, three statements have been given, and a word has been highlighted in each of them which may be the synonym or antonym of the word given in bold. Identify the statement(s) in which the word fits contextually to convey a logical meaning.
25.25.

## Convert

I. Before going on the trip, he changed the currency to ensure no hassle during the vacation.
II. The apostate firmly believed in his decision to leave the order
following the discovery of its criminal activities.
III. The translate was quickly edging into an agitated argument.
A. Both I and II
B. Both I and III
C. Both II and III
D. Only I
E. Only II

## 26.Remedial

I. The therapeutic sessions helped her a lot in coming to terms with the trauma of being orphaned at the age of five.
II. Despite being discharged from the hospital, he was advised to remain on palliative care.
III. The audience was quickly becoming restorative and demanded that the artist begin the performance immediately.
A. Both I and III
B. Both I and II
C. Only III
D. Both II and III
E. None of the above

## 27.Abscond

I. For a minute there, the policemen thought that the thief was going to bolt and run away from custody.
II. Today's seizure was by far the biggest seizure of cannabis by the police force of the state.
III. Ayush escaped after slaying his brother, but he couldn't avoid the lingering sense of guilt.
A. Only I
B. Only II
C. Only III
D. Both I and III
E. All I, II and III

## 28.Adamant

I. The king resolved to avenge his father's death by conquering the
southern province by fair means or foul.
II. Due to pandemic, students are not able to take proper examinations and their grades in many cases might not be satisfactory.
III. Passengers in large numbers were seen proceeding towards the railway stations to catch the train.
A. Only I
B. Only II
C. Only III
D. Both I and II
E. All I, II and III

Direction: In the following question, six statements have been given. All the given sentences, when rearranged, form a coherent paragraph. Arrange the parts to form coherent and grammatically correct passage and answer the questions that follow.
a) The happiness first infected the zeitgeist with the publication of Laurie Garrett's The Coming Plague (1994) and Richard Preston's Hot Zone (1995).
b) But there's something in these scenarios not logical as there is nothing new in the intimate contact between animals and people because our hominid ancestors lived on wildlife before we ever evolved into Homo sapiens.
c) the fear about pandemic is confirmed by historical memory (1)/ history like black confetti (2)/ because over the time, plagues have killed a (3)/ lot of people, and deadly diseases litter (4)
d) According to the evolutionary epidemiologists, the most dangerous infectious diseases are almost always not animal diseases fresh broken into the human species, but diseases adapted to humanity over time: smallpox, malaria,
tuberculosis, leprosy, typhus, yellow fever, polio.
e) One of the early records is that of the Antonine Plague in the year 165 CE, killed the Marcus Aurelius and millions of his subjects while the Black Death of 1348-50, spread by human fleas and from human lung to human lung, killed tens of millions.
f) Great Australian virologist Frank Macfarlane Burnet, argued (1)/ the plagues were a result from (2) human intrusion into the natural world (3)/ Studying these events, many health experts, including the (4)
29. 29.

Out of the given sentences, which of the following is incoherent to the theme of the passage?
A. D
B. B
C. C
D. F
E. A
30. What should be the correct sequence of statement labelled C?
A. 1324
B. 1342
C. 2134
D. 3124
E. No changes required
31. What should be the correct sequence of statement labelled F ?
A. 1243
B. 3214
C. 2413
D. 4123
E. No changes required
32. Which of the following will be the second statement after rearrangement?
A. E
B. B
C. C
D. D
E. F
33. Which of the following will be the last statement after rearrangement?
A. A
B. B
C. E
D. D
E. F
34. In statement $D$, a part of the sentence is highlighted. Below the sentence, alternatives to the emboldened part are given as (A), (B), (C) and (D), which may help improve the sentence. Choose the correct alternative out of the given five options. In case the given sentence is correct, the answer will be option (E), i.e., 'No correction required'.
A. almost always not animal diseases freshly broken into the human species B. almost always not animal diseases refresh broken into the human species
C. almost always not animal diseases fresh broken into the human specimen
D. almost always not animalish diseases fresh broken into the human species
E. No correction required.
35.35.

## Convert

I. Before going on the trip, he changed the currency to ensure no hassle during the vacation.
II. The apostate firmly believed in his decision to leave the order following the discovery of its criminal activities.
III. The translate was quickly edging into an agitated argument.
A. Both I and II
B. Both I and III
C. Both II and III
D. Only I
E. Only II

## 36.Remedial

I. The therapeutic sessions helped her a lot in coming to terms with the trauma of being orphaned at the age of five.
II. Despite being discharged from the hospital, he was advised to remain on palliative care.
III. The audience was quickly becoming restorative and demanded that the artist begin the performance immediately.
A. Both I and III
B. Both I and II
C. Only III
D. Both II and III
E. None of the above

Direction: The following question carries a statement with two blanks. From the given options, choose the option that would fit in both the blanks to make the sentence grammatically correct and meaningful.
37.37.

The " $\qquad$ " election of four new hereditary peers to the House of Lords has shown how a "few dozen $\qquad$ " have more sway than thousands of voters and campaigners say.
A. mad, ill-bred
B. sensible, countess
C. asinine, commoner
D. ludicrous, aristocrat
E. grandee, quotidian
38. In the short panel discussion at theend of the conference an voice asked whether digital architecture is really political sense.
A. afraid, stringent
B. shrieky, profound
C. intrepid, radical
D. cowardly, draconian
E. plucky, lament

Direction: A sentence with two blanks is given, followed by five options. The correct answer must fill both the blanks, to make the sentence meaningfully and grammatically correct.
39.39.

While conducting the research into the rationale behind the country's propagandising, the scholars
___ that the country's elite's anxiety to
present themselves as a homogeneous group was, ironically, a byproduct of their nation's Mediterranean geography.
A. Determined
B. Lettered
C. Grave
D. Read
E. None of the above
40. Despite inflicting
on the 'Other' for generations, the white people of specific ethnic and
religious backgrounds are up about soon
becoming the electoral minority in the regions they currently dominate because of immigration, both legal and illegal, and differing fertility rates among the relevant groups.
A. Damage
B. Bruises
C. Wound
D. Triggered
E. None of the above.

Direction: Study the following pie charts and answer the given questions.

The pie chart given below shows the total number of employees (male and female) working in 5 companies - A, B, C, D and E.


The below pie chart shows the number of male employees working in 5 companies - A, B, C, D and E.


## Note:

I. The difference of the total number of employees (male and female) working in companies $A$ and $B$ is 21 .
II. The number of male employees
working in company A is $3821 \%$ of the total number of employees working in company A.
41.41.

What is the central angle of total number of male employees working in company A?
A. $36^{\circ}$
B. $45^{\circ}$
C. $54^{\circ}$
D. $60^{\circ}$
E. $75^{\circ}$
42. What is the average number of female employees working in the given 5 companies?
A. 50
B. 48
C. 54
D. 70
E. None of these
43. What is the ratio of number of female employees working in companies C and E ?
A. $36: 5$
B. $18: 5$
C. $8: 1$
D. $6: 1$
E. None of these
44. Number of female employees working in company $B$ is what percent less than the number of male employees working in company D ?
A. $63 \%$
B. $72 \%$
C. $22 \%$
D. $78 \%$
E. None of these
45. Find the difference of number of female employees working in the companies A and D.
A. 86
B. 206
C. 65
D. 66
E. None of these

46 . Only $12.5 \%$ of female employees and $18.75 \%$ of male employees working in the company $C$ are post graduate, find the total number of post graduate employees working in the company C .
A. 18
B. 24
C. 27
D. 30
E. None of these
47. There are total 80 students in a class. The number of boys who were not present in the class is 4 less than the number of girls who were not present. The number of girls who were present was two-third more than girls who were not present. 40 boys were present in the class. Find the total number of girls in the class.
A. 28
B. 40
C. 32
D. 30
E. 48
48. There are two villages $X$ and $Y$. Number of females in village $X$ and female in village $Y$ is equal. Number of male in village $Y$ is $25 \%$ less than the number of males in village $X$. If the number of females in village $Y$ reduced by $50 \%$ and the number of males in village $Y$ becomes $50 \%$ more than that of village $X$ then total population of village $Y$ will remain same. Find the ratio of total population of village $X$ and village $Y$.
A. $7: 6$
B. $5: 6$
C. $10: 9$
D. 12:7
E. None of these
49.A container has 160 litres of pure milk and $X$ litres of milk was drawn and replaced with same quantity of water. Now milk becomes three times of water. If 20 litres of mixture was taken out and replaced with same quantity of water, find the quantity of water in final mixture.
A. 64 litres
B. 72 litres
C. 40 litres
D. 55 litres
E. 50 litres
50. An article is marked up by $\mathrm{X} \%$ and sold on $0.5 \mathrm{X} \%$ of discount and earns profit of $8 \%$. Find the value of $X$ if the value of $X$ is more than 20 .
A. 80
B. 70
C. 60
D. 90
E. 84
51.A invests Rs. 9780 in a scheme A at $\mathrm{R} \%$ rate of simple interest for 3 years. He reinvests the interest amount in scheme B at 20\% rate of interest on compound interest for 2 years. He received Rs. 6337.44 after 2 years. Find the value of $R$.
A. 24
B. 20
C. 15
D. 30
E. 28
52.60 men can complete a piece of work on time. 40 men can complete the same work in 12 more days. Find in how many days can 18 men
$\frac{3}{5}$ th
complete $5^{-t}$ of the work.
A. 50 days
B. 48 days
C. 60 days
D. 72 days
E. None of these

Direction: Each question below is followed by two statements I and II. You have to determine whether the data given in the statement is sufficient for answering the question. You should use the data and your knowledge of Mathematics to choose the best possible answer.
53.

There is a series of three consecutive odd numbers and another series of three consecutive even numbers. Find the difference between sums of both series.
Statement I: Middle value of odd number series is 7 more than the middle value of even number series.
Statement II: Sum of smallest number of odd number series and largest number of even number series is 57 .
A. The data in statement I alone is sufficient to answer the question, while the data in statement II alone is not sufficient to answer the question
B. The data in statement II alone is sufficient to answer the question, while the data in statement I alone is not sufficient to answer the question
C. The data either in statement I alone or in statement II alone is sufficient to answer the question
D. The data given in both statements I and II together are not sufficient to answer the question
E. The data given in both statements I and II together are necessary to answer the question.
54. In a class, $52 \%$ students fail in English and 42\% students fail in Mathematics. Find the percentage of students who passed in both exams.
Statement I: 48\% students passed in English.
Statement II: 25\% students passed in only Mathematics.
A. The data in statement I alone is sufficient to answer the question, while the data in statement II alone is not sufficient to answer the question
B. The data in statement II alone is sufficient to answer the question, while the data in statement I alone is not sufficient to answer the question
C. The data either in statement I alone or in statement II alone is sufficient to answer the question
D. The data given in both statements I and II together are not sufficient to answer the question
E . The data given in both statements I and II together are necessary to answer the question.
55. There is a path around a square field. Find the area of the square field.
Statement I: Width of path around the square field is 2 m .
Statement II: Total area of the path is $136 \mathrm{~m}^{2}$.
A. The data in statement I alone is sufficient to answer the question, while the data in statement II alone is not sufficient to answer the question.
B. The data in statement II alone is sufficient to answer the question, while the data in statement I alone is not sufficient to answer the question.
C. The data either in statement I alone or in statement II alone is sufficient to answer the question.
D. The data given in both statements I and II together are not sufficient to answer the question.
E . The data given in both statements I and II together are necessary to answer the question.
56. The ratio of monthly incomes of Ananya to Shaila is 5: 6 and the ratio of their monthly savings is $2: 3$. What is the monthly expenditure of Shaila?
Statement I: The ratio of monthly income and monthly savings of Ananya is 5: 2 respectively.
Statement II: The monthly expenditure of Ananya and Shaila is equal.
A. The data in statement I alone is sufficient to answer the question, while the data in statement II alone is not sufficient to answer the question
B. The data in statement II alone is sufficient to answer the question, while the data in statement I alone is not sufficient to answer the question
C. The data either in statement I alone or in statement II alone is sufficient to answer the question
D. The data given in both statements I and II together are not sufficient to answer the question
E . The data given in both statements I and II together are necessary to answer the question.
$57 . \mathrm{x}^{2}-\frac{23 \mathrm{x}^{2}}{\sqrt{46 \mathrm{x}^{2}+54 \mathrm{x}^{2}}}+\mathrm{k}=0$.
If one root of this quadratic equation 1
is 12 , find the value of other root value.
A. $\frac{3}{5}$
$\frac{4}{5}$
4
C. 7
D. $\frac{2}{3}$
E. None of these

Direction (2-3): Study the following information carefully and answer the question given below.
Some equations and conditions are given.

| Equations | Conditions |
| :--- | :--- |
| a. $10 x^{2}-x-3=0$ | d. 50 times of largest root <br> value is divisible by 6. |
| b. $4 y^{2}+8 y-5=0$ | e. Product of both root <br> value is between -1 and -2. |
| c. $2 z^{2}+9 z-35=0$ | f. Sum of both root value <br> will be positive value. |

58. 

In the following the combination of equation and condition are satisfying each other?
A. b-d
B. $\mathrm{c}-\mathrm{e}$
C. a-d
D. $b-f$
E. None of these
59. In the following the combination of equation and condition are satisfying each other?
A. b-f
B. b-e
C. c-d
D. a-e
E. None of these

Direction: What approximate value will come in place of the question mark (?) in the following question? (You are not expected to calculate the exact value)
60.60.
$\underline{(1214.23+2312.03-825.98)}$
99.80
A. 750
B. 720
C. 800
D. 840
E. 850
61. $(15.99)^{2}+(11.01)^{2}-(9.98)^{2}=$ ?
$+124.001$
A. 157
B. 146
C. 172
D. 153
E. 168
62.74.9\% of 719.99 - ? ${ }^{2}-40 \%$ of $250.01=\sqrt{1370}$
A. 25
B. 20
C. 32
D. 16
E. 12
$40.12 \times 14.99$
63. $12.001+24.01-5.001 \times$ $31.899=$ ?
A. -86
B. -71
C. 77
D. 82
E. -93
64.59.98\% of $640.09-?^{3}=84.02 \%$ of 250-168.9
A. 15
B. 10
C. 7
D. 5
E. 12
65.The ratio of the age of Anmol 5 years ago to the age of Prashant after 4 years is $4: 5$. Anmol is 5 years older than Prashant. Anmol is 4 years younger than Keshav. The age of Keshav is how much percentage more than that of Prashnat?
A. $45.5 \%$
B. $52 \%$
C. $56.25 \%$
D. $52.45 \%$
E. 60\%
66.A shopkeeper mixed $X$ litres sanitizer of one variety cost Rs. 240 per litres and ( $\mathrm{X}-12$ ) litres sanitizer of other variety cost Rs. 280 per litres and after selling the mixture at Rs. 309 per litres, he got a profit of $20 \%$. Find the value of $X$.
A. 60
B. 42
C. 54
D. 48
E. None of these
67.P and Q started a business with the capital of Rs. 24000 and Rs. 32500. After x months R also joined them with the capital of Rs. 40000 while after $(x+4)$ months, $Q$ withdrawn all his investment and the ratio of the profit share of $P$ to $R$ after
one year is 4 : 5. After how many months did Q withdraw the amount?
A. 6 months
B. 8 months
C. 5 months
D. 7 months
E. None of these
68.Two bottles were purchased at the same price. One was sold at $25 \%$ profit and second was sold at a price which was Rs. 2160 less than the price at which first was sold. If the overall profit earned by selling both the bottles was $10 \%$. What was the Cost price of one bottle?
A. Rs. 5400
B. Rs. 7200
C. Rs. 9000
D. Rs. 8400
E. Rs. 7500
69.A container contains 765 litres mixture of milk and water in the ratio of $10: 7$ respectively. If 20\% mixture was taken out and $2 X$ litre milk and $(3 X-32)$ litre water is added in the remaining mixture, then the ratio of the milk to water in the final mixture becomes $6: 5$. What is the difference between the quantity of milk and water in the final mixture?
A. 80 litres
B. 60 litres
C. 75 litres
D. 120 litres
E. 90 litres

Direction: Study the following information carefully and answer the questions that follow.
Four people( $\mathrm{P}, \mathrm{Q}, \mathrm{R}, \mathrm{S}$ ) have certain amount of money in their wallets. The currency notes in the wallet of the four people were in only 3 denominations.(D-I, D-II, D-III) The table given below shows the total amount that the four people have and
the amount of the three different denominations for the four people. The amount with S is missing from the table.

| Person | Amount (in <br> Rs.) | Denomination <br> D-I(in Rs.) | Denomination <br> D-II(in Rs.) | Denomination <br> D-III(in Rs.) |
| :---: | :---: | :---: | :---: | :---: |
| $\mathbf{P}$ | 1120 | 50 | 20 | 10 |
| Q | 3250 | 100 | 20 | 5 |
| R | 5400 | 200 | 50 | 20 |
| S | - | 20 | 10 | 5 |

It is also known that each of the 4 people had the same number of currency notes for each of the denominations i. e. For person P: Number of notes of denomination D-I = Number of notes of denomination D-II $=$ Number of notes of denomination D-III. This holds true for all the 4 people.
70.

T has currency notes of three denominations - Rs. 500, Rs. 20 and Rs. 10 . If T has total amount of Rs. 3710 in his wallet, then the number of currency notes of each denomination that T has is how much less than the number of currency notes that P has? All the above given conditions apply to T as well.
A. 10
B. 8
C. 6
D. 7
E. 9
71. The amount with S in his wallet is less than Rs. 1000 and the number of notes of each denomination with S lies between 20 and 30 and is a prime number. Find the total number of currency notes with S.
A. 66
B. 72
C. 69
D. 75
E. 87
72. What is the difference between the number of currency notes of each denomination of P and Q ?
A. 12
B. 15
C. 8
D. 10
E. None of these
73. Another person A has Rs. 25 more in his wallet than the average of the amount with Q and R together. A has minimum two notes of Rs. 2000 and notes of denomination of Rs. 200 and Rs. 50 . What is the possible number of notes of Rs. 50 denomination that A could have? All the above given conditions apply to $A$ as well.
A. 5
B. 3
C. 4
D. 2
E. 6

Direction: Study the following information carefully and answer the questions that follow.
Car A: Car travels a certain distance in 6 hours and distance travelled by car $A$ is $16.66 \%$ less than that travelled by car B .
Car B: Car travels a certain distance in 7 hour and 12 minutes with the speed of $50 \mathrm{~km} / \mathrm{h}$.
Car C: Car travels 400 km distance with twice the speed of car B.
74.74.

If the speed of car $A$ is decreased by $2 \mathrm{~km} / \mathrm{h}$ and speed of car $B$ is increased by 10\%, find the difference between the distances travelled by both the cars in 4 hours.
A. 32 km
B. 40 km
C. 28 km
D. 35 km
E. None of these
75. Car D travelled 40\% more distance than that by car A in 10 hours, find the speed of car D.
A. $50 \mathrm{~km} / \mathrm{h}$
B. $42 \mathrm{~km} / \mathrm{h}$
C. $48 \mathrm{~km} / \mathrm{h}$
D. $54 \mathrm{~km} / \mathrm{h}$
E. None of these
76. Train A whose length is 345 m can cross a pole in 23 seconds. If the speed of train $A$ is increased by $50 \%$ the time taken by train A to cross the platform is 24 seconds. What is the ratio of the length of train $A$ to the length of the platform?
A. 10:7
B. $23: 13$
C. $15: 9$
D. $24: 17$
E. None of these
77. The ratio of the speed of boat to speed of the stream is $7: 2$. The taken by boat to cover 450 km distance upstream is 20 hours more than that to cover the same distance downstream. What is the difference between the upstream and downstream speed of the boat?
A. $15 \mathrm{~km} / \mathrm{h}$
B. $12 \mathrm{~km} / \mathrm{h}$
C. $6 \mathrm{~km} / \mathrm{h}$
D. $8 \mathrm{~km} / \mathrm{h}$
E. None of these
78. Sanjana and Ritika has equal amount. Sanjana investe $\stackrel{1}{2}$ rd of her amount at the rate of $12 \%$ p.a. on simple interest and the remaining amount at the rate of R\% p.a. on simple interest while Ritika invested the amount at the rate of $10 \%$ p.a. on compound interest. If the interest received by both of them at the end of two years is equal, Find the value of $R$.
A. 11.25
B. 10.25
C. 9.75
D. 8.5
E. None of these
79. Manan can complete a piece of work in 24 days while Komal can complete it in 40 days. They work together for 8 days and the rest work is completed by Akshay in 7 days. If they get Rs. 2400 for the whole work, find the share of Manan, Komal and Akshay respectively.
A. Rs. 600, Rs. 700, Rs. 1100
B. Rs. 800, Rs. 600, Rs. 1000
C. Rs. 600, Rs. 540, Rs. 1260
D. Rs. 750, Rs. 450, Rs. 1200
E. None of these

Direction: Study the following information carefully and answer the questions that follow.
There are three different Guns A, B and $C$. Different numbers of bullets are fired from each Gun. A few of them hit the target while others missed.
Gun A: $70 \%$ of the total number of fired bullets missed the target.
Gun B: Total 900 bullets were fired and $33.33 \%$ hit the target.
Gun C: 450 bullets hit the target.
The number of bullets that hit the target by Gun A is $20 \%$ less than that by Gun B. The number of bullets that missed the target by Gun C is 6.25\% less than the number of bullets fired by Gun A. Time gap between the firing of two bullets is 5 seconds, 3 seconds and 7 seconds for Gun A, Gun $B$ and Gun C respectively.
80.80.

If Gun C fired continuously from 12:30 pm to $12: 34 \mathrm{pm}$ and not any time before that, then how many
bullets were left to be fired by Gun C after this period of shooting?
A. 1165
B. 1164
C. 1156
D. 1157
E. 1158
81. Find the average of the number of bullets that hit the target by all three Guns together.
A. 290
B. 360
C. 250
D. 330
E. None of these
82. If all the Guns started firing at 12.00 pm , how many total bullets would be left to be fired by the 3 guns after 30 minutes? (It is known that none of the guns fired any time before 12:00 pm).
A. 1683
B. 1720
C. 1672
D. 1540
E. None of these
83. Number of bullets fired by Gun A in 10 minutes is approximately how much percentage more than the number of bullets fired by Gun B in 4 minutes?
A. $30 \%$
B. $45 \%$
C. $49 \%$
D. $64 \%$
E. 60\%
84. The number of bullets that hit the target by Gun $D$ is equal to the number of bullets that hit the target by Gun B and the total number of bullets fired by Gun $D$ is equal to the average of the number of total bullets fired by Gun A and C. What is the
number of bullets that missed the target by Gun D?
A. 800
B. 500
C. 600
D. 700
E. None of these
85. What is the ratio of the number of bullets fired by gun $C$ that missed the target to the number of bullets fired by Gun A ?
A. $8: 5$
B. $14: 9$
C. 12: 7
D. $14: 11$
E. $15: 16$
86.A certain sum is invested on simple interest at the rate of R\% and becomes Rs. 8120 in three years and Rs. 9800 in 5 years. If the same sum is invested at the rate of $(R+5) \%$ on compound interest, find the interest received after 2 years.
A. Rs. 2550
B. Rs. 2644
C. Rs. 2655
D. Rs. 2464
E. None of these
87.Ashok and Dharma started a business with the capital of Rs. ( $X+$ 600 ) and Rs. (X -400 ) respectively. After 6 months they made additional investment of Rs. 1200 and Rs. 3000 respectively. At the end of the year, profit share of Ashok out of total profit of Rs. 10480 is Rs. 5280. Find the value of $X$.
A. 4800
B. 5400
C. 5200
D. 6400
E. 6000
88.A bag contains total 20 balls in which $x$ are yellow balls, $(x+4)$ are
green balls and $y$ are red balls. If the probability of picking 1 red ball is ${ }^{\frac{1}{5}}$, find the number of green balls in the bag.
A. 8
B. 12
C. 10
D. 6
E. 15
89. The ratio of the volume of two cylinder C1 and C2 is 5 : 16 respectively and the height of the two cylinders C1 and C2 is 5 : 4 respectively. If the radius of cylinder C1 is 7 cm and the total surface area of cylinder C 1 is $748 \mathrm{~cm}^{2}$, find the total surface area of cylinder C2.
A. $1936 \mathrm{~cm}^{2}$
B. $1744 \mathrm{~cm}^{2}$
C. $1824 \mathrm{~cm}^{2}$
D. $2024 \mathrm{~cm}^{2}$
E. None of these
90. The ratio of the two numbers P and Q is $5: 7$, when 22 is added in the P and 35 is added in Q , the ratio becomes $7: 10.48 \%$ of Q is what percentage of $60 \%$ of P ?
A. $108 \%$
B. $80 \%$
C. $112 \%$
D. $120 \%$
E. $90 \%$

Direction: Study the following information carefully and answer the question based on it.
Nine people A, B, C, D, E, F, G, H, and I have meetings on different dates viz. 5 th, $11^{\text {th }}$, and 14 th of different months viz. September, November, and December. They own different number of shops viz. 1, 2, 3, 4, 5 and 6 and different number of apartments which is double the number of shops.

Not more than two people own the same number of apartments.
Two persons have meetings between A and B, A being first to attend the meeting among themselves. B owns 4 apartments. D and F both joined the meeting in the same month having 30 days, D's meeting is scheduled before F. E , who owns the least number of shops, attends meeting immediately before G , who attends the meeting in a month having more than 30 days. A and $E$ owns the same number of apartments. More than two persons have meeting between B and E. Number of shops I owns is 4 less than H , who own an odd number of shops. H does not attend the meeting immediately after or before B or E. C has not attended the meeting before H. C's meeting is not scheduled adjacent to E or H's. D owns an odd prime number of shops but not more than 4. Number of apartments F owns is double of the same that $D$ owns. Difference between the numbers of C and $G$ is $1, C$ owns smaller number of shops owned than G. G owns an even number of shops but not prime.
91.91.

The sum of apartments owned by C, H , and I is $\qquad$ .
A. 16
B. 22
C. 18
D. 20
E. 12
92. How many people have meetings between B and G ?
A. 3
B. 4
C. 1
D. 0
E. 2
93. The difference between the number of apartments owned by F and H ?
A. 1
B. 0
C. 3
D. 2
E. 4
94. Who among them have meeting on $11^{\text {th }}$ November?
A. F
B. D
C. B
D. I
E. E
95. If $A$ is related to $D, B$ is related to I , then C is related to $\qquad$
A. G
B. H
C. E
D. F
E. None of the above

Direction: Study the following information and answer the given questions.
96. 96.

If a meaningful word can be formed using $3^{\text {rd }}$ letter of SECURITY, $2^{\text {nd }}$ and $5^{\text {th }}$ letter of PURITY, $6^{\text {th }}$ letter of ENSURE and $1^{\text {st }}$ letter of AMPULE, what is the second letter of the newly formed word? If more than one word can be formed, mark your answer as $X$. If no such word can be formed, mark your answer as Z .
A. C
B. A
C. E
D. X
E. Z

Direction: Study the following information and answer the given question.
$A$ @ $B$ means $A$ is the daughter of $B$
$A \& B$ means $A$ is the father of $B$
$A$ \$ $B$ means $A$ is the brother of $B$
$A$ \# $B$ means $A$ is the husband of $B$
97. P \#Q@K\$L\$MQO

How is P related to K ?
A. Son-in-law
B. Son
C. Daughter
D. Brother
E. None of the above
98. L\#K, L\$B, K\&P

How many people are female in the family?
A. 3
B. 2
C. 1
D. 0
E. Cannot be determined

Direction: Study the following information and answer the given questions.
Certain number of people sit around a circular table and face outside the center of the table. Two people sit between I and T. Two people sit between H and X . One people sits between $O$ and $A$. I sits second to the left of $Y$. The number of people sit between $T$ and $A$ is same as the number of people sit between T and N . A sits second to the left of I. N sits third to the left of $\mathrm{H} . \mathrm{U}$ sits second to the right of $X$ and sits to the immediate left of $O$.
99.99.

How many people are seated around the table?
A. 20
B. 22
C. 26
D. 21
E. 27
100. In which position is I with respect to O ?
A. $4^{\text {th }}$ to the left
B. $3^{\text {rd }}$ to the right
C. $6^{\text {th }}$ to the left
D. $7^{\text {th }}$ to the right
E. None of the above
101. How many people are seated between $X$ and $T$ when counted clockwise from T?
A. 9
B. 11
C. 8
D. 10
E. 7
102. N is seated $\qquad$ to
the $\qquad$ of U?
A. $11^{\text {th }}$, right
B. $3^{\text {rd }}$, right
C. $5^{\text {th }}$, left
D. $8^{\text {th }}$, right
E. $7^{\text {th }}$, left
103. If $A$ and $T$ interchange their positions, then $A$ is $\qquad$ to the left of O ?
A. $7^{\text {th }}$
B. $5^{\text {th }}$
C. $2^{\text {nd }}$
D. $8^{\text {th }}$
E. $9^{\text {th }}$
104. How many people are seated between $Y$ and $H$, when counted anticlockwise from H ?
A. 9
B. 7
C. 8
D. 11
E. None of the above

Direction: Study the following information and answer the given questions.
A number arrangement machine when given an input line of numbers
rearranges them following a particular rule. The following is an illustration of input and rearrangement.


Step V

## 02

Step IV is the last step of the rearrangement. As per the rules followed in the above steps, find out in each of the following questions the appropriate steps for the given input.

105. 105.

Which of the following is in the final step?
A. 31
B. 13
C. 07
D. 22
E. 35
106. What is the sum of the numbers in step IV?
A. 189
B. 209
C. 312
D. 267
E. None of the above
107. What is the $3^{\text {rd }}$ number from the left of step II?
A. 35
B. 48
C. 112
D. 48
E. 70
108. What is the difference between the largest and the smallest numbers in step I?
A. 5
B. 6
C. 7
D. 2
E. 3
109. Which of the following is the factors of the smallest number in step IV?
A. 3
B. 4
C. 5
D. 7
E. 9

Direction: Below in each question are given two statements I and II. These statements may be either independent causes or may be effects of independent causes or a common cause. One of these statements may be the effect of the other statement. Read both the statements and decide which of the following answer choice correctly depicts the relationship between these two statements. 110. 110.

Statement I: The state is facing huge water crisis along with air pollution.
Statement II: Natural sources of water and use of private vehicles are increased.
A. I is the cause and II is the effect.
B. I is the effect and II is the cause.
C. Both I and II are effect of independent causes.
D. Both I and II are effect of common causes.
E. None of the above

Direction: A statement is given followed by three courses of action numbered I, II, and III. The candidate is required to grasp the statement,
analyze the problem or policy it mentions and then decide which of the courses of action logically follow(s).

## 111. 111.

## Statement:

An accountant of a company has found that a huge amount of money is missing from the shelf.

## Courses of action:

I. He should inform the police about the same and ask them to strictly enquire about the suspects.
II. He should inform his manager and other authorities as soon as possible.
III. He should not inform anyone and keep silence about the incident as he might get dragged in this case.
A. Only I follows.
B. Only II follows.
C. Both I and II follow
D. Both II and III follow
E. Only III follows

Direction: A statement is given followed by three courses of action numbered I, II, and III. The candidate is required to grasp the statement, analyze the problem or policy it mentions and then decide which of the courses of action logically follow(s). 112. 112.

## Statement:

Priya has broken his brother's laptop by mistake and scared of getting scolded.

## Courses of action:

I. She should throw the broken laptop out of the window silently so that no one gets to know who has broken it. II. She should leave the house and run away as her brother will scold her bad.
A. Only I follows.
B. Only II follows.
C. Both I and II follow
D. Neither I and II follow
E. None of the above
113. How many such pairs of letters are there in the word CROCODILE each of which has as many letters between them as in the English alphabet in both forward and backward directions?
A. 3
B. 5
C. 7
D. 2
E. 0

Direction: Study the following information and answer the given questions.
Six people A, B, C, D, E, and F have joined the company $X Y Z$ in the years 2001 to 2006 but not necessarily in the same order. They have laptops of different companies, viz. Acer, HP, Lenovo of different colours, viz. Black, Silver and Blue. Not more than two people have laptop of the same brands. Not more than three people have laptops of the same colour.
Note: One person may be senior or junior to another person in terms of their joining date to the company.
$B$ is the only person to use a Blue laptop but the brand he use is also used by $\mathrm{D} . \mathrm{C}$ is the first person to join the company. Only one person has joined after B . A has joined the company in a year which is not divisible by 2. Only one person has joined the company between E and F, who has Acer laptop. E is senior to F . People who use Acer laptops use Black coloured laptops. Only two people joined the company between the ones who use Acer and Lenovo laptops, the one having Acer laptop is senior to the other person. D is not the juniormost person. People having Lenovo laptops use Silver coloured laptops.
114. 114.

Who among the following uses Lenovo laptop?
A. C
B. D
C. A
D. B
E. None of the above
115. The Blue laptop is of which brand?
A. Lenovo
B. HP
C. Acer
D. Either Lenovo or HP
E. Either HP or Acer
116. Who joined the company in the year 2004?
A. C
B. D
C. E
D. B
E. None of the above
117. How many people uses Black laptop?
A. 2
B. 1
C. 3
D. Either 1 or 2
E. None of the above
118. How many people join the company between $A$ and $F$ ?
A. 2
B. 1
C. 3
D. 4
E. 5
119. Statement: A seventeen-yearold girl has registered in a social media platform where only people above eighteen years old are allowed. She has put wrong information while filling the form and system of
verification is not available in that platform yet.

## Assumptions:

I. Anybody can register themselves in the platform with wrong information as no system is available to verify.
II. Opening an account with fake identity proof is not a criminal offense.
A. Only I follows
B. Only II follows
C. Either I or II follows
D. Both I and II follow
E. None of the above
120. Statement: Taxation on private vehicles will increase the price of them and make people more reluctant to buy their own vehicles which will in turn reduce air pollution in the country as more people will start using public transports that are limited in number.

## Assumptions:

I. Taxation can solve any problems in the country by putting restrictions on people's choices.
II. This was the only way to reduce air pollution in the nation.
A. Only I follows
B. Only II follows
C. Either I or II follows
D. Both I and II follow
E. None of the above
121. 121.

Which of the following is false according to the given statement?
S@I, R\&Q, P\$Q, Q\#L, R\#S
A. $P$ is brother of Q .
B. $L$ is the daughter-in-law of $R$.
C. I is the mother of $S$.
D. $R$ is son-in-law of $I$.
$E$. $L$ is the sister-in-law of $P$.
Direction: Study the following information carefully and answer the given questions.

Twelve people i.e., A, B, C, D, E, F, G, H, I, J, K, and L sitting in three rows i.e. Row 1, Row 2 and Row 3 and all are facing to the north. Row 1 is to north of Row 2 and Row 2 is to the north of Row 3. They are sitting in the manner that three people sit in Row 1, six people sit in Row 2 and three people sit in Row 3. People of Row 1 sit opposite to the people of Row 2 who are sitting on the left most side and the other three people of Row 2 sit opposite to people of Row 3. They are sitting with equidistance to each other.
A sits second from one of the extreme ends of the row 2 . I sits to the south of J. Two people sit between D and G who sits opposite to F . K sits to the immediate right of the one who sits opposite to A. D sits to the immediate left of $A$. One person sits between $C$ and the one who sits opposite to F. E sits either to the south east or to the south west of C. L sits opposite to the one who sits adjacent to E . B sits to the north west of $L$ but not adjacent to $F$. E doesn't sit at the end of any row.
122. 122.

Who sits opposite to H ?
A. D
B. A
C. L
D. C
E. None of these
123. How many people sit between $A$ and the one who sits opposite to $F$ ?
A. Two
B. One
C. Three
D. More than three
E. None
124. How many people sit to the left of the one who sits opposite to $E$ ?
A. One
B. Five
C. Three
D. Four
E. Two
125. What is the direction of $A$ with respect to the one who sits opposite to C?
A. South
B. North east
C. North
D. South east
E. None of these
126. If in the middle row all the people arranged from left to right in the English alphabetical order then the position of which amongst the following remains unchanged?
A. Two
B. Three
C. None
D. One
E. None of these

Direction: Each of the questions below consists of a question and three statements numbered I, II and III. You have to decide whether the data provided in the statements are sufficient to answer the question. Read all the three statements and give answer accordingly.
127. 127.

Six friends P, Q, R, S, T and U are standing in a row. All of them are facing towards North. Who is standing between R and T ?
Statement I: P is standing second from the left end. R is standing third to the left of Q who is near to T .
Statement II: Q isn't the immediate neighbor of $U$ who doesn't sit any extreme ends of the row.
Statement III: T isn't the immediate neighbor of $P$.
A. If the data in statement I and statement II is sufficient to answer the question.
B. If the data in statement I and statement III is sufficient to answer the question.
C. If the data in statement II and statement III is sufficient to answer the question.
D. If the data in all the statements I, II and III together is sufficient to answer the question.
$E$. If the data in all the statements I, II and III together isn't sufficient to answer the question.
128. Six professionals Doctor, Artist, Dancer, Painter, Singer and Teacher are travelling to Hyderabad in a week starting from Monday to Sunday, only one person travels on one day. On one day of the week no person is travelled. On which day of the week no one is travelled?
Statement I: Dancer travelled on one of the days after Wednesday but not on Sunday. Only one person has travelled between Dancer and Doctor but Doctor doesn't travel on last day of the week. Two persons travelled between Doctor and Teacher.
Statement II: Sunday is not the day when no one is travelled and painter is not travelled on Sunday. Doctor travelled before Teacher. Two persons travelled between Painter and Holiday.
Statement III: Artist travelled before holiday. There is three-day gap between holiday and the day on which Singer travelled.
A. If the data in statement I alone is sufficient to answer the question, while the data in statement II alone or in statement III alone is not sufficient to answer the question.
B. If the data in Statement II alone is sufficient to answer the question,
while the data in statement I alone or in statement III is not sufficient to answer the question.
C. If the data in Statement III alone is sufficient to answer the question, while the data in statement I alone or in statement II is not sufficient to answer the question.
D. If the data in all the statements I, II and III together isn't sufficient to answer the question.
E . If the data in all the statements I, II and III together is sufficient to answer the question.
129. There are five pens $Q, R, S, T$ and $U$ are placed on the table according to their height with five being the tallest and 1 being the smallest position. All the pens are placed in a vertical line from smallest to tallest pen. What is the position of pen S ?
Statement I: T is the tallest among the all. $R$ is just placed behind $Q$ but not on even numbered position.
Statement II: T doesn't place at even numbered position.
Statement III: U doesn't place at even numbered position and $T$ is placed after U.
A. If the data in statement I alone is sufficient to answer the question, while the data in statement II alone or in statement III alone is not sufficient to answer the question.
B. If the data in Statement II alone is sufficient to answer the question, while the data in statement I alone or in statement III is not sufficient to answer the question.
C. If the data in Statement III alone is sufficient to answer the question, while the data in statement I alone or in statement II is not sufficient to answer the question.
D. If the data in all the statements I, II and III together isn't sufficient to answer the question.
E. If the data in all the statements I, II and III together is sufficient to answer the question.
130. Six persons namely $B, N, S, P, O$ and M who likes different activities Dancing, Fighting, Singing, Karate, Painting and Mixing but not necessarily in the same order. S likes Dancing and M likes neither Fighting nor Singing. Who among the following likes Karate?
Statement I: B likes Painting and N doesn't like Fighting.
Statement II: O likes Singing and P doesn't like Painting.
Statement III: N likes neither Painting nor Singing.
A. If the data in statement I alone is sufficient to answer the question, while the data in statement II alone or in statement III alone is not sufficient to answer the question.
B. If the data in Statement II alone is sufficient to answer the question, while the data in statement I alone or in statement III is not sufficient to answer the question.
C. If the data in Statement III alone is sufficient to answer the question, while the data in statement I alone or in statement II is not sufficient to answer the question.
D. If the data in all the statements I, II and III together isn't sufficient to answer the question.
E. If the data in all the statements I, II and III together is sufficient to answer the question.
131. How many people are there in the row if there are more than five people between $B$ and $Z$ ?
Statement I: O is at third from the left end and $D$ is sixteenth from the right end of the row.
Statement II: Z is sitting seventh to the right of $B$.

Statement III: There is twenty-two people between $D$ and $O$ which includes $B$ and $Z$.
A. If the data in statement I alone is sufficient to answer the question, while the data in statement II alone or in statement III alone is not sufficient to answer the question.
B. If the data in Statement II alone is sufficient to answer the question, while the data in statement I alone or in statement III is not sufficient to answer the question.
C. If the data in Statement III alone is sufficient to answer the question, while the data in statement I alone or in statement II is not sufficient to answer the question.
D. If the data in all the statements I, II and III together isn't sufficient to answer the question.
E . If the data in all the statements I, II and III together is sufficient to answer the question.
132. Choose the word which is different from the rest.
A. BLUE - EULB
B. RAINBOW - WOBNIAR
C. PUPIL - LIPUP
D. CLOUD - DUOLC
E. KDAHU - UHADK
133. Statement: Should government impose capital punishment in robbery cases?

## Arguments:

I. Yes, it will reduce robbery cases in the country.
II. Yes, capital punishment is the only way to stop any kind of crime in the country.
A. Only I is strong
B. Only II is strong
C. Either I or II is strong
D. Both I and II are strong
E. None of the above
134. Statement: Should government ban tobacco production in the country?

## Arguments:

I. Yes, this will reduce smoking habits of people.
II. No, this will increase unemployment rate in the country.
A. Only II is strong
B. Only I is strong
C. Either I or II is strong
D. Both I and II are strong
E. None of the above

Direction: Study the following information carefully and answer the given questions.
Eight persons A, B, C, D, P, Q, R and $S$ are sitting in straight line and facing north but not necessarily in the same order. They all work in a company and have different designations i.e., CEO, Director, Branch Manager, Senior Manager, Manager, Assistant Manager, Clerk and Attendant but not necessarily in the same order. CEO is the senior-most post and Attendant is the junior-most.
E sits fourth to the right of the one who is Branch Manager. Only two persons sit between the one who is Branch Manager and D. Only two persons sit between the one who is Director and G who is not Clerk. C does not sit at the extreme ends of the row. The one who is junior-most does not sit at the extreme end of the row. A is not Manager. The one who is just senior than C is an immediate neighbor of D. Only one person sits between H and the one who is Manager. Number of persons sit to the right of the one who is CEO is same as the number of persons sit between $A$ and $D$. The one who is Director does not sit at extreme end of the row. The one who is Clerk does not sit to the left of the one who is

Manager. C who is an immediate neighbor of the one who is Branch Manager sits third to the left of A. The one who is senior Manager is not an immediate neighbor of the one who is Director. F sits third to the left of the one who is Clerk. E is not senior Manager.
135. 135.

Who amongst the following is the Senior Manager?
A. H
B. A
C. G
D. F
E. C
136. How many people sit between $F$ and the one who is CEO?
A. Two
B. One
C. Three
D. None
E. Four
137. What is the designation of $D$ ?
A. Senior Manager
B. Manager
C. Director
D. Clerk
E. None of these
138. How many people sit to the left of the one who is Manager?
A. Three
B. Two
C. One
D. None
E. Four
139. What is the position of the one who is Attendant with respect to the one who is Branch Manager?
A. Second to the left
B. Immediate right
C. Third to the right
D. Immediate left
E. None of these
140. SURROUNDINGS is coded as RUSDNUORSGNI, ENVIRONMENT is coded as NEIVNORTNEM, then how is PROTECTION coded as?
A. ORPCERSSNI
B. TNOITRPCED
C. ORPCETNOIT
D. ORPCETSBHI
E. None of the above
141. What amount has been proposed for further recapitalization of public sector banks?
A. Rs. 20,000 crores
B. Rs. 30,000 crores
C. Rs. 40,000 crores
D. Rs. 50,000 crores
E. Rs. 80,000 crores
142. Who monitors the Priority Sector Lending (PSL) in commercial banks?
A. Reserve Bank of India (RBI)
B. Small Industries Development Bank of India (SIDBI)
C. National Bank for Agriculture and Rural Development (NABARD)
D. Government of India (GOI)
E. Securities and Exchange Board of India (SEBI)
143. The world's longest sandstone cave "Krem Puri" has been discovered in which state of India?
A. Andhra Pradesh
B. Meghalaya
C. Tripura
D. Maharashtra
E. Odisha
144. How many Ombudsman office are there in India?
A. 21
B. 22
C. 23
D. 24
E. 25
145. Who among the following is the co-founder and CEO of Twitter?
A. Bill Gates
B. Narayan Murthy
C. Jack Dorsey
D. Tim Berners-Lee
E. None of the above
146. RBI was nationalised in the year
$\qquad$ .
A. 1934
B. 1935
C. 1949
D. 1950
E. 1951
147. India's first wetland conservation center 'Centre for Wetland Conservation and Management (CWCM)' has been be set up in which city of India?
A. Kolkata
B. Kochi
C. Chennai
D. Mumbai
E. Bhubaneswar
148. What is the validity period of 'Electoral bonds'?
A. 10 days
B. 30 days
C. 20 days
D. 12 days
E. 15 days
149. Mutual Funds are regulated in the country by
A. IRDAI
B. Association of Mutual Funds of India (AMFI)
C. NABARD
D. Securities and Exchange Board of India
E. Reserve Bank of India
150. Renowned personality Ustad Ghulam Mustafa Khan passed away recently, he was a veteran_.
A. Flute Maestro
B. Tabla Maestro
C. Sitar Maestro
D. Classical Musician
E. Piano Maestro
151. Which company has ranked first most-valued IT services brand globally, according to a report by Brand Finance?
A. Accenture
B. IBM
C. Tata Consultancy Services (TCS)
D. Infosys
E. Wipro
152. Which of the following Asian countries has Nikkei as its stock market index?
A. China
B. Singapore
C. Japan
D. South Korea
E. Hong Kong
153. The 'ICC Men's T20I Cricketer of the Decade' has been awarded to?
A. Virat Kohli
B. Kane Williamson
C. Steve Smith
D. Rashid Khan
154. What is percentage of government holding in NABARD?
A. $99.6 \%$
B. $0.4 \%$
C. $100 \%$
D. $75 \%$
E. 56\%
155. The headquarters of the 'United Nations World Tourism Organization is situated in:
A. Madrid, Spain
B. Gland, Switzerland
C. Washington DC, USA
D. Paris, France
E. Frankfurt, Germany
156. West Bengal legislative assembly consists of how many seats?
A. 292
B. 294
C. 296
D. 298
E. 299
157. Which of the following country has been elected as President of the International Solar Alliance?
A. USA
B. Russia
C. India
D. Japan
158. Recently, Hawker Culture of which country has been inscribed on the UNESCO's Representative List of the Intangible Cultural Heritage of Humanity?
A. Indonesia
B. China
C. Vietnam
D. Singapore
159. The Chairman of the National Disaster Management Authority (NDMA) is_.
A. National Security Advisor
B. Prime Minister of India
C. Chief of DRDO
D. Home Minister of India
160. Which payment gateway company has decided to close its operation in India?
A. MobiKwik
B. Razor pay
C. PayPal
D. Lazypay
E. None of the above
161. The Foxconn of toy world to set up India's first toy cluster in $\qquad$
A. Madhya Pradesh
B. Karnataka
C. Kerala
D. Rajasthan
E. Haryana
162. Maradona scored 'hand of god' goal against which country?
A. Germany
B. France
C. Portugal
D. Spain
E. England
163. Which of the following became the first company to launch an Electric tractor in India?
A. Sonalika Group
B. Tractor and Farm Equipment (TAFE) Ltd.
C. Mahindra and Mahindra
D. Swaraj Tractors
E. Escorts Agri Machinery
164. FASTag works on which of the following technologies?
A. Phone Early Warning System (PEWS)
B. Radio Frequency Identification (RFID) technology
C. Accelerometer
D. Near Field Technology
E. GPS Technology
165. What is the name given to India's first indigenous 9 mm machine pistol jointly developed by the Defence Research and Development Organisation (DRDO) and the Indian Army?
A. Glock 17
B. SIG Sauer P226
C. ASMI
D. Beretta 92FS
E. Agram 2000
166. Which of the following is not related to 'bank to bank' transfer mechanism?
A. NEFT
B. RTGS
C. Cheque
D. Depository Receipt
E. IMPS
167. Which of the following Musical Instruments is played by Ustad Shahid Parvez Khan?
A. Santoor
B. Sitar
C. Veena
D. Flute
E. Tabla
168. The Light House Projects inaugurated by the prime minister will be undertaken in six cities. Which of the following is not one among them?
A. Dhanbad in Jharkhand
B. Rajkot in Gujarat
C. Agartala in Tripura
D. Indore in Madhya Pradesh
E. Lucknow in Uttar Pradesh
169. ICICI Bank has launched its Representative office in which nation?
A. France
B. USA
C. Nepal
D. Indonesia
E. Myanmar
170. Which Indian women wrestler has won silver medal at the individual Wrestling World Cup in the women's 57 kg category which took place in Belgrade, Serbia?
A. Sakshi Malik
B. Vinesh Phogat
C. Alka Tomar
D. Kavita Devi
E. Anshu Malik
171. Adivasi Mela 2021 was organised in
A. $\bar{B} h u b a n e s w a r ~$
B. Cuttack
C. Balasore
D. Sambalpur
E. Rourkela
172. The Tapovan Vishnugad power plant is owned by which corporation?
A. ONGC
B. BPCL
C. NTPC
D. GAIL
E. CIL
173. According to the 'India Energy Outlook 2021', India will become ___ largest energy consumer by 2030, surpassing European Union?
A. $1^{\text {st }}$
B. $2^{\text {nd }}$
C. $3^{\text {rd }}$
D. $4^{\text {th }}$
E. $5^{\text {th }}$
174. What is the name of the umbrella program for the Roads and Highways sector in India?
A. Setu Bharatam
B. Bharatmala Pariyojana
C. Smart City Mission
D. Accessible India Project
E. Digital India Mission
175. Which organization is responsible for setting up the world's largest zoo in Gujarat's Jamnagar district?
A. NTPC
B. Reliance Industries Limited (RIL)
C. Adani Groups
D. Larsen \& Toubro
E. Tata Motors
176. What is the maturity period of the Senior Citizen Saving Scheme?
A. 4 years
B. 5 years
C. 6 years
D. 7 years
E. 8 years
177. Kishor Biyani is the CEO of which company on which SEBI has imposed a penalty?
A. Hindalco Industries
B. Reliance Pvt Ltd
C. Adani Groups
D. Future Retail Ltd
E. None of the above
178. Which company is known for cleaning up of Non-performing Asset (NPA)?
A. Negotiable Instrument Company
B. Asset Reconstruction Company
C. Department of Economic and Policy Research
D. Asset Arrangement Company
E. None of the above
179. World's largest renewable energy parkhas been inaugurated in
A. Madhya Pradesh
B. Gujarat
C. Rajasthan
D. Maharashtra
E. Punjab
180. Who is the author of the book titled as "Struggle is my life"?
A. Nelson Mandela
B. Jawaharlal Nehru
C. Mahatma Gandhi
D. Barack Obama
E. Morissana Kouyate
181. Finance Minister of India has announced reduction in residency limit for Indian citizens to set up oneperson companies (OPC) from 182 days to $\qquad$
A. 110 days
B. 120 days
C. 130 days
D. 140 days
E. 150 days
182. India has recently released a commemorative postage stamp to mark the $\qquad$ anniversary of the United Nations Organisations.
A. $73^{\text {rd }}$
B. $74^{\text {th }}$
C. $75^{\text {th }}$
D. $76^{\text {th }}$
E. $77^{\text {th }}$
183. Flight Lieutenant Bhawna Kant is the first female fighter pilot to participate in the Republic Day Parade 2021. She hails from which State?
A. Uttar Pradesh
B. Madhya Pradesh
C. Jharkhand
D. Bihar
E. Odisha
184. Which nation is planning to set up the first nuclear reactor on the moon by the end of 2026 ?
A. Russia
B. USA
C. UK
D. China
E. France
185. Rajesh Sharma has replaced which of the following person as the CEO of Ayushman Bharat scheme?
A. Amitabh Kant
B. Indu Bhushan
C. Randeep Guleria
D. Rajeev Khosla
E. Harsh Vardhan
186. Which of the following is the 1st international movie of Irfan Khan's?
A. The Namesake
B. New York
C. The Amazing Spider-Man
D. Jurassic World
E. The Warrior
187. The minimum loan size eligible for debt recovery under the Securitisation and Reconstruction of Financial Assets and Enforcement of Security Interest (SARFAESI) Act, 2002 is proposed to be reduced from the existing level of Rs 50 lakhs to
$\qquad$ .
A. Rs 5 lakhs
B. Rs 10 lakhs
C. Rs 15 lakhs
D. Rs 20 lakhs
E. Rs 25 lakhs
188. According to India Energy Outlook 2021, published by the International Energy Agency (IEA) by which year India will overtake the European Union as the world's thirdlargest energy consumer?
A. 2025
B. 2027
C. 2028
D. 2030
E. 2032
189. Which of the following national park is not located in Madhya Pradesh?
A. Van Vihar National Park
B. Kanha National Park
C. Ranthambore National Park
D. Bhandavgarh National Park
E. None of the above
190. The National Pollution Control Day is observed every year on which date?
A. $1^{\text {st }}$ December
B. $2^{\text {nd }}$ December
C. $3^{\text {rd }}$ December
D. $4^{\text {th }}$ December
E. $5^{\text {th }}$ December

1. Ans. D.

The correct answer is option A. Part A, D and I are connected on the basis that an astronomer spotted a rock, which is tumbling in the solar system. Part B talks about a girl using her laptop. The logical part which follows is part $F$ as the girl is listening something intently. This is followed by part H as it talks about holding the headphone upside down.
However, Part $C$ and $E$ can be connected, but there is no part in column III which conclude the sentence in correct manner. Thus, option D is the correct answer.
2. Ans. C.

In the above sentences, the part C is correctly followed by part I. It talks about the accused who has been conspiring with a senior royal, who is also the half brother of the King, mentioned in part I. Part F concludes the sentence. The only option which has CIF as an alternative is option C. We can negate the rest of the option as of now. ADG and BEH also makes grammatically correct and contextually sensible sentence. Thus, option C is the correct answer.
3. Ans. C.

Part A talks about atmosphere of some place. The next parts which can follow logically are part G and part F. It talks about a debate competition which are well attended due to electric atmosphere. Thus, AGF makes a correct sentence. Part B needs to be followed by a verb as it is ending with auxiliary verb 'have'. It is followed by part H as social media influencers can only turn against their social media platforms. It is correctly concluded by part D, as it talks about why the influencers leave social media. Part C and E makes a pair, it
does not have a correct conclusion in column III. Thus, only parts AGF and BHD forms a sentence, which is grammatically and contextually correct. Thus, option D is the correct answer.
4. Ans. A.

Part $A$ is logically followed by part D as one can take vaccine shot against a disease, in this case, covid. Part AD is correctly followed by part $G$ as the actress can share the news with her fans. Part ADG form a sentence.
Part B is followed part E we are talking about a city in north Germany. This is followed by part H as one can buy confiscate goods from auctions. Thus, parts BEH form a sentence.
Similarly, part $C$ is followed by parts $F$ as well $I$ as they extend the definition of Renaissance, in a grammatically correct and contextual manner. Thus, parts CFI forms a sentence.
Thus, option A is the correct choice. 5. Ans. D.

Part $A$ is followed by part $D$ and part G as the definitions of nihilism has been discussed over history by various philosophers.
However, only part ADG makes a coherent sentence. The rest of the combinations are incoherent, contextually and grammatically incorrect. Thus, option D is the correct answer.
6. Ans. D.

The correct answer is D
7. Ans. C.

The correct answer is option C.
8. Ans. E.

The correct answer is E .
9. Ans. B.

As the passage revolves around pandemic and its impact on buying beahviour and retail which contains much of a elaboration than
necessary, the closest tone is Grandiose. Thus the correct answer is B.
10. Ans. A.

The correct answer is A.
11. Ans. C.

The correct answer is C .
12. Ans. C.

Assumption I: Refer to the following lines from the first and second paragraph of the passage: "Genghis Khan got his dying wish: despite attempts by archaeologists and scientists to find the Mongolian ruler's final resting place, the location remains a secret 800 years after his death."....""They were using SAR to penetrate layers of forest canopy in upper Mongolia, looking for the ruins of a burial structure."
If a site that has remained undiscoverable for 800 years is close to being discovered due to the SAR, it shows the researchers' confidence in its abilities, and ipso facto, makes it better than the other extant remote sensing devices. Thus, statement I can be assumed from the passage.
Assumption II: Refer to the following quote in the fifth paragraph of the passage: "As polar bears are driven further inland by receding sea ice, denning areas and oil and gas activity increasingly overlap." Since polar bears keep getting driven inland as a result of receding sea ice, it is safe to conclude that global warming directly relates to their endangerment, since receding sea ice is caused by rising global temperatures.
Assumption III: Refer to the following quote in the last paragraph of the passage: "Getting reliable data on denning sites is vital." This directly negates the third assumption.
Thus, only assumptions I and II can be drawn from the passage, making option C the correct answer.
13. Ans. D.

Refer to the following quote from the seventh paragraph of the passage: "The aim is to find the right frequency, a sweet spot, that can penetrate snow but still detect a bear." This definitively negates the statement that the SAR is an
amplitude-based remote sensing technology.
Thus, option D is the correct answer. 14. Ans. C.

While options A, B, and D state aspects of the passage, which discusses the researchers utilising AI to save polar bears from extinction, SAR using a frequency-based system, and the impact of receding sea levels on polar bears (arctic fauna), none of the focuses on the main aspect of the passage. The main theme of the passage is the application of remote sensing in locating the denning patterns of polar bears, and attempting to understand the same for the better protection of the cubs. While all the other aspects branch out from it, the main discussion continues to be on the application of the AI to locate and protect polar bear cubs.
Thus, option C is the correct answer. 15. Ans. B.

The meanings of the given tones are: Caustic: sarcastic in a scathing and bitter way.
Assertive: having or showing a confident and forceful personality.
Deprecatory: expressing disapproval; disapproving.
Condescending: having or showing an attitude of patronizing superiority.
Informative: providing useful or interesting information.
Since the passage provides information about the use the SAR is being put to, the tone of the passage is informative.
Thus, option B is the correct answer.
16. Ans. A.

Option A is the correct filler for the blank since it maintains the tone of the paragraph by describing the cubs as 'weak and undeveloped', inkeeping with the adjective 'vulnerable' used for them earlier in the paragraph.
The paragraph describes the cubs in question as being dependent on the mother. As such, if the mother abandons the den, the chances of survival of the cubs is reduced, not increased. This negates option C as a possible filler for the blank. Similarly, since the denning period is described as 'critical', and the cubs are described as 'vulnerable', adjectives like 'strong' and 'well developed' becomes contradictory to the tone of the paragraph. This negates option $B$ as a possible filler as well.
17. Ans. D.
"Fortuitous" can best replace the word "serendipitous".
The meanings of the given words are: Fortuitous: happening or produced by chance; accidental.
Serendipitous: come upon or found by accident; fortuitous.
Innovative: using new methods or ideas.
Aperture: a small and often narrow opening, especially one that allows light into a camera.
Camouflage: the use of leaves, branches, paints, and clothes for hiding soldiers or military equipment so that they cannot be seen against the area around them.
Vulnerable: able to be easily physically, emotionally, or mentally hurt, influenced, or attacked.
Thus, option D is the correct answer. 18. Ans. C.

Option D says that the lava from the said eruption "paved over a number of sea creatures", which does not
make sense. The sentence should say that it resulted in the death of these creatures instead.
19. Ans. B.

Damage is never 'lucky'.
Miscredited means to credit or 'attribute to' wrongly. This doesn't fit the whole idea of the sentence.
Also, since the subject is of the feminine gender (woman) the respective possessive pronoun should also be of the same gender. It should be 'her' instead of 'his'.
Hence, option B is the correct answer. 20. Ans. D.
"By" is used to show the medium or the way something is done. It is followed by the continuous form of the verb in such a context. So, it should be 'attending', not 'attend'.
'For which' indicates the purpose of something. But, 'dance in couples or small groups' is not the purpose behind 'best way to feel the rhythm'. Hence, the preposition "in" should be used. Thus, the correct answer is option E.
21. Ans. B.

A: Descriptive clause (can breed in your intestine) start with 'that' and non-descriptive clause (means they can also share the nutrition \& fats of your food) start with 'which'. Here, "can breed in your intestine" is a necessary part, without which the sentence would appear incomplete. Hence it should take "that" before it. On the other hand, "means they can also share the nutrition \& fats of your food", is an extra information, and should take the non- restrictive "which". Option A is wrong.
C: Here the term "not so machines" renders the sentence incorrect. Option C is wrong.
D: 'one of' implies that 'one among many'. So, it should be 'exercises'. Also, but is wrongly issued here
because 'strengthen your arms and upper body' and 'give you a great physique' are two events that do not contradict each other. Option D is wrong.
E : "However" is used while providing contradicting information to a previously mentioned data. Here this contradicting information is provided after the main data that too I the same sentence itself. Hence this data should be introduced with 'though' or 'although'. So, option E is wrong. Hence, the correct answer is B.
22. Ans. A.

B: When we talk about a range, we talk about many elements in the given category. So, the category (human emotion) should be in plural. Farce means a comedy characterized by broad satire and improbable situations. The correct word should be 'face'. Option B is wrong.
C: Adele's mother is older than her. So, when the emphasis is put on the fact that Adele begun young, she definitely didn't start at her mother's age. Option C is wrong.
D: Overseeing means watch and direct. Overlooking means look past, fail to notice. Since, Adele wanted to make a career out of it, she didn't overlook artistic development. Option D is wrong.
E: 'Not only' is followed by 'but also' with a clause in between. Option E is wrong.
Hence, the correct answer is A.
23. Ans. E.

Option A: 'To' is a preposition. 'Too' is the correct word is to be used. 'Too' is an adverb which means to a higher degree than is desirable, permissible, or possible; excessively. Also, 'or' is wrongly used here. We want to use 'and' because we want to denote both flora and fauna. so, option A is wrong.

Option B: Replace 'build' with 'built'. 'Build' is the present tense of the verb and 'built' is the past and the past participle of build. Since the sentence talks about a completed action in a time before now, we need to use past form of the verb i.e. 'built'. So, option $B$ is wrong.
Option C: Since, 'hundred' is being used here as a noun here, its should be plural because the noun (corridors) is plural. So, option C is wrong.
Option D: 'Separates the Ladakh and Karakoram mountain ranges' is a descriptive clause and it lacks 'that'. So, option D is wrong.
Hence, the correct answer is E .
Note: 1) The idiomatic construction 'declared a (something)' is appropriate. 'As' when used in the role of a preposition refers to the function or character that someone or something has, which is inappropriate in this case.
2) 'Recently' is a relative expression which could be used to describe the occurrence of something a moment ago, a month ago, a decade ago. In the given case, the word has been used in comparison to the time when the caves were built/sculpted which can be assumed to have happened several decades ago. The year 1957, is relatively a recent period in comparison to that.
24. Ans. D.

The correct answer is D.
25. Ans. A.

Convert:

1. to (cause something or someone to) change in form or character.
2. to change to a new religion, belief, opinion, etc., or to make someone do this.
Change: to make or become different. This is a synonym of convert and has been aptly used in sentence 1 .

Apostate: someone who has given up their religion or left a political party. This is an antonym of convert and has been aptly used in the second sentence.
Translate: to change words into a different language. This is a synonym of convert and is contextually incorrect in sentence 3. It is best replaced by the word 'conversation', meaning talk between two or more people in which thoughts, feelings, and ideas are expressed, questions are asked and answered, or news and information is exchanged.
Thus, option A is the correct answer. 26. Ans. B.

Remedial: improve someone's health when they are ill.
Therapeutic: having a healing effect; tending to make a person healthier.
This is a synonym of remedial and has been aptly used in sentence 1 .
Palliative: a drug or medical treatment that reduces pain. This is a synonym of remedial and has been aptly used in sentence 2.
Restorative: something that makes you feel better or more energetic if you are feeling tired or ill. This is a synonym of remedial and has been incorrectly used in sentence 3. A more appropriate word for the context of the sentence will be restive, meaning unwilling to be controlled or be patient.
Thus, option B is the correct answer. 27. Ans. D.

The term abscond means: leave hurriedly and secretly, typically to escape from custody or avoid arrest
Bolt means: move or run away suddenly in an attempt to escape.
Escape means: break free from confinement or control.

Thus, only I and III are synonymous to abscond. Thus, option $D$ is the correct answer.
28. Ans. A.

The term adamant means: very sure; refusing to change your mind.
Resolved means: to decide something and be determined not to change your mind.
The rest of the words highlighted is not connected to the word adamant. Thus, option A is the correct answer. 29. Ans. E.

The passage is about plague and how it has developed over ages. However, statement A talks about two books getting published. Thus, statement A is not part of the passage. Thus option $E$ is the correct answer.
30. Ans. B.

The article 'the' indicates the part 1 is the first part of the sentence. This makes option $A$ and option $B$ the probable answer. Now you can litter something with something. Here, history being littered with diseases like confetti.
However, if we look at option B, the sentence makes sense. Option B is the correct choice.
31. Ans. D.

The correct choice is option D. It was after studying the events only the health experts were able to plagues were a result of intrusion. Part 4 should begin the sentence. The only option with part 4 is option D.
32. Ans. A.

First of all, let us identify the sentence which is not as per the passage. The passage is about plague and how it has developed over ages. However, statement A talks about two books getting published. Thus, statement A is not part of the passage.
The first part of the passage is Part C. It introduces the topic of the passage, the pandemic over history. This is
followed by part E, which talks about the records of pandemic which is recorded in the human history. Part E and Part $F$ forms a pair. This is because if part $E$ introduces the events, in part $F$ states on of the supposed cause of these events. Part $F$ is followed by part $B$, as it contradicts the explanation given in part F. It states that if part F claims human intrusion in natural spaces cause pandemics, then part B argues that humans have been living with nature from time immemorial. Explaining part B, part D states that diseases which caused pandemics, like humans, have evolved to adapt to humanity over time.
Thus, the correct sequence is CEFBD. This makes option A the correct option.
33. Ans. D.

First of all, let us identify the sentence which is not as per the passage. The passage is about plague and how it has developed over ages. However, statement A talks about two books getting published. Thus, statement A is not part of the passage.
The first part of the passage is Part C. It introduces the topic of the passage, the pandemic over history. This is followed by part E, which talks about the records of pandemic which is recorded in the human history. Part E and Part $F$ forms a pair. This is because if part $E$ introduces the events, in part $F$ states on of the supposed cause of these events. Part $F$ is followed by part $B$, as it contradicts the explanation given in part F. It states that if part F claims human intrusion in natural spaces cause pandemics, then part B argues that humans have been living with nature from time immemorial. Explaining part B, part D states that diseases which caused pandemics,
like humans, have evolved to adapt to humanity over time.
Thus, the correct sequence is CEFBD. This makes option $D$ the correct option.
34. Ans. A.

The mistakes in the sentence highlighted in part D is that 'broken' is a verb and we need an adverb to qualify the verb. 'Fresh' is an adjective and in order to make the sentence correct, we need to replace it with 'freshly'. Option A is the correct answer.
35. Ans. A.

## Convert:

1. to (cause something or someone to) change in form or character.
2. to change to a new religion, belief, opinion, etc., or to make someone do this.
Change: to make or become different.
This is a synonym of convert and has been aptly used in sentence 1 .
Apostate: someone who has given up their religion or left a political party.
This is an antonym of convert and has been aptly used in the second sentence.
Translate: to change words into a different language. This is a synonym of convert and is contextually incorrect in sentence 3. It is best replaced by the word 'conversation', meaning talk between two or more people in which thoughts, feelings, and ideas are expressed, questions are asked and answered, or news and information is exchanged.
Thus, option A is the correct answer. 36. Ans. B.

Remedial: improve someone's health when they are ill.
Therapeutic: having a healing effect; tending to make a person healthier. This is a synonym of remedial and has been aptly used in sentence 1 .

Palliative: a drug or medical treatment that reduces pain. This is a synonym of remedial and has been aptly used in sentence 2.
Restorative: something that makes you feel better or more energetic if you are feeling tired or ill. This is a synonym of remedial and has been incorrectly used in sentence 3 . A more appropriate word for the context of the sentence will be restive, meaning unwilling to be controlled or be patient.
Thus, option B is the correct answer. 37. Ans. C.

Note that the word ludicrous means very silly and aristocrat means a member of the highest social class, often with a special title. The sentence aims to make a sarcasm here so the correct pair would be ludicrous, aristocrats.
38. Ans. C.

Note that Intrepid means - without any fear of danger. As we need a positive adjective to describe the voice, Intrepid and Plucky qualify, but looking at the second blank, needs some word to describe great and complete. As the digital architecture cannot be lament, it can be radical though. So, the correct option is C.
39. Ans. A.

Determine:
a. (v.) to discover the facts or truth about something. (The past form of the verb 'determine' is 'determined') This meaning fits into the first blank, indicating that the scholars discovered the rationale behind the country's propagandising in the course of their research.
b. (adj.) wanting to do something very much and not allowing anyone or any difficulties to stop you. This fits in the second blank to qualify the noun 'elite' and provide a reason for the successful propagandising.

Lettered: A learned person has studied for a long time and has a lot of knowledge. While this fits into the second blank, it does not fit in the first.
Grave: A serious situation or person. While the meaning fits into the second blank, this word cannot be used as a filler for the first blank.
Read: to look at words or symbols and understand what they mean. While this meaning fits in the first blank, it cannot be used as a filler for the second blank, unless preceded with the adverb 'well'.
Thus, option A is the correct answer. 40. Ans. C.

Wound: to hurt the feelings of someone; upset. In this sense, 'wound' fits in the first blank to denote the damages caused by the white people.
Wound up: very worried, nervous, or angry.
In this sense, the word 'wound' fits perfectly in the second blank, which is followed by the preposition 'up', to complete the phrase 'wound up', expressing the anxiety of the white people at being slowly replaced.
Damage: cause harm. This makes it an appropriate filler for the first blank only.
Bruises: Injuries. In this sense, it fits in the first blank, but not in the second.
Triggered: Agitated. While it may seem appropriate for the second blank, the preposition 'up' following the blank will make it contextually incorrect.
Thus, option C is the correct answer. 41. Ans. A.

Given that the difference of the total number of employees (male and female) working in companies $A$ and $B=21$

So, total number of employees (male and female) working in all the given 5
companies $=\frac{21}{(18-15)} \times 100=700$ Number of employees (male and female) working in the company A
$=\frac{15}{100} \times 700=105$
So, number of male employees
working in the company $A=38 \frac{2}{21} \%$ of
$105=\frac{800}{2100} \times 105=40$
Total number of male employees working in all the given 5 companies $=\frac{40}{10} \times 100=400$
The central angle of total number of male employees working in company
$A=\frac{10}{100} \times 360^{\circ}=36^{\circ}$
42. Ans. E.

Given that the difference of the total number of employees (male and female) working in companies $A$ and $B=21$
So, total number of employees (male and female) working in all the given 5
companies $=\frac{21}{(18-15)} \times 100=700$
Number of employees (male and
female) working in the company A
$=\frac{15}{100} \times 700=105$
So, number of male employees
working in the company $A=38 \frac{2}{21} \%$ of $105=\frac{800}{2100} \times 105=40$
Total number of male employees working in all the given 5 companies $=\frac{40}{10} \times 100=400$
Required average $=\frac{700-400}{5}=60$
43. Ans. A.

Given that the difference of the total number of employees (male and
female) working in companies $A$ and B $=21$
So, total number of employees (male and female) working in all the given 5 companies $=\frac{21}{(18-15)} \times 100=700$ Number of employees (male and female) working in the company $A$
$=\frac{15}{100} \times 700=105$
So, number of male employees working in the company $\mathrm{A}=38 \frac{2}{21} \%$ of $105=\frac{800}{2100} \times 105=40$
Total number of male employees working in all the given 5 companies $=\frac{40}{10} \times 100=400$
The ratio of number of female employees working in companies $C$ and E
$=\left(\frac{24}{100} \times 700-\frac{24}{100} \times 400\right):\left(\frac{10}{100} \times 700\right.$ 15
$-100 \times 400)$
$=(168-96):(70-60)=72: 10=$ 36: 5
44. Ans. D.

Given that the difference of the total number of employees (male and female) working in companies $A$ and $B=21$
So, total number of employees (male and female) working in all the given 5
companies $=\frac{21}{(18-15)} \times 100=700$
Number of employees (male and female) working in the company A
$=\frac{15}{100} \times 700=105$
So, number of male employees working in the company $\mathrm{A}=38 \frac{2}{21} \%$ of $105=\frac{800}{2100} \times 105=40$

Total number of male employees working in all the given 5 companies 40
$=10 \times 100=400$
The number of female employees working in company $B=\frac{18}{100} \times 700-$ $\underline{26}$
$100 \times 400$
$=126-104=22$
The number of male employees working in company $D=\frac{25}{100} \times 400=$ 100
Hence, the required percentage = $\frac{100-22}{100}=78 \%$
45. Ans. D.

Given that the difference of the total number of employees (male and female) working in companies $A$ and $B=21$
So, total number of employees (male and female) working in all the given 5 companies $=\frac{21}{(18-15)} \times 100=700$ Number of employees (male and female) working in the company A
$=\frac{15}{100} \times 700=105$
So, number of male employees working in the company $A=38 \frac{2}{21} \%$ of $105=\frac{800}{2100} \times 105=40$
Total number of male employees working in all the given 5 companies $\xrightarrow{40}$
$=10 \times 100=400$
The number of female employees working in company $A=\frac{15}{100} \times 700-$ 10
$100 \times 400$
$=105-40=65$

The number of female employees working in company $D=\frac{33}{100} \times 700-$ 25
$100 \times 400$
$=231-100=131$
Hence, the required difference $=131$
$-65=66$
46. Ans. C.

Given that the difference of the total number of employees (male and female) working in companies $A$ and B $=21$
So, total number of employees (male and female) working in all the given 5 companies $=\frac{21}{(18-15)} \times 100=700$
Number of employees (male and female) working in the company $A$
$=\frac{15}{100} \times 700=105$
So, number of male employees working in the company $\mathrm{A}=38 \frac{2}{21} \%$ of

$$
105=\frac{800}{2100} \times 105=40
$$

Total number of male employees working in all the given 5 companies $=\frac{4 \mathrm{u}}{10} \times 100=400$
The number of post graduate male employees working in company C

$$
=18.75 \% \text { of } \frac{24}{100} \times 400=\frac{3}{16} \times 96=18
$$

The number of post graduate female employees working in company C
$=12.5 \%$ of $\left.\frac{24}{(100} \times 700-\frac{24}{100} \times 400\right)=$ 1
$8 \times 72=9$
Hence, the total number of post graduate employees working in the company $\mathrm{C}=18+9=27$
47. Ans. C.

Let the number of girls who were not present in the class be $3 x$.
The number of boys who were not present in the class $=3 x-4$

The number of girls who were present $=3 x x^{\frac{5}{3}}=5 x$
The number of boys who were present $=40$
According to the data provided in the question, we get:
$3 x+3 x-4+5 x+40=80$
$\Rightarrow 11 x=44$
$\Rightarrow x=4$
The total number of girls in the class $=8 \times 4=32$

## 48. Ans. C.

Let the number of females in village $X$ be a.
The number of females in village $\mathrm{Y}=$ a
The number of males in village $X=b$ The number of males in village $Y=$ 0.75 b

According to the data provided in the question, we get:
$a \times 0.50+b \times 1.50=0.75 b+a$
$\Rightarrow 0.50 a+1.5 b=0.75 b+a$
$\Rightarrow 0.50 \mathrm{a}=0.75 \mathrm{~b}$
$\Rightarrow 2 \mathrm{a}=3 \mathrm{~b}$
$\Rightarrow \mathrm{a}=1.5 \mathrm{~b}$.
Total population in village $\mathrm{X}=\mathrm{a}+\mathrm{b}$ $=1.5 \mathrm{~b}+\mathrm{b}=2.5 \mathrm{~b}$ (From equation 1) Total population in village $\mathrm{Y}=\mathrm{a}+$ $0.75 b=1.5 b+0.75 b=2.25 b$
Required ratio $=2.5 \mathrm{~b}: 2.25 \mathrm{~b}=10$ : 9
49. Ans. D.

According to the data provided in the question, we get:
$(160-X)=3 X$
$\Rightarrow 160=4 X$
$\Rightarrow X=40$
The quantity of milk in the container $=160-40=120$ litres
The quantity of water in the container $=40$ litres
Ratio of the milk to water in the container $=120: 40=3: 1$
The quantity of milk that is taken out $=\frac{3}{4} \times 20=15$ litres

The quantity of water that is taken out $=\frac{1}{4} \times 20=5$ litres
Quantity of the water in the final mixture $=40-5+20=55$ litres 50. Ans. A.

Let the cost price of the article be Rs. 100 y .
Marked price of the article = Rs. 100 y $\times \frac{100+X}{100}$
Selling price of the article $=$ Rs. $100 y$ $\times \frac{100+\mathrm{X}}{100} \times \frac{100-0.5 \mathrm{X}}{100}$
Because the profit percentage is $8 \%$, so the selling price of the article $=$ Rs.
$100 y \times 1.08=108 y$
According to the data provided in the question, we get:
$100 \mathrm{Y} \times \frac{100+\mathrm{X}}{100} \times \frac{100-0.5 \mathrm{X}}{100}=108 \mathrm{Y}$
$\Rightarrow(100+X) \times(100-0.5 X)=10800$
$\Rightarrow 10000-50 X+100 X-0.5 X^{2}=$
10800
$\Rightarrow 0.5 X^{2}-50 X+800=0$
$\Rightarrow X^{2}-100 X+1600=0$
$\Rightarrow X^{2}-20 X-80 X+1600=0$
$\Rightarrow X(X-20)-80(X-20)=0$
$\Rightarrow(X-20)(X-80)=0$
$\Rightarrow X=20,80$
Hence, the value of $X=80$
51. Ans. C.

Let the sum that he invest on compound interest be Rs. $x$.
$6337.44=x\left(1+\frac{20}{100}\right)^{2}$
$\Rightarrow 6337.44=x \times\left(\frac{6}{5}\right)^{2}$
$\Rightarrow x=4401$
Interest received on Rs. 9780 after 3 years is Rs. 4401.
According to the data provided in the question, we get:
$4401=9780 \times \frac{\mathrm{R}}{100} \times 3$
$\Rightarrow \mathrm{R}=15$
52. Ans. B.

Let 60 men can complete the work be $x$ days.
According to the data provided in the question, we get:
$60 \times x=40 \times(x+12)$
$\Rightarrow 60 x=40 x+480$
$\Rightarrow 20 x=480$
$\Rightarrow x=24$
Let 18 men can complete the work in y days.
According to the data provided in the question, we get:
$\frac{60 \times 24}{1}=\frac{18 \times y}{\frac{3}{5}}$
$\Rightarrow 60 \times 24=30 y$
$\Rightarrow y=48$
53. Ans. A.

Let the odd numbers $=a, a+2, a+$ 4

Sum of odd numbers $=a+a+2+a$ $+4=3 a+6$
The even numbers $=b, b+2, b+4$
Sum of even numbers $=b+b+2+$
$b+4=3 b+6$
Statement I:
$a+2-(b+2)=7$
$\Rightarrow \mathrm{a}-\mathrm{b}=7$
Required difference $=3 a+6-(3 b+$
6) $=3 a-3 b$
$=3(a-b)=3 \times 7=21$
Statement I alone is sufficient to answer the question.
Statement II:
$a+b+4=57$
$\Rightarrow a+b=53$
Statement II alone is not sufficient to answer the question.
54. Ans. B.

Students passed in English $=100$ 52 = 48\%
Students passed in Mathematics = $100-42=58 \%$
Statement I:
Students passed in English $=100$ $52=48 \%$
Statement I alone is not sufficient to answer the question.

Statement II:
Students passed in both English and Mathematics $=58-25=33 \%$
Statement II alone is sufficient to answer the question.
55. Ans. E.

Let the side of the square be a m .
Statement I:
Width of path around the square field $=2 \mathrm{~m}$
Statement I alone is not sufficient to answer the question.
Statement II:
Total area of the path $=136 \mathrm{~m}^{2}$
Statement I alone is not sufficient to answer the question.
Both statement I and statement II:
$(a+4)^{2}-a^{2}=136$
$\Rightarrow a^{2}+16+2 a-a^{2}=136$
$\Rightarrow 2 \mathrm{a}=120$
$\Rightarrow a=60 \mathrm{~m}$
Area of the square field $=60^{2}=3600$ $\mathrm{m}^{2}$
Both statement I and statement II together are necessary to answer the question.
56. Ans. D.

Let the monthly income of Ananya be Rs. $5 x$.
Monthly income of Shaila $=$ Rs. $6 x$
Monthly saving of Ananya = Rs. $2 y$
Monthly saving of Shaila = Rs. $3 y$
Statement I:
$\frac{5 x}{2 y}=\frac{5}{2}$
$\Rightarrow x=y$
Statement I alone is not sufficient to answer the question.
Statement II:
$5 x-2 y=6 x-3 y$
$\Rightarrow x=y$
Statement I alone is not sufficient to answer the question.
Both statement I and II:
In both the statements, same equation came.
Both Statements I and II together are not sufficient to answer the question.
57. Ans. B.
$x^{2}-\frac{23 x^{2}}{\sqrt{46 x^{2}+54 x^{2}}}+\mathrm{k}=0$
$\Rightarrow x^{2}-\frac{23 x^{2}}{\sqrt{100 x^{2}}}+k=0$
$\Rightarrow x^{2}-\frac{23 x^{2}}{10 \mathrm{x}}+\mathrm{k}=0$
$\Rightarrow x^{2}-\frac{23 x}{10}+k=0$
Let the roots of the equations be a and $b$.
And $\mathrm{a}=\frac{3}{2}$
$a+b=\frac{23}{10}$
$\Rightarrow \frac{3}{2}+\mathrm{b}=\frac{23}{10}$
$\Rightarrow b=\frac{8}{10}$ or $\frac{4}{5}$
Other root $=\frac{4}{5}$
58. Ans. C.
a. $10 x^{2}-x-3=0$
$\Rightarrow 10 x^{2}-6 x+5 x-3=0$
$\Rightarrow 2 x(5 x-3)+1(5 x-3)=0$
$\Rightarrow(5 x-3)(2 x+1)=0$
$\Rightarrow x=\frac{3}{5}, \frac{1}{2}$ or 0.6, -0.5
b. $4 y^{2}+8 y-5=0$
$\Rightarrow 4 y^{2}+10 y-2 y-5=0$
$\Rightarrow 2 y(2 y+5)-1(2 y+5)=0$
$\Rightarrow(2 y+5)(2 y-1)=0$
$\Rightarrow y=-\frac{5}{2}, \frac{1}{2}$ or $-2.5,0.5$
c. $2 z^{2}+9 z-35=0$
$\Rightarrow 2 z^{2}+14 z-5 z-35=0$
$\Rightarrow 2 z(z+7)-5(z+7)=0$
$\Rightarrow(z+7)(2 z-5)=0$
$\Rightarrow z=-7, \frac{5}{2}$ or $-7,2.5$
Option A. b-d
$y=-\frac{5}{2}, \frac{1}{2}$ or $-2.5,0.5$
50 times of largest root value is divisible by 6 .
$\times 50=25$ (This is not divisible by 6 ).

Option B. c-e
$z=-7, \frac{5}{2}$ or $-7,2.5$
Condition (e): Product of both root value is between -1 and -2
$-7 \times 2.5=-17.5$ (This is not satisfying the condition).
Option C. a-d
$x=\frac{3}{5},-\frac{1}{2}$ or $0.6,-0.5$
Condition (d): 50 times of largest root value is divisible by 6 .
$\times 50=30$ (This is divisible by 6 ).
59. Ans. B.
a. $10 x^{2}-x-3=0$
$\Rightarrow 10 x^{2}-6 x+5 x-3=0$
$\Rightarrow 2 x(5 x-3)+1(5 x-3)=0$
$\Rightarrow(5 x-3)(2 x+1)=0$
$\Rightarrow x=\frac{3}{5},-\frac{1}{2}$ or 0.6, -0.5
b. $4 y^{2}+8 y-5=0$
$\Rightarrow 4 y^{2}+10 y-2 y-5=0$
$\Rightarrow 2 y(2 y+5)-1(2 y+5)=0$
$\Rightarrow(2 y+5)(2 y-1)=0$
$\Rightarrow y=-\frac{5}{2}, \frac{1}{2}$ or $-2.5,0.5$
c. $2 z^{2}+9 z-35=0$
$\Rightarrow 2 z^{2}+14 z-5 z-35=0$
$\Rightarrow 2 z(z+7)-5(z+7)=0$
$\Rightarrow(z+7)(2 z-5)=0$
$\Rightarrow z=-7, \frac{5}{2}$ or $-7,2.5$
Option A. b-f
$y=-\frac{5}{2}, \frac{1}{2}$ or $-2.5,0.5$
Condition (f): Sum of both root value will be positive value.
$-2.5+0.5=-2$ (This is not satisfying the condition).
Option B. b-e

$$
y=-\frac{5}{2}, \frac{1}{2} \text { or }-2.5,0.5
$$

Condition (e): Product of both root value is between -1 and -2 .
$-2.5 \times 0.5=-1.25(-1.25$ is lies between -1 and -2 )
60. Ans. C.

By approximation, we get:
$(1214+2312-826)$

$$
\times 2=?+100
$$

2700
$\Rightarrow 6 \times 2=?+100$
$\Rightarrow 900-100=$ ?
$\Rightarrow$ ? $=800$
61. Ans. D.

By approximation, we get:
$(16)^{2}+(11)^{2}-(10)^{2}=?+124$
$\Rightarrow 256+121-100-124=$ ?
$\Rightarrow$ ? $=153$
62. Ans. B.

By approximation, we get:
$75 \%$ of $720-?^{2}-40 \%$ of $250=$ $\sqrt{1369}$
$\Rightarrow 540-100-37=?^{2}$
$\Rightarrow ?^{2}=403$
$\Rightarrow$ ? $=20$
Hence, option B is correct.
63. Ans. A.

By approximation, we get:
$?=\frac{\frac{40 \times 15}{12}}{}+24-5 \times 32$
$40 \times 15$
$=12+24-5 \times 32$
$=50+24-160$
$=-86$
64. Ans. C.

By approximation, we get:
$60 \%$ of $640-?^{3}=84 \%$ of $250-169$
$\Rightarrow 384-?^{3}=210-169$
$\Rightarrow ?^{3}=343$
$\Rightarrow$ ? = 7
65. Ans. C.

Let the present age of Prashant be x years.
Then, the present age of Anmol $=(x$ $+5)$ years
According to the data provided in the question, we get:
$\frac{x+5-5}{x+4}=\frac{4}{5}$
$\Rightarrow 5 x=4 x+16$
$\Rightarrow x=16$
Present age of Prashant $=16$ years
Present age of Anmol $=16+5=21$ years

Present age of Keshav $=21+4=25$ years
Required percentage = $\frac{25-16}{16} \times 100=56.25 \%$
66. Ans. C.

Cost price of the mixture $=$ $\frac{309}{120} \times 100$

22.5 : 17.5

According to the data provided in the question, we get:
$\frac{22.5}{17.5}=\frac{X}{X-12}$
$\Rightarrow 9(X-12)=7 X$
$\Rightarrow 9 X-7 X=108$
$\Rightarrow X=54$
67. Ans. D.

According to the data provided in the question, we get:
$\frac{24000 \times 12}{40000 \times(12-x)}=\frac{4}{5}$
$\Rightarrow 9=12-x$
$\Rightarrow x=3$
Hence, time after which Q withdraw the amount $=3+4=7$ months
68. Ans. B.

Let the cost price of each bottle be Rs. x.

Cost price of both the bottles $=$ Rs. $2 x$
Selling price of both the bottles $=2 x$ $\times 110 \%=$ Rs. $2.2 x$
Selling price of the first bottle $=125 \%$ of $x=$ Rs. $1.25 x$
Selling price of the second bottle $=$ Rs. (1.25x - 2160)
According to the data provided in the question, we get:
$1.25 x+1.25 x-2160=2.2 x$
$\Rightarrow 2.5 \mathrm{x}-2.2 \mathrm{x}=2160$
$\Rightarrow \mathrm{x}=7200$
Cost price of the each bottle $=$ Rs. 7200
69. Ans. A.

The quantity of water in the mixture $=\frac{765}{17} \times 10=450$ litres
The quantity of milk in the mixture $=$ $\frac{765}{17} \times 7$ $=315$ litres
The quantity of the mixture that is taken out $=765 \times 0.20=153$ litres According to the data provided in the question, we get:
$\frac{450-153 \times \frac{10}{17}+2 X}{315-153 \times \frac{7}{17}+3 X-32}=\frac{6}{5}$
$\Rightarrow \frac{450-90+2 X}{315-63+3 X-32}=\frac{6}{5}$
$\Rightarrow 5(360+2 X)=6(220+3 X)$
$\Rightarrow 1800+10 X=1320+18 X$
$\Rightarrow 8 \mathrm{X}=480$
$\Rightarrow X=60$
Quantity of milk in the final mixture $=$
$450-90+120=480$ litres
Quantity of water in the final mixture $=315-63+148=400$ litres
Required difference $=480-400=80$ litres
70. Ans. D.

Let the number of currency notes of each denomination with $P$ be $x$.
According to the data provided in the question, we get
$50 x+20 x+10 x=1120$
$\Rightarrow 80 x=1120$
$\Rightarrow x=14$
The number of currency notes of each denominations that with $P=14$
Let the number of currency notes of each denomination with Q be y .
According to the data provided in the question, we get
$100 y+20 y+5 y=3250$
$\Rightarrow 125 y=3250$
$\Rightarrow y=26$

The number of currency notes of each denominations with $\mathrm{Q}=26$
Let the number of currency notes of each denomination with $R$ be $z$.
According to the data provided in the question, we get
$200 z+50 z+20 z=5400$
$\Rightarrow 270 z=5400$
$\Rightarrow z=20$
The number of currency notes of each denominations with $\mathrm{R}=20$
Let the number of currency notes of each denomination with $S$ be $s$.
Total amount that $S$ has $=20 s+10 s$ $+5 \mathrm{~s}=$ Rs. 35 s
Let the number of currency notes of each denomination with $T$ be a.
According to the data provided in the question, we get
$500 a+20 a+10 a=3710$
$\Rightarrow 530 \mathrm{a}=3710$
$\Rightarrow \mathrm{a}=7$
The number notes of each denomination with $\mathrm{T}=7$
Required answer $=14-7=7$
Hence, option D is correct.
71. Ans. C.

Let the number of currency notes of each denomination with $P$ be $x$.
According to the data provided in the question, we get
$50 x+20 x+10 x=1120$
$\Rightarrow 80 x=1120$
$\Rightarrow x=14$
The number of currency notes of each denominations that with $P=14$
Let the number of currency notes of each denomination with Q be y .
According to the data provided in the question, we get
$100 y+20 y+5 y=3250$
$\Rightarrow 125 y=3250$
$\Rightarrow y=26$
The number of currency notes of each denominations with $\mathrm{Q}=26$
Let the number of currency notes of each denomination with $R$ be $z$.

According to the data provided in the question, we get
$200 z+50 z+20 z=5400$
$\Rightarrow 270 \mathrm{z}=5400$
$\Rightarrow z=20$
The number of currency notes of each denominations with $\mathrm{R}=20$
Let the number of currency notes of each denomination with $S$ be s.
Total amount that $S$ has $=20 s+10 s$ $+5 \mathrm{~s}=$ Rs. 35 s
The prime numbers that lies between 20 to 30 are 23 and 29 .
Case I: Number of currency notes of each denomination with $\mathrm{T}=29$
According to the data provided in the question, we get
Total amount with $\mathrm{S}=35 \times 29=$ Rs. 1015
This is not possible because the amount should be less than Rs. 1000.
Case II: Number of currency notes of each denomination with $T=23$
According to the data provided in the question, we get
Total amount that S has $=35 \times 23=$ Rs. 805
So, the total number notes of all denominations with $S=23 \times 3=69$ Hence, option C is correct.
72. Ans. A.

Let the number of currency notes of each denomination with $P$ be $x$.
According to the data provided in the question, we get
$50 x+20 x+10 x=1120$
$\Rightarrow 80 x=1120$
$\Rightarrow x=14$
The number of currency notes of each denominations that with $P=14$
Let the number of currency notes of each denomination with Q be y .
According to the data provided in the question, we get
$100 y+20 y+5 y=3250$
$\Rightarrow 125 y=3250$
$\Rightarrow y=26$

The number of currency notes of each denominations with $\mathrm{Q}=26$
Let the number of currency notes of each denomination with $R$ be $z$.
According to the data provided in the question, we get
$200 z+50 z+20 z=5400$
$\Rightarrow 270 z=5400$
$\Rightarrow z=20$
The number of currency notes of each denominations with $\mathrm{R}=20$
Let the number of currency notes of each denomination with $S$ be $s$.
Total amount that S has $=20 \mathrm{~s}+10 \mathrm{~s}$ $+5 \mathrm{~s}=$ Rs. 35 s
Required difference $=26-14=12$
Hence, option A is correct.

## 73. Ans. B.

Let the number of currency notes of each denomination with $P$ be $x$.
According to the data provided in the question, we get
$50 x+20 x+10 x=1120$
$\Rightarrow 80 x=1120$
$\Rightarrow \mathrm{x}=14$
The number of currency notes of each denominations that with $P=14$
Let the number of currency notes of each denomination with $Q$ be $y$.
According to the data provided in the question, we get
$100 y+20 y+5 y=3250$
$\Rightarrow 125 y=3250$
$\Rightarrow y=26$
The number of currency notes of each denominations with $\mathrm{Q}=26$
Let the number of currency notes of each denomination with R be z .
According to the data provided in the question, we get
$200 z+50 z+20 z=5400$
$\Rightarrow 270 z=5400$
$\Rightarrow z=20$
The number of currency notes of each denominations with $\mathrm{R}=20$
Let the number of currency notes of each denomination with $S$ be $s$.

Total amount that $S$ has $=20 \mathrm{~s}+10 \mathrm{~s}$ $+5 \mathrm{~s}=$ Rs. 35 s
Total amount that A has $=$ $\frac{3250+5400}{2}+25=$ Rs. 4350
Number of possible notes of Rs. 2000
$=2$
Number of possible notes of Rs. 200 = 1
Remaining amount $=4350-(2 \times$ $2000+1 \times 200)=$ Rs. 150
Number of possible notes of Rs. $50=$ $\frac{150}{50}=3$
Hence, option B is correct.
74. Ans. C.

Total distance travelled by car $B=50$ $\times 7 \frac{12}{60}=360 \mathrm{~km}$
Total distance travelled by car $\mathrm{A}=$ $360 \times(100-16.66) \%=300 \mathrm{~km}$
Speed of car $A=\frac{300}{6}=50 \mathrm{~km} / \mathrm{h}$
Speed of car $C=50 \times 2=100 \mathrm{~km} / \mathrm{h}$
Time taken by car C to travel 400 km
$=\frac{\frac{400}{100}}{100} 4$ hours

| Car | Speed | Distance | Time |
| :---: | :---: | :---: | :---: |
| A | $50 \mathrm{~km} / \mathrm{h}$ | 300 km | 6 hours |
| B | $50 \mathrm{~km} / \mathrm{h}$ | 360 km | 7 hours 12 minutes |
| $\mathbf{C}$ | $100 \mathrm{~km} / \mathrm{h}$ | 400 km | 4 hours |

New speed of car $A=(50-2)=48$ km/h
New speed of car B $=50 \times 110 \%=$ 55 km/h
Required difference $=(55-48) \times 4$ $=28 \mathrm{~km}$
Hence, option C is correct.
75. Ans. B.

Total distance travelled by car $\mathrm{B}=50$ $\times 7 \frac{12}{60}=360 \mathrm{~km}$
Total distance travelled by car $\mathrm{A}=$ $360 \times(100-16.66) \%=300 \mathrm{~km}$
Speed of car $A=\frac{300}{6}=50 \mathrm{~km} / \mathrm{h}$
Speed of car C $=50 \times 2=100 \mathrm{~km} / \mathrm{h}$
Time taken by car C to travel 400 km $=\frac{\frac{400}{100}}{}=4$ hours

| Car | Speed | Distance | Time |
| :---: | :---: | :---: | :---: |
| A | $50 \mathrm{~km} / \mathrm{h}$ | 300 km | 6 hours |
| B | $50 \mathrm{~km} / \mathrm{h}$ | 360 km | 7 hours 12 minutes |
| C | $100 \mathrm{~km} / \mathrm{h}$ | 400 km | 4 hours |

Distance travelled by car D $=300 \times$ $140 \%=420 \mathrm{~km}$
Speed of car $D=\frac{420}{10}=42 \mathrm{~km} / \mathrm{h}$
Hence, option B is correct.
76. Ans. B.

345
Speed of the train $A=23=15 \mathrm{~m} / \mathrm{s}$ New speed of train $A=15 \times 1.50=$ $22.5 \mathrm{~m} / \mathrm{s}$
Let the length of the platform be x m. According to the data provided in the question, we get:
$22.5=\frac{345+\mathrm{x}}{24}$
$\Rightarrow 540=345+x$
$\Rightarrow x=195$
Required ratio $=345: 195=23: 13$ 77. Ans. D.

Let the speed of the boat be $7 x \mathrm{~km} / \mathrm{h}$. Then, the speed of the stream $=2 x$ km/h
According to the data provided in the question, we get:
$\frac{450}{7 x-2 x}-\frac{450}{7 x+2 x}=20$
$\Rightarrow \frac{90}{x}-\frac{50}{x}=20$
$\Rightarrow 40=20 x$
$\Rightarrow x=2$
Speed of the boat in still water $=7 \times$ $2=14 \mathrm{~km} / \mathrm{h}$
Speed of the stream $=2 \times 2=4 \mathrm{~km} / \mathrm{h}$ Speed of the boat in upstream $=14-$ $4=10 \mathrm{~km} / \mathrm{h}$
Speed of the boat in downstream = $14+4=18 \mathrm{~km} / \mathrm{h}$
Required difference $=18-10=8$ km/h
78. Ans. C.

Let the sum be Rs. x.
According to the data provided in the question, we get:
$x\left(1+\frac{10}{100}\right)^{2}-x=$
$\frac{x \times 1 \times 12 \times 2}{3 \times 100}+\frac{x \times 2 \times R \times 2}{3 \times 100}$
$\Rightarrow \frac{21 \mathrm{x}}{100}=\frac{2 \mathrm{x}}{25}+\frac{\mathrm{Rx}}{75}$
$\Rightarrow \frac{21}{100}=\frac{6}{75}+\frac{R}{75}$
$\Rightarrow 75 \times 21=600+100 R$
$\Rightarrow 1575-600=100 R$
$\Rightarrow 100 \mathrm{R}=975$
$\Rightarrow R=9.75$
79. Ans. D.

Let the total work be 120 units. (LCM of 24 and 40)
Amount of the work done by Manan in
one day $=\frac{\frac{120}{24}}{24}=5$ units
Amount of the work done by Komal in one day $=\frac{\frac{120}{40}}{40}=3$ units
Amount of the work done by Manan and Komal together in 8 days $=8 \times 8$ $=64$ units
Remaining amount of the work $=120$
$-64=56$ units
Time taken by Akshay to done 56 units of work $=7$ days
Amount of the work done by Komal in one day $=\frac{\frac{56}{7}}{}=8$ units
Ratio of the efficiencies of Manan,
Komal and Akshay $=5: 3: 8$
Share of Manan $=\frac{5}{16} \times 2400=$ Rs. 750
Share of Komal $=\frac{3}{16} \times 2400=$ Rs. 450
Share of Akshay $=\frac{8}{16} \times 2400=$ Rs. 1200
80. Ans. A.

Gun B:
Total number of bullets fired $=900$
Number of bullets that hit the target
$=900 \times 33.33 \%=300$

Number of bullets that missed the target $=900-300=600$
Gun A:
Number of bullets that hit the target $=300 \times 80 \%=240$
Total number of bullets fired $=$ $\frac{240}{30} \times 100=800$
Number of bullets missed the target
$=800-240=560$
Gun C:
Number of bullets missed the target $=800 \times(100-6.25) \%=750$
Number of bullets hit the target $=450$
Total number of bullets fired $=750+$ $450=1200$

| Guns | Total <br> number of <br> bullets fired | Number of <br> bullets that hit <br> the target | Number of bullets <br> that missed the <br> target |
| :---: | :---: | :---: | :---: |
| A | 800 | 240 | 560 |
| B | 900 | 300 | 600 |
| C | 1200 | 450 | 750 |

The bullets fired by Gun C would make an Arithmetic progression with first term 0(for bullet fired at 12:30 pm ) and the common difference would be 7 for rest of the terms.
As, the number of seconds from $12: 30 \mathrm{pm}$ to $12: 34 \mathrm{pm}$ is 240 , the last term of the AP would be 238. (largest multiple of 7 less than 240)
AP : 0, 7, 14...... 238
Last term of AP - First term of AP

$$
\text { Common difference }+1=
$$

Number of terms of AP
$\Rightarrow \frac{238-0}{7}+1=35=$ Number of terms of AP = Number of bullets fired by Gun C from 12.30 pm to 12.34 pm
Remaining number of bullets in Gun C $=1200-35=1165$
Hence, option A is correct.
81. Ans. D.

Gun B:
Total number of bullets fired $=900$
Number of bullets that hit the target $=900 \times 33.33 \%=300$
Number of bullets that missed the target $=900-300=600$
Gun A:

Number of bullets that hit the target $=300 \times 80 \%=240$
Total number of bullets fired $=$ $\frac{240}{30} \times 100=800$
Number of bullets missed the target
$=800-240=560$
Gun C:
Number of bullets missed the target
$=800 \times(100-6.25) \%=750$
Number of bullets hit the target $=450$
Total number of bullets fired $=750+$ $450=1200$

| Guns | Total <br> number of <br> bullets fired | Number of <br> bullets that hit <br> the target | Number of bullets <br> that missed the <br> target |
| :---: | :---: | :---: | :---: |
| A | 800 | 240 | 560 |
| B | 900 | 300 | 600 |
| C | 1200 | 450 | 750 |

Required average $=\frac{240+300+450}{3}=$ 330
Hence, option D is correct.
82. Ans. E.

Gun B:
Total number of bullets fired $=900$
Number of bullets that hit the target $=900 \times 33.33 \%=300$
Number of bullets that missed the target $=900-300=600$
Gun A:
Number of bullets that hit the target $=300 \times 80 \%=240$
Total number of bullets fired $=$ $\frac{240}{30} \times 100=800$
Number of bullets missed the target
$=800-240=560$
Gun C:
Number of bullets missed the target $=800 \times(100-6.25) \%=750$
Number of bullets hit the target $=450$
Total number of bullets fired $=750+$ $450=1200$

| Guns | Total <br> number of <br> bullets fired | Number of <br> bullets that hit <br> the target | Number of bullets <br> that missed the <br> target |
| :---: | :---: | :---: | :---: |
| A | 800 | 240 | 560 |
| B | 900 | 300 | 600 |
| C | 1200 | 450 | 750 |

Using the previous concept of number of terms in Arithmetic progression.

Number of bullets fired by Gun A in 30 minutes $=\left\lfloor^{\frac{30 \times 60}{5}}\right\rfloor+1=361$ (here $[x]$ is the greatest integer function)
Number of bullets fired by Gun B in 30
minutes $=\left\lfloor\frac{30 \times 60}{3}\right\rfloor+1=601$
Number of bullets fired by Gun C in 30
minutes $=\left\lfloor^{\frac{30 \times 60}{7}}\right\rfloor+1=258$
Remaining number of bullets in all
Guns $=(800+900+1200)-(361+$
$601+258)=1680$
Hence, option E is correct.
83. Ans. C.

Gun B:
Total number of bullets fired $=900$
Number of bullets that hit the target
$=900 \times 33.33 \%=300$
Number of bullets that missed the target $=900-300=600$
Gun A:
Number of bullets that hit the target $=300 \times 80 \%=240$
Total number of bullets fired $=$ $\frac{240}{30} \times 100=800$
Number of bullets missed the target $=800-240=560$
Gun C:
Number of bullets missed the target $=800 \times(100-6.25) \%=750$
Number of bullets hit the target $=450$
Total number of bullets fired $=750+$ $450=1200$

| Guns | Total <br> number of <br> bullets fired | Number of <br> bullets that hit <br> the target | Number of bullets <br> that missed the <br> target |
| :---: | :---: | :---: | :---: |
| A | 800 | 240 | 560 |
| B | 900 | 300 | 600 |
| C | 1200 | 450 | 750 |

Using the previous concept of number of terms in Arithmetic progression.
Number of bullets fired by Gun A in 10
minutes $=\frac{10 \times 60}{5}+1=121$
Number of bullets fired by Gun A in 10
minutes $=\frac{4 \times 60}{3}+1=81$
Difference $=121-81=40$

Required percentage $=\frac{40}{81} \times 100 \approx$ 49\%
Hence, option C is correct.
84. Ans. D.

Gun B:
Total number of bullets fired $=900$
Number of bullets that hit the target
$=900 \times 33.33 \%=300$
Number of bullets that missed the target $=900-300=600$
Gun A:
Number of bullets that hit the target $=300 \times 80 \%=240$
Total number of bullets fired $=$ $\frac{240}{30} \times 100=800$
Number of bullets missed the target
$=800-240=560$
Gun C:
Number of bullets missed the target $=800 \times(100-6.25) \%=750$
Number of bullets hit the target $=450$
Total number of bullets fired $=750+$ $450=1200$

| Guns | Total <br> number of <br> bullets fired | Number of <br> bullets that hit <br> the target | Number of bullets <br> that missed the <br> target |
| :---: | :---: | :---: | :---: |
| A | 800 | 240 | 560 |
| B | 900 | 300 | 600 |
| C | 1200 | 450 | 750 |

The number of bullets that hit the target by Gun D = 300
Total number of bullets fired by Gun $D=\frac{800+1200}{2}=1000$
The number of bullets hit the target by Gun D $=1000-300=700$ Hence, option D is correct.
85. Ans. E.

Gun B:
Total number of bullets fired $=900$
Number of bullets that hit the target
$=900 \times 33.33 \%=300$
Number of bullets that missed the target $=900-300=600$
Gun A :
Number of bullets that hit the target $=300 \times 80 \%=240$

Total number of bullets fired $=$ $\frac{240}{30} \times 100=800$
Number of bullets missed the target $=800-240=560$
Gun C:
Number of bullets missed the target
$=800 \times(100-6.25) \%=750$
Number of bullets hit the target $=450$
Total number of bullets fired $=750+$ $450=1200$

| Guns | Total <br> number of <br> bullets fired | Number of <br> bullets that hit <br> the target | Number of bullets <br> that missed the <br> target |
| :---: | :---: | :---: | :---: |
| A | 800 | 240 | 560 |
| B | 900 | 300 | 600 |
| C | 1200 | 450 | 750 |

Required ratio $=750: 800=15: 16$
Hence, option E is correct.
86. Ans. D.

Simple interest earned in 2 years $=$ $9800-8120=$ Rs. 1680
Simple interest earned in 3 years $=$ $\frac{1680}{2} \times 3$
Sum $=8120-2520=$ Rs. 5600
According to the data provided in the question, we get:
$2520=5600 \times \mathrm{R} \% \times 3$
$\Rightarrow R=15$
Rate of interest for compound interest $=15+5=20 \%$
Compound interest $=5600$
$\left(1+\frac{20}{100}\right)^{2}-5600$
= 8064-5600 = Rs. 2464
87. Ans. B.

Profit share of Dharma $=10480$ 5280 = Rs. 5200
Ratio of profit share of Ashok to
Dharma $=5280: 5200=66: 65$
According to the data provided in the question, we get:
$\frac{(X+600) \times 6+(X+1800) \times 6}{(X-400) \times 6+(X+2600) \times 6}=\frac{66}{65}$
$\Rightarrow \frac{\mathrm{X}+1200}{\mathrm{X}+1100}=\frac{66}{65}$
$\Rightarrow 65 \mathrm{X}+78000=66 \mathrm{X}+72600$
$\Rightarrow X=5400$
88. Ans. C.

The probability of picking 1 Red ball = $\frac{1}{5}$
So, $\frac{\mathrm{y}}{20}=\frac{1}{5}$
$\Rightarrow y=4$
Total number of Yellow and Green
balls $=20-4=16$
$x+x+4=16$
$\Rightarrow 2 x=12$
$\Rightarrow x=6$
Number of Red balls in the bag $=6+$ $4=10$
89. Ans. A.

Let the radii of cylinder 1 and cylinder 2 be $r$ and $R$ respectively.
Also, let the heights of cylinder 1 and cylinder 2 be $h$ and $H$ respectively.
$\frac{\text { Volume of cylinder C1 }}{\text { Volume of cylinder } \mathrm{C} 2}=\frac{5}{16}$
$\frac{\pi \times r^{2} h}{\pi \times R^{2} H}=\frac{5}{16}$
$\Rightarrow \frac{\mathrm{r}^{2} \times 5}{\mathrm{R}^{2} \times 4}=\frac{5}{16}$
$\Rightarrow \frac{\mathrm{r}^{2}}{\mathrm{R}^{2}}=\frac{1}{4}$
$\Rightarrow \frac{\mathrm{r}}{\mathrm{R}}=\frac{1}{2}$
Now, $2 \times \frac{22}{7} \times 7(h+7)=748$
$\Rightarrow 44 \mathrm{~h}+308=748$
$\Rightarrow 44 \mathrm{~h}=440$
$\Rightarrow \mathrm{h}=10 \mathrm{~cm}$
Height of the cylinder C1 = 10 cm 10
Height of the cylinder C2 $=5 \times 4=8$ cm
Radius of cylinder of cylinder C2 $=7$ $\times 2=14 \mathrm{~cm}$
Total surface area of cylinder C2 $=2$ $\underline{22}$
$\times \overline{7} \times 14(8+14)=1936 \mathrm{~cm}^{2}$
90. Ans. C.

Let the $P$ and $Q$ be $5 x$ and $7 x$ respectively.

According to the data provided in the question, we get:
$\frac{5 x+22}{7 x+35}=\frac{7}{10}$
$\Rightarrow 50 x+220=49 x+245$
$\Rightarrow x=25$
$\mathrm{P}=25 \times 5=125$
$\mathrm{Q}=25 \times 7=175$
Required percentage =
$\frac{175 \times 0.48}{125 \times 0.60} \times 100=112 \%$
91. Ans. C.

| Months | Dates | Persons | Number of <br> Shops | Number of <br> Apartments |
| :--- | :---: | :---: | :---: | :---: |
| September | $5^{\text {th }}$ | A | 1 | 2 |
| (30 days) | $11^{\text {th }}$ | D | 3 | 6 |
|  | $14^{\text {th }}$ | F | 6 | 12 |
| November | $5^{\text {th }}$ | B | 2 | 4 |
| (30 days) | $11^{\text {th }}$ | I | 1 | 2 |
|  | $14^{\text {th }}$ | H | 5 | 10 |
| December | $5^{\text {th }}$ | C | 3 | 6 |
| (31 days) | $11^{\text {th }}$ | E | 1 | 2 |
|  | $14^{\text {th }}$ | G | 4 | 8 |

92. Ans. B.

| Months | Dates | Persons | Number of <br> Shops | Number of <br> Apartments |
| :--- | :---: | :---: | :---: | :---: |
| September | $5^{\text {th }}$ | A | 1 | 2 |
| (30 days) | $11^{\text {th }}$ | D | 3 | 6 |
|  | $14^{\text {th }}$ | F | 6 | 12 |
| November | $5^{\text {th }}$ | B | 2 | 4 |
| (30 days) | $11^{\text {th }}$ | I | 1 | 2 |
|  | $14^{\text {th }}$ | H | 5 | 10 |
| December | $5^{\text {th }}$ | C | 3 | 6 |
| (31 days) | $11^{\text {th }}$ | E | 1 | 2 |
|  | $14^{\text {th }}$ | G | 4 | 8 |

93. Ans. D.

| Months | Dates | Persons | Number of <br> Shops | Number of <br> Apartments |
| :--- | :---: | :---: | :---: | :---: |
| September | $5^{\text {th }}$ | A | 1 | 2 |
| (30 days) | $11^{\text {th }}$ | D | 3 | 6 |
|  | $14^{\text {th }}$ | F | 6 | 12 |
| November | $5^{\text {th }}$ | B | 2 | 4 |
| (30 days) | $11^{\text {th }}$ | I | 1 | 2 |
|  | $14^{\text {th }}$ | H | 5 | 10 |
| December | $5^{\text {th }}$ | C | 3 | 6 |
| (31 days) | $11^{\text {th }}$ | E | 1 | 2 |
|  | $14^{\text {th }}$ | G | 4 | 8 |

94. Ans. D.

| Months | Dates | Persons | Number of <br> Shops | NuI <br> Apa |
| :--- | :---: | :---: | :---: | :---: |
| September | $5^{\text {th }}$ | A | 1 |  |
| (30 days) | $11^{\text {th }}$ | D | 3 |  |
|  | $14^{\text {th }}$ | F | 6 |  |
| November | $5^{\text {th }}$ | B | 2 |  |
| (30 days) | $11^{\text {th }}$ | I | 1 |  |
|  | $14^{\text {th }}$ | H | 5 |  |
| December | $5^{\text {th }}$ | C | 3 |  |
| (31 days) | $11^{\text {th }}$ | E | 1 |  |
|  | $14^{\text {th }}$ | G | 4 |  |

95. Ans. C.

| Months | Dates | Persons | Number <br> of Shops | Numb <br> Aparts |
| :--- | :---: | :---: | :---: | ---: |
| September | $5^{\text {th }}$ | A | 1 | 2 |
| (30 days) | $11^{\text {th }}$ | D | 3 | 6 |
|  | $14^{\text {th }}$ | F | 6 | 12 |
| November | $5^{\text {th }}$ | B | 2 | 4 |
| (30 days) | $11^{\text {th }}$ | I | 1 | 2 |
|  | $14^{\text {th }}$ | H | 5 | 10 |
| December | $5^{\text {th }}$ | C | 3 | 6 |
| (31 days) | $11^{\text {th }}$ | E | 1 | 2 |
|  | $14^{\text {th }}$ | G | 4 | 8 |

96. Ans. A.
$3^{\text {rd }}$ letter of SECURITY, $2^{\text {nd }}$ and $5^{\text {th }}$ letter of PURITY, $6^{\text {th }}$ letter of ENSURE and $1^{\text {st }}$ letter of AMPULE are $\mathrm{C}, \mathrm{U}, \mathrm{T}$, E, A,
The newly formed word is ACUTE. 97. Ans. A.

97. Ans. E.

98. Ans. D.

99. Ans. A.

100. Ans. D.

101. Ans. D.

102. Ans. A.

103. Ans. C.

104. Ans. E.

105. Ans. A.

106. Ans. B.

107. Ans. D.

108. Ans. B.

Increase in use of natural sources of water and private vehicles causes water crisis and air pollution.
111. Ans. C.

He should inform his seniors before calling the police.
112. Ans. D.

None of the given options are right to do.
113. Ans. E.

C R O C O D I L E
3181531549125
114. Ans. C.

| Years | People | Laptops | Colours |
| :---: | :---: | :---: | :---: |
| 2001 | C | Acer | Black |
| 2002 | D | HP | Black |
| 2003 | A | Lenovo | Silver |
| 2004 | E | Lenovo | Silver |
| 2005 | B | HP | Blue |
| 2006 | F | Acer | Black |

115. Ans. B.

| Years | People | Laptops | Colours |
| :---: | :---: | :---: | :---: |
| 2001 | C | Acer | Black |
| 2002 | D | HP | Black |
| 2003 | A | Lenovo | Silver |
| 2004 | E | Lenovo | Silver |
| 2005 | B | HP | Blue |
| 2006 | F | Acer | Black |

116. Ans. C.

| Years | People | Laptops | Colours |
| :---: | :---: | :---: | :---: |
| 2001 | C | Acer | Black |
| 2002 | D | HP | Black |
| 2003 | A | Lenovo | Silver |
| 2004 | E | Lenovo | Silver |
| 2005 | B | HP | Blue |
| 2006 | F | Acer | Black |

117. Ans. C.

| Years | People | Laptops | Colours |
| :---: | :---: | :---: | :---: |
| 2001 | C | Acer | Black |
| 2002 | D | HP | Black |
| 2003 | A | Lenovo | Silver |
| 2004 | E | Lenovo | Silver |
| 2005 | B | HP | Blue |
| 2006 | F | Acer | Black |

118. Ans. A.

| Years | People | Laptops | Colours |
| :---: | :---: | :---: | :---: |
| 2001 | C | Acer | Black |
| 2002 | D | HP | Black |
| 2003 | A | Lenovo | Silver |
| 2004 | E | Lenovo | Silver |
| 2005 | B | HP | Blue |
| 2006 | F | Acer | Black |

119. Ans. A.

The assumption is false because of the term "criminal offense". No information regarding this given in the statement.
So, only I follows.
120. Ans. E.

None follows.
The terms 'any' in assumption I and 'only' in assumption II make them false.
121. Ans. C.

122. Ans. A.

Row - 1


Row - 2


Row -3

123. Ans. C.

Row - 1


Row - 2


Row - 3

124. Ans. D.

Row - 1


Row - 2

125. Ans. D.

Row -1


Row - 2

126. Ans. D.

Row - 1


Row -2


Row - 3

127. Ans. A.

From the given information:
Statement I:
$P$ is standing second from the left end.
$R$ is standing third to the left of $Q$ who is near to T .
Statement I alone isn't sufficient to answer the question.
Statement II:
Q isn't the immediate neighbor of $U$ who doesn't sit any extreme ends of the row.
Statement II alone isn't sufficient to answer the question.
Statement III:
$T$ isn't the immediate neighbor of $P$. Statement III alone isn't sufficient to answer the question.
On combining statements I and II:


Hence, statement I and II together is sufficient to answer the question.
On combining statements II and III:
$Q$ isn't the immediate neighbor of $U$ who doesn't sit any extreme ends of the row.
$T$ isn't the immediate neighbor of $P$.
Hence, statement II and III together isn't sufficient to answer the question. On combining statements I and III: $P$ is standing second from the left end. $R$ is standing third to the left of $Q$ who is near to T .
$T$ isn't the immediate neighbor of $P$. Hence, statements I and III together isn't sufficient to answer the question.

Hence, the data in statement I and statement II is sufficient to answer the question.
128. Ans. E.

From the given information:
Statement I: Dancer travelled on one of the days after Wednesday but not on Sunday. Only one person has travelled between Dancer and Doctor but Doctor doesn't travel on last day of the week. Two persons travelled between Doctor and Teacher.

| Day | Person |
| :--- | :--- |
| Monday | Teacher 2 |
| Tuesday | Doctor |
| Wednesday | Teacher/ Doctor 1 |
| Thursday | Dancer/ Doctor 2 |
| Friday | Dancer 1/ Teacher |
| Saturday | Dancer 2/ Doctor/ teacher 1 |
| Sunday | Teacher 2 |

So, statement I alone isn't sufficient to answer the question.
Statement II: Sunday is not the day when no one is travelled and painter is not travelled on Sunday. Doctor travelled before Teacher. Two persons travelled between Painter and Holiday.
So, statement II alone isn't sufficient to answer the question.
Statement III: Artist travelled before holiday. There is three-day gap between holiday and the day on which Singer travelled.
So, statement III alone isn't sufficient to answer the question.
On combining all three statements:
Artist will travel on Monday.
Wednesday is holiday.
Dancer will travel on Thursday.
Teacher will travel on Friday.
Painter will travel on Saturday.
Singer will travel on Sunday.
The final arrangement will be as shown:

| Day | Person |
| :--- | :--- |
| Monday | Artist |
| Tuesday | Doctor |
| Wednesday | Holiday |
| Thursday | Dancer |
| Friday | Teacher |
| Saturday | Painter |
| Sunday | Singer |

Hence, the data in all the statements I, II and III together is sufficient to answer the question.
129. Ans. D.

From the given information:
Statement I: T is the tallest among the all. R is just placed behind Q but not on even numbered position.
$T(5)>Z_{>}>Z_{>}>{ }_{Q}>$
$\mathrm{T}(5)>{ }_{\mathrm{Q}} \ggg>\mathrm{Q}(2)>\mathrm{R}(1)$
$\mathrm{T}(5)>\mathrm{Q}(4)>\mathrm{R}(3)>$ $\qquad$ > $\qquad$
Statement II: T doesn't place at even numbered position.


Statement III: U doesn't place at even numbered position and $T$ is placed after $U$.
$\mathrm{T}(5) / \mathrm{T}(4)>\mathrm{U}$ (3) $\qquad$ $>$
T > U (1)
On combining all the statements:
$\mathrm{T}(5)>\mathrm{S}(4)>\mathrm{U}(3)>\mathrm{Q}(2)>\mathrm{R}(1)$
Or
$\mathrm{T}(5)>\mathrm{Q}(4)>\mathrm{R}(3)>\mathrm{S}(2)>\mathrm{U}(1)$
Hence, the data in all the statements I, II and III together isn't sufficient to answer the question.
130. Ans. D.

From the given information:
S likes Dancing and $M$ likes neither Fighting nor Singing.

Statement I: B likes Painting and N doesn't like Fighting.

| Person | Activity |
| :--- | :--- |
| B | Painting |
| O |  |
| S | Dancing |
| P |  |
| N | Not fighting |
| M | Not fighting and Singing |

So, statement I alone isn't sufficient to answer the question.
Statement II: O likes Singing and P doesn't like Painting.

| Person | Activity |
| :--- | :--- |
| B |  |
| O | Singing |
| S | Dancing |
| P | Not Painting |
| N |  |
| M | Not fighting and Singing |

So, statement II alone isn't sufficient to answer the question.
Statement III: N likes neither Painting nor Singing.

| Person | Activity |
| :--- | :--- |
| B |  |
| O |  |
| S | Dancing |
| P |  |
| N | Not painting and Singing |
| M | Not fighting and Singing |

So, statement III alone isn't sufficient to answer the question.
On combing all three statements:

| Person | Activity |
| :--- | :--- |
| B | Painting |
| O | Singing |
| S | Dancing |
| P | Fighting |
| N | Not painting, Fighting and Singing |
| M | Not fighting and Singing |

Hence, the data in all the statements I, II and III together isn't sufficient to answer the question.
131. Ans. E.

From the given information:
From statement I:
Position of $\mathrm{O}=3^{\text {rd }}$ from left
Position of $D=16^{\text {th }}$ from right
So, the total number of people sitting in the row cannot be determined.
Thus, statement $I$ alone is not sufficient to answer the question.
Statement II:
$Z$ is sitting seventh to the right of $B$.
So, the total number of people sitting in the row cannot be determined.
Thus, statement II alone is not sufficient to answer the question.

From statement III:
There is twenty-two people between $D$ and $O$ which includes $B$ and $Z$.
So, the total number of people sitting in the row cannot be determined.
Thus, statement III alone is not sufficient to answer the question.
From statement I, II and III:
There are two people in to the left of 0 .
There are 15 people to the right of $D$. $R$ is sitting seventh to the left of $Z$.
There are 22 people between D and O including B and Z .
Combining the above statements, we get:
Number of people in the row = (to left of O$)+($ to right of D$)+($ between D and O$)+($ for D and O$)$
$=2+15+22+2=41$
So, there are 41 people sitting in the row including $\mathrm{D}, \mathrm{O}, \mathrm{B}$ and Z .
Hence, the data in all the statements I, II and III together is sufficient to answer the question.
132. Ans. E.

All except option E follows the same rule - the letters of each word is arranged in reverse order.
133. Ans. E.

None follows.
Capital punishment is not the only way to reduce crime. Robbery is not a crime for which a punishment like capital punishment should be imposed.
134. Ans. A.

In such markets where the product of consumption is related to addiction, reducing supply will in fact increase criminal activities in the country as quitting smoking habit or any other kind of addiction habits are not easy. If people do not get tobacco easily, they can cross the limit which may increase crime rates. Hence, argument I is not strong.

Again, people who works in this industry or farm tobacco will lose their jobs and that will cause unemployment in the country. Hence, argument II is strong.
135. Ans. B.

136. Ans. C.

137. Ans. D.

138. Ans. B.

139. Ans. B.

140. Ans. C.

Given,


Again,


Therefore,


0 R P


141. Ans. A.

- Finance Minister Nirmala Sitharaman announced taht the government will infuse ₹ 20,000 crore into public sector banks (PSBs) in 2021-22 to meet the regulatory norms.
- For the current financial year also, the government had made a provision of ₹ 20,000 crore for recapitalisation.
- During 2019-20, the government had proposed to make a ₹ 70,000crore capital infusion into the PSBs to boost credit for a strong impetus to the economy.
- However, the government refrained from committing any capital for the PSBs in the Budget 2020-21, hoping that the lenders will raise funds from the market depending on the requirements.

142. Ans. A.

The priority sector lending by commercial banks is monitored by
Reserve Bank of India (RBI) through periodical returns received from them. Priority Sector Lending refers to those sectors of the economy which may not get timely and adequate credit in the absence of this special dispensation. Priority Sector Lending is an important role given by the Reserve Bank of India. Priority Sector includes the following categories:
(i) Agriculture
(ii) Micro, Small and Medium

Enterprises
(iii) Export Credit
(iv) Education
(v) Housing
(vi) Social Infrastructure
(vii) Renewable Energy
(viii) Others (Weaker Section)
143. Ans. B.

The world's longest sandstone cave named Krem Puri was discovered near Laitsohum village, located in the Mawsynram area in Meghalaya's East Khasi Hills district
144. Ans. B.

- There are total 22 Ombudsman office.
- The Reserve Bank Friday has recently opened office of the Banking

Ombudsman and Ombudsman for Digital Transactions (ODT) at its New Delhi office that increased its number to 22 .
145. Ans. C.

- Jack Dorsey is the co-founder of Twitter.
- It was founded on March 21, 2006.
- It is based in San Francisco, California.

146. Ans. C.

- The Reserve Bank of India (RBI) commenced its operations on 1 April 1935 during the British Rule in accordance with the provisions of the Reserve Bank of India Act, 1934.
- The original share capital was divided into shares of 100 each fully paid, which were initially owned entirely by private shareholders. Following India's independence on 15 August 1947, the RBI was nationalized on 1 January 1949. 147. Ans. C.
- Coinciding with the World Wetland Day, India got its first specialised institution - Centre for Wetland Conservation and Management (CWCM) - in Chennai which will work as a knowledge hub for various stakeholders for conserving wetlands that occupy $4.6 \%$ of the country's total land area.
- The CWCM has been set up as a part of the National Centre for Sustainable Coastal Management (NCSCM), Chennai.
- It will assist the national and state/UT governments in the design and implementation of policy and regulatory frameworks, management planning, monitoring and targeted research for conservation of wetlands.

148. Ans. E.

Electoral bonds can be purchased for any value in multiples of Rs 1,000 , Rs

10,000, Rs 10 lakh, and Rs 1 crore from any of the specified branches of the State Bank of India. The life of the bond will be for $\mathbf{1 5}$ days.

- The central government had on January 29, 2018, notified the electoral bond scheme.
- An Indian citizen or body incorporated in India will be eligible to purchase the bond.
- Electoral bonds can be used for making a donation only to the political parties registered under section 29A of the Representation of the People Act, 1951 (43 of 1951) and which secured not less than one per cent of the votes polled in the last general election to the House of the People or a Legislative Assembly.
- These bonds will not carry the name of the payee.
- Authorised centre - It can be purchased only from specified branches of State Bank of India.
- Denomination - Electoral bonds can be bought for any value, in multiples of Rs 1,000 , Rs 10,000 , Rs 1 lakh, Rs 10 lakh or Rs 1 crore.
- Validity - Electoral bonds will be valid for 15 daysfrom the date of purchase.

149. Ans. D.

Mutual Funds are regulated in the country by Securities and Exchange Board of India
150. Ans. D.

- Padma Vibhushan awardee Ustad Ghulam Mustafa Khan was a legendary Indian classical musician.
- Born on March 3, 1931 in Badaun in Uttar Pradesh, Khan was the eldest son in a family of four brothers and three sisters.
- His father, Ustad Waris Hussain Khan was the son of celebrated musician Ustad Murred Baksh, while his mother, Sabri Begum, was the daughter of Ustad Inayat Husain

Khan, credited as the founder of the Rampur-Sahaswan gharana of music. - Khan got his basic classical music training from his father and later studied music under his cousin, Ustad Nissar Hussain Khan.

- He was awarded the Padma Shri in 1991, followed by Padma Bhusan in 2006 and Padma Vibhushan in 2018.
- In 2003 he was awarded the Sangeet Natak Akademi award, the highest Indian recognition given to practicing artistes.

151. Ans. A.

- According to a report by Brand Finance, Accenture retained the title of world's most valuable and strongest IT services brand with a record brand value of $\$ 26$ billion, while IBM continued at the second place with brand value of $\$ 16.1$ billion.

152. Ans. C.

Nikkei is the stock market index of Japan.
153. Ans. D.

The award of 'ICC Men's T20I Cricketer of the Decade' has been awarded to Rashid Khan. The ICC Awards of the Decade recognize the best players across Cricket over the past ten years. The winners of this prestigious ICC Awards of the Decade were announced on December 28, 2020. Hence, option D is correct.
154. Ans. C.

* The RBI divested its entire stake in NABARD and NHB amounting to ₹ 20 crore and ₹ 1450 crore respectively.
* The Government of India now holds $100 \%$ stake in both the financial institutions.

155. Ans. A.

The headquarters of the 'United Nations World Tourism Organization is situated in Madrid, Spain.
156. Ans. B.

West Bengal legislative assembly consists of 294 seats. West Bengal Legislative Assembly is the unicameral legislature of West Bengal. These 294 members are directly elected from single-seat constituencies. Its term is five years, unless it is dissolved sooner. Biman Banerjee of AITC is speaker of West Bengal Legislative Assembly.
157. Ans. C.

India Gets Re-elected as the President of International Solar Alliance. During a virtual meeting of the International Solar Alliance, India was re-elected as the President of the organization for a term of two years with France as the Co-President.
158. Ans. D.

The Hawker Culture in Singapore has been inscribed on the UNESCO's Representative List of the Intangible Cultural Heritage of the Humanity at the $15^{\text {th }}$ session of the IGC (Intergovernmental Committee) that was held virtually.
The Hawker Culture in Singapore is a living heritage shared by those who prepare the hawker food and those who dine \& mingle over hawker food in the community dining spaces called hawker centres.
It reflects Singapore's multicultural identity as the people \& nation and resonates strongly with the Singaporeans across all races and social strata.
The particular List of the Intangible Cultural Heritage of UNESCO is made up of those intangible heritage elements which help demonstrate the diversity of the cultural heritage and raise the awareness about its importance.
The list was established in the year 2008 when the Convention for Safeguarding of the Intangible Cultural Heritage came into effect.
159. Ans. B

- National Disaster Management Authority is chaired by the Prime minister of India.
- It was established through the Disaster Management Act enacted by the Government of India in December 2005.
- Its primary purpose is to coordinate response to natural or man-made disasters and for capacity-building in disaster resiliency and crisis response.

160. Ans. C.

- PayPal has decided to close its operation in India.

161. Ans. B.

- The Foxconn of toy world to set up India's first toy cluster in Karnataka 162. Ans. E.

Maradona scored 'hand of god' goal against England in 1986 World Cup. 163. Ans. A.

Sonalika Group became the first company to launch an Electric tractor in India.
164. Ans. B.

FASTag works on Radio Frequency Identification (RFID) technology. 165. Ans. C.

ASMI was India's first indigenous 9 mm machine pistol jointly developed by the Defence Research and Development Organisation (DRDO) and the Indian Army 166. Ans. D

Depository Receipt is not related to 'bank to bank' transfer mechanism 167. Ans. B.

- Ustad Shahid Parvez Khan (commonly known as Shahid Parvez, born 14 October 1958) is an Indian classical sitar maestro from the Imdadkhani gharana. He was recently conferred the Kalajyoti Lifetime Achievement Award.

168. Ans. A.

- Prime Minister Shri Narendra Modi laid the foundation stone of Light House projects (LHPs) under Global Housing Technology Challenge (GHTC)- at six sites across six States, through video conference.
- The Light House Projects are to be implemented in
- Agartala (Tripura)
- Ranchi (Jharkhand)
- Lucknow (Uttar Pradesh)'
- Indore (Madhya Pradesh)
- Rajkot (Gujarat)
- Chennai (Tamil Nadu)

169. Ans. C.

- ICICI Bank, has inaugurated its representative office Kathmandu, marking the foray of an Indian private sector bank in Nepal.
- The representative office at the business district of Thapathali will closely work with domestic banks in Nepal to facilitate investment, trade, payments and treasury business between the two countries.

170. Ans. E.

- India's Anshu Malik won a silver medal in the 57 kg category of women's wrestling at the Individual World Cup in Belgrade, Serbia. The 19 -year-old Indian wrestler lost to Moldova's Anastasia Nichita 5-1 in the final.

171. Ans. A.

- Odisha's famous and oldest 'AdivasiMela 2021' took place in the period January 26, 2021 to 09 February, 2021 in Bhubaneswar. State Chief Minister Naveen Patnaik inaugurated the grand 'mela'.

172. Ans. C.

- Tapovan Vishnugad is NTPC's second hydro power project since its foray into the sector. The 520 MW run-of-the-river project is situated on river Dhauliganga in Chamoli district of Uttarakhand.

173. Ans. C.

- As per International Energy Agency (IEA)'s 'India Energy Outlook 2021', India will overtake the European Union as the world's third-largest energy consumer by 2030.
- In the outlook, IEA saw primary energy consumption almost doubling to 1,123 million tonnes of oil equivalent as the Gross Domestic Product (GDP) expands to USD 8.6 trillion by 2040.

174. Ans. B.

- Bharatmala Pariyojana (Project) is a centrally-sponsored and funded Road and Highways project of the Government of India. 175. Ans. B.
- Reliance Industries Limited (RIL) will be setting up the world's largest zoo in Gujarat's Jamnagar district.
- The zoo will be built on 280 acres, In which more than 300 species of animals will live.

176. Ans. B.

- The maturity period for the SCSS scheme is 5 years.
- It can be extended for another 3 years, effectively bringing up the period to 8 years.

177. Ans. D.

- Markets regulator SEBI has barred Future Group CEO Kishore Biyani and his brother Anil rom accessing securities market for a period of 1 year due to alleged insider trading between March and April 2017.

178. Ans. B.

- Asset reconstruction company and an asset management company (AMC) will be used for clean up of non-performing assets in the banking sector.

179. Ans. B.

- World's largest renewable energy park with a capacity of 30,000 megawatts (MW) from solar and wind energy has inaugurated in India.

180. Ans. A.
A. Struggle Is My Life is the autobiography of Nelson Mandela in which his political beliefs have been explained.
181. Ans. B.

- Union Budget has made space for easing norms around setting up of One Person Company (OPC) by reducing the residency limit of NRIs from 182 to 120 days.
- Earlier, only Indian resident citizens were allowed to form one person companies in India.

182. Ans. C.

- India Posts, Department of Posts (DOP), Ministry of Communications released a commemorative postage stamp on the 75th anniversary of the United Nations Organisations.

183. Ans. D.

- Flight Lieutenant Bhawana Kant is the first female fighter pilot to participate in the Republic Day Parade 2021. She hails from Darbhanga, Bihar.

184. Ans. B.

- USA's is planning to have the first nuclear reactor on the moon by the end of 2026.
- US Department of Energy has collaborated with NASA for setting up first nuclear reactor on the moon.

185. Ans. B.

- Rajeev Sharma has been appointed as the new CEO of Ayushman Bharat scheme for a period of two years.
- He has replaced Indu Bhushan, who was the first CEO of Ayushman Bharat Scheme.

186. Ans. E.

- Irrfan Khan's first international movie is The Warrior, that was released in 2001.
- His other international movies are Namesake (2006), The Darjeeling Limited (2007), New York, I Love You (2008), The Amazing Spider-Man
(2012), Life of Pi (2012), Jurassic World (2015) and Inferno (2016). 187. Ans. D.

To improve credit discipline while continuing to protect the interest of small borrowers, for NBFCs with minimum asset size of `100 crores, the minimum loan size eligible for debt recovery under the Securitisation and Reconstruction of Financial Assets and Enforcement of Security Interest (SARFAESI) Act, 2002 is proposed to be reduced from the existing level of` 50 lakhs to ` 20 lakhs.
188. Ans. D.

- As per the Energy Outlook 2021, published by the International Energy Agency (IEA), India will overtake the European Union as the world's thirdlargest energy consumer by 2030.
- India at present is the fourth-largest global energy consumer behind China, the United States and the European Union.
- India accounts for nearly onequarter of global energy demand growth from 2019-40 -- the largest for any country. Its share in the growth in renewable energy is the second-largest in the world, after China.
- By 2040, India's power system is bigger than that of the European Union, and is the world's third-largest in terms of electricity generation; it also has 30 per cent more installed renewables capacity than the United States.

189. Ans. C.

- Ranthambore National Park is the fortieth largest national parks in northern India, covering 392 km ${ }^{2}$.
- Ranthambhore was established as the Sawai Madhopur Game Sanctuary in 1955 by the Government of India and was
declared one of the Project Tiger reserves in 1973.
- It is located in Karnataka.

190. Ans. B.

- In India, the National Pollution Control Day is observed every year on December 2 to commemorate the life of people lost in the unfortunate incident of Bhopal Gas Tragedy that occurred in the year 1984 on the night of 2-3 December.
- The year 2020 marks the 36th anniversary of the Bhopal Gas Tragedy.
- Through this day, awareness is created about the rising pollution of air, water, and soil, as well as shifts the attention of people with regards to the pollution control acts.

