

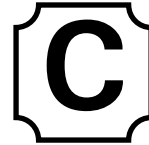
Test Booklet No.

Subject : ECONOMICS

Test Booklet Code

Code : 309 E

Medium : English



(Do not open this Test Booklet until you are asked to do so)

Time Allowed : 60 minutes	Maximum Marks : 200	Total Questions : 50	Number of questions to be answered : 40
---------------------------	---------------------	----------------------	---

Kindly read the Instructions given on this Page and Back Page carefully before attempting this Question Paper.

Important Instructions for the Candidates :

1. This Test Booklet contains **50** questions printed in English. Out of these, the candidate is required to answer any **40** questions. If a candidate answers more than 40 questions, the first 40 answered questions will be considered for evaluation.
2. When you are given the OMR Answer Sheet, fill in your particulars on it carefully with **blue/black** ball point pen only.
3. Use only Blue/Black Ball Point Pen for marking responses.
4. The CODE for this Test Booklet is **C**. Make sure that the CODE printed on the OMR Answer Sheet is the same as that on this Test Booklet. Also ensure that your Test Booklet No. and OMR Answer Sheet No. are exactly the same. In case of discrepancy, the candidate should immediately report the matter to the Invigilator for replacement of both the Test Booklet and the OMR Answer Sheet. No claim in this regard will be entertained after five minutes from the start of the examination.
5. Before attempting the question paper kindly check that this Test Booklet has total **16** pages and OMR Answer Sheet consists of one sheet. At the start of the examination within first five minutes, candidates are advised to ensure that all pages of Test Booklet and OMR Answer Sheet are properly printed and they are not damaged in any manner.
6. Each question has four answer options. Out of these four options choose the **MOST APPROPRIATE OPTION** and darken/blacken the corresponding circle on the OMR Answer Sheet with a Blue/Black Ball Point Pen.
7. Five (5) marks will be given for each correct answer. One (1) mark will be deducted for each incorrect answer. If more than one circle is found darkened/blackened for a question, then it will be considered as an incorrect answer. Unanswered questions will be given no mark.

P.T.O.

Name of the Candidate (in Capital Letters) : _____

Application Number (in figures) : _____

Roll Number (in figures) : _____

Centre of Examination (in Capital Letters) : _____

Candidate's Signature : _____ Invigilator's Signature : _____

Facsimile signature stamp of Centre Superintendent : _____

- Casualization of workforce would result in :
 - Decrease in the vulnerability of the workforce.
 - Increase in the vulnerability of the workforce.
 - Increase in the number of regular workers.
 - Income and employment stability.
- Choose the correct chronological sequence in ascending order (earliest to latest) :
 - Establishment of NABARD
 - FRBMA (Fiscal Responsibility and Budget Management Act)
 - Third Five Year Plan
 - Nationalization of RBI
 - (A), (B), (C), (D)
 - (A), (C), (B), (D)
 - (D), (A), (B), (C)
 - (D), (C), (A), (B)
- Under flexible exchange rate, when the price of domestic currency in terms of foreign currency increases, it is called _____.
 - Depreciation of domestic currency
 - Appreciation of domestic currency
 - Devaluation of domestic currency
 - Revaluation of domestic currency
- Match **List-I** with **List-II** :

List-I	List-II
(A) Pegged exchange rate system	(I) Setting up of IMF and World Bank
(B) Managed floating	(II) Fixed exchange rate system
(C) Bretton Woods Conference	(III) Dirty floating
(D) Third element in BOP	(IV) Error and Omission Account

Choose the correct answer from the options given below :

- (A) - (II), (B) - (I), (C) - (III), (D) - (IV)
- (A) - (II), (B) - (III), (C) - (I), (D) - (IV)
- (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
- (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

SPACE FOR ROUGH WORK

5. _____ implies that resource extraction is not above the rate of regeneration of resources and the wastes generated are within the assimilating capacity of the environment.
- (1) Absorptive capacity (2) Carrying capacity
(3) Subsistence capacity (4) Exhaustive capacity
6. Government of India enacted the Right to Education Act in 2009 to make free education a Fundamental Right of all children in the age group of _____ years.
- (1) 4 – 10 (2) 6 – 12
(3) 6 – 14 (4) 8 – 15
7. Following are the sources of electricity generation in India. Arrange them in correct sequence on the basis of total power generation capacity (higher to lower) :
- (A) Nuclear
(B) Thermal
(C) New and renewable energy
(D) Hydro
- Choose the correct answer from the options given below :
- (1) (A), (B), (C), (D) (2) (A), (C), (B), (D)
(3) (B), (C), (D), (A) (4) (B), (D), (C), (A)
8. Arrange the following items in correct sequence :
- (A) Competition Act
(B) FEMA
(C) FERA
(D) MRTPL
- Choose the correct answer from the options given below :
- (1) (A), (B), (C), (D) (2) (A), (C), (B), (D)
(3) (D), (C), (B), (A) (4) (C), (B), (D), (A)
9. The Great Leap Forward (GLF) campaign was initiated in _____ .
- (1) 1948 (2) 1938
(3) 1958 (4) 1942

10. Match List-I with List-II :

List-I	List-II
(A) Great Leap Forward	(I) Protecting the future generation
(B) Mao Zedong	(II) Aimed at industrialising the country on a massive scale
(C) Brundtland Commission	(III) Introduced the Great Proletarian Cultural Revolution
(D) Our Common Future	(IV) Seminal Report that explained sustainable development as meeting the basic needs of all for a better life

Choose the correct answer from the options given below :

- (1) (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
- (2) (A) - (II), (B) - (III), (C) - (I), (D) - (IV)
- (3) (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
- (4) (A) - (III), (B) - (IV), (C) - (I), (D) - (II)
- 11. Second phase of Green Revolution is termed from :**
- (1) mid 1960s to mid 1970s
- (2) mid 1970s to mid 1980s
- (3) mid 1950s to mid 1960s
- (4) mid 1980s to mid 1990s
- 12. During 1980s, the growth rate in Pakistan improved on account of which of the following reasons ?**
- (1) Institutionalised process of technical change
- (2) A good harvest
- (3) Sustainable export of manufactured goods
- (4) High amount of foreign direct investment inflow
- 13. When there is unexpected rise in the sales _____ .**
- (1) Aggregate demand would decline.
- (2) There will be unplanned accumulation of inventories.
- (3) There will be unplanned decumulation of inventories.
- (4) Normal profit would be lower.
- 14. During festive season, the currency deposit ratio _____ .**
- (1) decreases (2) increases
- (3) has no impact on it (4) first decreases then increases

SPACE FOR ROUGH WORK

15. European Monetary Union was created in _____.
- (1) 1996 (2) 1994
(3) 1999 (4) 2002
16. Identify the correct statement in the context of Circular Flow of Income in a two sector economy :
- (1) Household receives factor services from firms.
(2) Household invests while firm saves.
(3) Firms produce goods and services.
(4) Household supplies factor services to Government.
17. Identify the correct set of statements.
- (A) Ex Ante Saving represents what is actually planned to save.
(B) Ex Post Saving represents what is actually planned to save.
(C) Ex Post Saving depicts what has actually happened.
(D) Ex Ante Post Saving represents what is actually saved.

Choose the **correct** answer from the options given below :

- (1) (A) and (D) only
(2) (A) and (C) only
(3) (B) and (D) only
(4) (C) and (D) only

18. Match **List-I** with **List-II** :

List-I (Elements)	List-II (Features)
(A) Annual Financial Statement	(I) Create liabilities or reduce financial assets
(B) Capital Receipts	(II) Trade surplus
(C) Capital Payment	(III) Main budget document
(D) Export > Import	(IV) Create financial assets or reduce liabilities

Choose the correct answer from the options given below :

- (1) (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
(2) (A) - (III), (B) - (I), (C) - (IV), (D) - (II)
(3) (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
(4) (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

SPACE FOR ROUGH WORK

Read the following passage and answer the next five questions :

In our quest to increase agricultural production during the last five decades or so, we almost totally neglected the use of compost and completely switched over to chemical fertilizers. The result is that large tracts of productive land have been adversely affected, water bodies including ground water system have suffered due to chemical contamination and demand for irrigation has been going up year after year. Farmers, in large numbers all over the country, have again started using compost made from organic wastes of different types. In certain parts of the country, cattle are maintained only because they produce dung which is an important fertilizer and soil conditioner.

Earthworms can convert organic matter into compost faster than the normal composting process. This process is now being widely used. Indirectly, the civic authorities are benefitted too as they have to dispose reduced quantity of waste.

19. How is civic authority getting benefitted due to biocomposting ?

- (1) They have to dispose increased quantity of waste.
- (2) They don't have to dispose any waste.
- (3) Because civic authority has no role in waste management.
- (4) They have to dispose reduced quantity of waste.

20. Choose the correct statement concerned with the passage :

- (1) Earthworm takes equal time to convert organic matter into compost with respect to normal composting process.
- (2) Earthworm takes more time to convert organic matter into compost with respect to normal composting process.
- (3) Earthworm takes less time to convert organic matter into compost with respect to normal composting process.
- (4) Comparison between earthworm based composting and normal composting cannot be made.

21. Water bodies including ground water system have suffered due to :

- (1) Biocomposting
- (2) Chemical contamination and increased demand for irrigation
- (3) Organic farming
- (4) Increased fertility of land

SPACE FOR ROUGH WORK

22. In certain parts of the country, cattle are maintained only because they _____ .
- (1) Produce milk to increase income of farmers
 - (2) Produce dung which is an important fertilizer and soil conditioner
 - (3) Work as insect repellants
 - (4) Are a symbol of traditional ethics and values
23. What should be the suitable title for the above passage ?
- (1) Biocomposting
 - (2) Biopest Control
 - (3) Traditional Knowledge and Practice
 - (4) Uses of Chemical Fertilizers

Read the following passage and answer the next five questions.

India had an independent economy before the advent of the British rule. Though agriculture was the main source of livelihood for most people, yet, the country's economy was characterised by various kinds of manufacturing activities. India was particularly well known for its handicraft industries in the fields of cotton and silk textiles, metal and precious stone works etc. These products enjoyed a worldwide market based on the reputation of the fine quality of material used and the high standards of craftsmanship seen in all imports from India. The economic policies pursued by the colonial government in India were concerned more with the protection and promotion of the economic interests of their home country than with the development of the Indian economy. Such policies brought about a fundamental change in the structure of the Indian economy — transforming the country into a supplier of raw materials and consumer of finished industrial products from Britain. Obviously, the colonial government never made any sincere attempt to estimate India's national and per capita income. Some individual attempts which were made to measure such incomes yielded conflicting and inconsistent results. Among the notable estimators — Dadabhai Naoroji, William Digby, Findlay Shirras, V.K.R.V. Rao and R.C. Desai — it was Rao, whose estimates during the colonial period were considered very significant. However, most studies did find that the country's growth of aggregate real output during the first half of the twentieth century was less than two per cent coupled with a meagre half per cent growth in per capita output per year.

24. Before the British rule, India was well known for which manufacturing industries' products ?
- (1) Cotton and Silk or Khadi textiles
 - (2) Cotton and Engineering products
 - (3) Cotton and Silk textiles, metal and precious stones, etc
 - (4) Engineering goods and precious metals

25. What kind of interests was the colonial government concerned with in the economic policy for Indian industries ?
- (1) To promote the handicraft industries of India
 - (2) Promote and protect small scale industries of India
 - (3) Protect and promote the economic interests of Indian industry along with their home country
 - (4) Provide protection and promotion of the economic interests of their home country
26. Choose the economists who estimated India's National Income and Per Capita Income.
- (1) Dadabhai Naoroji, William Digby, Bernier, V.K.R.V. Rao and R.C. Desai
 - (2) Dadabhai Naoroji, William Digby, Findlay Shirras, V.K.R.V. Rao and R.C. Desai
 - (3) Dadabhai Naoroji, Jagdish Bhagwati, V.K.R.V. Rao and R.C. Desai
 - (4) Dadabhai Naoroji, Findlay Shirras and V.K.R.V. Rao
27. What was the country's growth of aggregate real output during the first half of the 20th century ?
- (1) The country's growth of aggregate real output was less than two percent coupled with a meagre one percent growth in per capita output per year.
 - (2) The country's growth of aggregate real output was less than two percent coupled with a meagre one and a half percent growth in per capita output per year.
 - (3) The country's growth of aggregate real output was less than two and a half percent coupled with a meagre half percent growth in per capita output per year.
 - (4) The country's growth of aggregate real output was less than two percent coupled with a meagre half percent growth in per capita output per year.
28. According to the passage, which of the following statement was true about Indian industries' products ?
- (1) Indian products were of inferior quality and cheap in the worldwide market.
 - (2) Indian products were promoted by the colonial government and competed with other countries' markets also.
 - (3) Indian products enjoyed a worldwide market based on quality of material used and the high standard of craftsmanship.
 - (4) Indian products' raw material for primary goods was imported from the other countries and it helped to increase export.

29. _____ is a market where economic agents can freely exchange their endowments with each other.

- (1) Market economy
- (2) Centrally planned economy
- (3) Aggregate demand based economy
- (4) Aggregate supply based economy

30. Which of the following are correct statements ?

- (A) Marginal Utility is the change in Total Utility due to consumption of one additional unit of commodity.
- (B) Two Indifference Curves intersect each other.
- (C) Marginal Utility becomes Zero at a level when Total Utility remains constant.
- (D) Diminishing Marginal Rate of Substitution does not affect Indifference Curve.
- (E) Indifference Curve slopes downwards from left to right.

Choose the correct answer from the options given below :

- (1) (A), (B) and (E) only
- (2) (A), (C) and (E) only
- (3) (A), (D) and (E) only
- (4) (B), (D) and (E) only

31. Match **List-I** with **List-II** :

List-I (Characteristic)	List-II (Implication)
(A) Equilibrium	(I) Plans of all the consumers and firms in the market match
(B) Excess supply	(II) Demand decreases with an increase in income
(C) Inferior good	(III) Supply is greater than market demand
(D) Price ceiling	(IV) Imposition of upper limit by government

Choose the correct answer from the options given below :

- (1) (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
- (2) (A) - (I), (B) - (III), (C) - (II), (D) - (IV)
- (3) (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
- (4) (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

SPACE FOR ROUGH WORK

32. When Elasticity of Demand Curve is 1 at every point on the Demand Curve, this curve is known as :
- (1) Perfectly inelastic demand curve
 - (2) Perfectly elastic demand curve
 - (3) Rectangular Hyperbola
 - (4) Greater than unitary demand curve
33. According to the Theory of Consumer Behaviour, Inequality $p_1x_1 + p_2x_2 \leq M$ is called the Consumer's _____ .
- (1) Budget
 - (2) Budget Set
 - (3) Budget Constraint
 - (4) Budget Behaviour
34. Choose the correct statements from the following :
- (A) Adam Smith is termed as Father of Modern Economics.
 - (B) J.M. Keynes gave the Theory of Income, Output and Employment.
 - (C) Four Sector Model = $C + I + G + (X - M)$
 - (D) Store of value is primary function of money.
- Choose the correct answer from the options given below :
- (1) (A), (B) and (D) only
 - (2) (A), (B) and (C) only
 - (3) (A), (B), (C) and (D)
 - (4) (B), (C) and (D) only
35. Rearrange the given statements in proper chronological sequence in an ascending order (earliest to latest) :
- (A) General theory of Employment, Interest and Money by Keynes.
 - (B) Mahalanobis was made a fellow of Britain's Royal Society.
 - (C) An Inquiry into the Nature and Cause of the Wealth of Nations by Adam Smith.
 - (D) The Economic Consequences of the Peace by Keynes.
- Choose the correct answer from the options given below :
- (1) (C), (D), (A), (B)
 - (2) (A), (B), (C), (D)
 - (3) (A), (C), (B), (D)
 - (4) (D), (A), (C), (B)
36. If there is no government and no foreign trade, then :
- (1) $G = T = M = X > 1$
 - (2) $G = T = M = X = 1$
 - (3) $G = T = M = X = 0$
 - (4) $G = T = M = X < 1$

37. The value of Nominal GDP is \$ 1100 and the value of Real GDP is \$ 1000. Find the value of GDP deflator.
- (1) 0.9 (2) 1.1
(3) 1 (4) 0.8
38. Identify the correct statements :
- (A) Stocks are defined over a period of time.
(B) Flows are defined over a period of time.
(C) Flows are defined at a particular point of time.
(D) Stocks are defined at a particular point of time.
(E) $GVA \text{ at factor costs} + \text{Indirect Taxes} - \text{Subsidies} = GVA \text{ at market prices}$.
- Choose the correct answer from the options given below :
- (1) (A), (C) and (E) only (2) (B), (C) and (D) only
(3) (B), (D) and (E) only (4) (C), (D) and (E) only
39. If the supply of final goods is assumed to be infinitely elastic at constant price over a short period of time, Aggregate output is determined solely by the value of Aggregate demand. This is called _____ Principle.
- (1) Aggregate supply (2) Aggregate demand
(3) Effective demand (4) Perfectly inelastic demand
40. Nominal Interest Rate = _____
- (1) Real Interest Rate \times Inflation Rate
(2) Real Interest Rate $-$ Inflation rate
(3) Real Interest Rate / Inflation rate
(4) Real Interest Rate $+$ Inflation rate
41. Value of MPS (Marginal Propensity to Save) is increased from 0.4 to 0.5. What would be the impact on Multiplier ?
- (1) The size of the multiplier would be increased.
(2) The size of the multiplier would remain same.
(3) Value of multiplier is undetermined with the given information.
(4) The size of the multiplier would be decreased.

42. Paradox of Thrift means :

- (1) If all the people of the economy increase the proportion of income they save, the total value of investment in the economy will not increase, it will either decline or remain unchanged.
- (2) If all the people of the economy increase the proportion of income they spend, the total value of savings in the economy will not increase, it will either decline or remain unchanged.
- (3) If all the people of the economy decrease the proportion of income they save, the total value of savings in the economy will not increase, it will either decline or remain unchanged.
- (4) If all the people of the economy increase the proportion of income they save, the total value of savings in the economy will not increase, it will either decline or remain unchanged.

43. _____ depicts what has actually happened.

- | | |
|--------------|--------------|
| (1) Ex-Ante | (2) Ex-Post |
| (3) Constant | (4) Variable |

44. If the value of Investment Multiplier is 5 and the increased income is ₹ 800 crore in an economy, then find the value of change in the investment in the economy.

- | | |
|------------------|-----------------|
| (1) ₹ 4000 crore | (2) ₹ 120 crore |
| (3) ₹ 400 crore | (4) ₹ 160 crore |

45. Which of the following statements are true ?

- (A) Quantitative tools control the extent of money supply by changing the CRR.
- (B) There are two types of open market operations – outright and upright.
- (C) A fall in the bank rate can decrease the money supply.
- (D) Selling of a bond by RBI leads to reduction in quantity of reserves.
- (E) The RBI can influence money supply by changing the rate at which it gives loan to the commercial banks.

Choose the correct answer from the options given below :

- (1) (A), (C) and (D) only
- (2) (A), (B) and (D) only
- (3) (B), (D) and (E) only
- (4) (A), (D) and (E) only

SPACE FOR ROUGH WORK

46. Match **List-I** with **List-II** :

List-I	List-II
(A) Bank Rate	(I) Securities are pledged in order to repurchase
(B) Marginal Standing Facility	(II) Minimum rate at which funds are provided for long term
(C) Repo Rate	(III) Also known as Penal Interest Rate
(D) Reverse Repo Rate	(IV) Central Bank borrows funds from commercial banks

Choose the correct answer from the options given below :

- (1) (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
- (2) (A) - (II), (B) - (III), (C) - (I), (D) - (IV)
- (3) (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
- (4) (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

47. Which of the following is **not** a function of Central Bank ?

- (1) It controls the money supply in the economy through different rates.
- (2) It acts as a banker to the government.
- (3) It accepts deposits and give loans to people.
- (4) It issues the currency of the country.

48. Article 112 deals with :

- | | |
|--------------------------------|----------------------|
| (1) Consolidated Fund of India | (2) Public Account |
| (3) Union Budget | (4) Contingency Fund |

49. All those elements which create liability and decrease the assets of government are known as :

- | | |
|----------------------|----------------------|
| (1) Capital Receipts | (2) Capital Payments |
| (3) Revenue Receipts | (4) Revenue Payments |

50. Arrange the following elements in correct chronological sequence (earliest to latest) :

- | | |
|---------------------------|------------------------------|
| (A) Smithsonian Agreement | (B) Bretton Woods Conference |
| (C) Establishment of WTO | (D) Gold Standard |

Choose the correct answer from the options given below :

- | | |
|------------------------|------------------------|
| (1) (A), (B), (C), (D) | (2) (D), (B), (A), (C) |
| (3) (D), (A), (B), (C) | (4) (C), (B), (D), (A) |

SPACE FOR ROUGH WORK

SPACE FOR ROUGH WORK

SPACE FOR ROUGH WORK

Read carefully the following instructions :

8. No candidate will be allowed to leave the OMR Answer Sheet blank. If any OMR Answer Sheet is found blank, it shall be crossed by the Invigilator with his/her signature, mentioning "Cancelled" on it.
9. Do not tear or fold any page of the Test Booklet and OMR Answer Sheet.
10. Candidates are advised to ensure that they fill the correct particulars on the OMR Answer Sheet, i.e., Application No., Roll No., Test Booklet No., Name, Mother's Name, Father's Name and Signature.
11. Rough work is to be done in the space provided for this purpose in the Test Booklet only.
12. The answers will be evaluated through electronic scanning process. Incomplete or incorrect entries may render the OMR Answer Sheet invalid.
13. Candidates are advised not to fold or make any stray marks on the OMR Answer Sheet. Use of Eraser, Nail, Blade, White Fluid/Whitener, etc., to smudge, scratch or damage in any manner the OMR Answer Sheet during examination is strictly prohibited. Candidature and OMR Answer Sheet of candidates using Eraser, Nail, Blade or White Fluid/Whitener to smudge, scratch or damage in any manner shall be cancelled.
14. There will be one copy of OMR Answer Sheet i.e., the Original Copy. After the examination is over, the candidate shall hand over the OMR Answer Sheet to the Invigilator. The candidate can take away the Test Booklet after the examination is over. If the candidate does not hand over the OMR Answer Sheet to the Invigilator and goes away with the OMR Answer Sheet, his/her candidature shall be cancelled and criminal proceedings shall also be initiated against him/her.
15. Candidates are advised strictly not to carry handkerchief, any mobile phone, any type of watch, belt or wear ornaments like ring, chain, ear-ring, etc., electronic or communication device, pen, pencil, eraser, sharpener and correction fluid to the Examination Centre. If any candidate is found possessing any such item, he/she will not be allowed to enter the examination centre. Possession of a mobile phone or any other aiding material as mentioned above by the candidate in the examination room will be treated as a serious violation and it may lead to cancellation of the candidature and debarring him/her from future examinations.
16. If a candidate violates any instructions or shows any indiscipline or misbehaviour, appropriate action will be taken including cancellation of candidature and debarring from future examinations.
17. Use of electronic/manual calculator is **not** allowed.

NATIONAL TESTING AGENCY

CUET (UG) 2024 : Final Answer Keys

Exam Date : 16.05.2024

Subject :309 - Economics / Business Economics (Hindi)

Q.No Key		Q.No Key		Q.No Key		Q.No Key		Q.No Key		Q.No Key		Q.No Key			
Book : A		Book : A		Book : B		Book : B		Book : C		Book : C		Book : D			
1	2	46	2	1	1	46	3	1	2	46	2	1	2	46	2
2	4	47	3	2	2	47	4	2	4	47	3	2	2	47	3
3	4	48	3	3	2	48	2	3	2	48	3	3	2	48	4
4	4	49	4	4	3	49	4	4	2	49	1	4	2	49	3
5	2	50	4	5	3	50	3	5	2	50	2	5	3	50	3
6	3			6	2			6	3			6	3		
7	3			7	1			7	4			7	3		
8	1			8	3			8	3			8	2		
9	2			9	2			9	3			9	2		
10	2			10	3			10	2			10	4		
11	2			11	3			11	2			11	3		
12	2			12	4			12	2			12	2		
13	4			13	4			13	3			13	2		
14	2			14	4			14	2			14	1		
15	3			15	2			15	3			15	3		
16	4			16	4			16	3			16	4		
17	3			17	4			17	2			17	2		
18	3			18	2			18	2			18	4		
19	2			19	3			19	4			19	3		
20	2			20	3			20	3			20	1		
21	2			21	1			21	2			21	2		
22	3			22	2			22	2			22	2		
23	2			23	2			23	1			23	3		
24	3			24	2			24	3			24	3		
25	3			25	2			25	4			25	2		
26	2			26	4			26	2			26	1		
27	2			27	2			27	4			27	3		
28	4			28	3			28	3			28	2		
29	3			29	4			29	1			29	3		
30	2			30	3			30	2			30	3		
31	2			31	3			31	2			31	4		
32	1			32	2			32	3			32	4		
33	3			33	2			33	3			33	4		
34	4			34	2			34	2			34	2		
35	2			35	3			35	1			35	4		
36	4			36	2			36	3			36	4		
37	3			37	3			37	2			37	2		
38	1			38	3			38	3			38	3		
39	2			39	2			39	3			39	3		
40	2			40	2			40	4			40	1		
41	3			41	4			41	4			41	2		
42	3			42	3			42	4			42	2		
43	2			43	2			43	2			43	2		
44	1			44	2			44	4			44	2		
45	3			45	1			45	4			45	4		