BBA/BCA/BJMC

NP-3440

B. B. A./B. C. A./B. J. M. C./Etc.
Examination, Dec. 2018
ENVIRONMENTAL STUDIES
(BBA/BCA/BJMC/Etc.-008)

Time : Three Hours]   *[Maximum Marks : 100*

Note : Attempt questions from all Sections as per instructions.

सभी खण्डों से निर्देशानुसार प्रश्न हल कीजिए ।

Section-A
खण्ड-अ
(Very Short Answer Questions)
(अति लघु उत्तरीय प्रश्न)

Answer all the *five* questions. Each question carries 4 marks. Very short answer is required not exceeding 75 words.   4×5=20

सभी **पाँच** प्रश्नों के उत्तर दीजिए । प्रत्येक प्रश्न 4 अंकों का है । अधिकतम 75 शब्दों में अति लघु उत्तर अपेक्षित है ।

(2)

1. AIDS.
   एड्स ।

2. Forest Conservation Act.
   वन संरक्षण अधिनियम ।

3. Noise pollution.
   ध्वनि प्रदूषण ।

4. Grassland ecosystem.
   घास इकोतन्त्र ।

5. Population explosion.
   जनसंख्या विस्फोट ।

Section-B
खण्ड-ब
(Short Answer Questions)
(लघु उत्तरीय प्रश्न)

Answer any *two* questions out of the following three questions. Each question carries 10 marks. Short answer is required not exceeding 200 words. 10×2=20

निम्नलिखित तीन प्रश्नों में से किन्हीं **दो** प्रश्नों के उत्तर दीजिए । प्रत्येक प्रश्न 10 अंकों का है । अधिकतम 200 शब्दों में लघु उत्तर अपेक्षित है ।

6. Write an essay on importance of forest.
   वनों के महत्त्व पर निबन्ध लिखिए ।

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7. Describe the different types of ecological pyramids.

विभिन्न प्रकार के पारितन्त्रीय पिरामिडों का वर्णन कीजिए ।

8. Write short notes on the following :

(a) Food chain and food web

(b) Biomagnification.

निम्नलिखित पर संक्षिप्त टिप्पणियाँ लिखिए :

(अ) खाद्य श्रृंखला व खाद्य जाल

(ब) जैवसंवर्द्धन ।

Section-C
खण्ड-स
(Detailed Answer Questions)
(विस्तृत उत्तरीय प्रश्न)

Answer any *three* questions out of the following five questions. Each question carries 20 marks. Answer is required in detail.   20×3=60

निम्नलिखित पाँच प्रश्नों में से किन्हीं **तीन** प्रश्नों के उत्तर दीजिए । प्रत्येक प्रश्न 20 अंकों का है । विस्तृत उत्तर अपेक्षित है ।

9. Define plant succession and describe hydrosere in detail.

पादप अनुक्रमण की परिभाषा लिखिए तथा जलक्रमक का विस्तृत वर्णन कीजिए ।

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10. Define biodiversity and describe *ex situ* and *in situ* conservation of biodiversity.

जैवविविधता की परिभाषा लिखिए तथा जैवविविधता के 'उत्स्थाने' व 'स्वस्थाने' संरक्षण का वर्णन कीजिए ।

11. Describe the structure and functions of any ecosystem studied by you.

अपने द्वारा पढ़े हुए किसी भी पारितन्त्र (इकोतन्त्र) की संरचना व कार्यों का वर्णन कीजिए ।

12. Write notes on the following :

(a) Hot spots of biodiversity

(b) Acid rain.

निम्नलिखित पर टिप्पणियाँ लिखिए :

(अ) जैवविविधता के हॉट स्पॉट

(ब) अम्ल वर्षा ।

13. Write notes on the following :

(a) Endemism

(b) Ozone layer depletion.

निम्नलिखित पर टिप्पणियाँ लिखिए :

(अ) एण्डमिज्म

(ब) ओजोन परत का अवक्षय ।

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BBA/BCA/BJMC

Roll No. ....

NP-3440

B. B. A./B. C. A./B. J. M. C./Etc.

Examination, Dec. 2018

ENVIRONMENTAL STUDIES

(BBA/BCA/BJMC/Etc.-008)

Time : Three Hours]   *[Maximum Marks : 100*

Note : Attempt questions from all Sections as per instructions.

सभी खण्डों से निर्देशानुसार प्रश्न हल कीजिए ।

Section-A

खण्ड-अ

(Very Short Answer Questions)

(अति लघु उत्तरीय प्रश्न)

Answer all the *five* questions. Each question carries 4 marks. Very short answer is required not exceeding 75 words.   4×5=20

सभी पाँच प्रश्नों के उत्तर दीजिए । प्रत्येक प्रश्न 4 अंकों का है । अधिकतम 75 शब्दों में अति लघु उत्तर अपेक्षित है ।

1. AIDS.

   एड्स ।

2. Forest Conservation Act.

   वन संरक्षण अधिनियम ।

3. Noise pollution.

   ध्वनि प्रदूषण ।

4. Grassland ecosystem.

   घास इकोतन्त्र ।

5. Population explosion.

   जनसंख्या विस्फोट ।

Section-B

खण्ड-ब

(Short Answer Questions)

(लघु उत्तरीय प्रश्न)

Answer any *two* questions out of the following three questions. Each question carries 10 marks. Short answer is required not exceeding 200 words. 10×2=20

निम्नलिखित तीन प्रश्नों में से किन्हीं दो प्रश्नों के उत्तर दीजिए । प्रत्येक प्रश्न 10 अंकों का है । अधिकतम 200 शब्दों में लघु उत्तर अपेक्षित है ।

6. Write an essay on importance of forest.

   वनों के महत्त्व पर निबन्ध लिखिए ।

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7. Describe the different types of ecological pyramids.

विभिन्न प्रकार के पारितन्त्रीय पिरामिडों का वर्णन कीजिए ।

8. Write short notes on the following :
   (a) Food chain and food web
   (b) Biomagnification.

निम्नलिखित पर संक्षिप्त टिप्पणियाँ लिखिए :

(अ) खाद्य श्रृंखला व खाद्य जाल

(ब) जैवसंवर्धन ।

Section-C
खण्ड-स
(Detailed Answer Questions)
(विस्तृत उत्तरीय प्रश्न)

Answer any *three* questions out of the following five questions. Each question carries 20 marks. Answer is required in detail.   20×3=60

निम्नलिखित पाँच प्रश्नों में से किन्हीं तीन प्रश्नों के उत्तर दीजिए । प्रत्येक प्रश्न 20 अंकों का है । विस्तृत उत्तर अपेक्षित है ।

9. Define plant succession and describe hydrosere in detail.

पादप अनुक्रमण की परिभाषा लिखिए तथा जलक्रमक का विस्तृत वर्णन कीजिए ।

NP-3440

10. Define biodiversity and describe *ex situ* and *in situ* conservation of biodiversity.

जैवविविधता की परिभाषा लिखिए तथा जैवविविधता के 'उत्स्थाने' व 'स्वस्थाने' संरक्षण का वर्णन कीजिए ।

11. Describe the structure and functions of any ecosystem studied by you.

अपने द्वारा पढ़े हुए किसी भी पारितन्त्र (इकोतन्त्र) की संरचना व कार्यों का वर्णन कीजिए ।

12. Write notes on the following :
    (a) Hot spots of biodiversity
    (b) Acid rain.

निम्नलिखित पर टिप्पणियाँ लिखिए :

(अ) जैवविविधता के हॉट स्पॉट

(ब) अम्ल वर्षा ।

13. Write notes on the following :
    (a) Endemism
    (b) Ozone layer depletion.

निम्नलिखित पर टिप्पणियाँ लिखिए :

(अ) एण्डमिज्म

(ब) ओजोन परत का अवक्षय ।

NP-3440-4-

(20518)

Roll No. ....

BBA/BCA/BJMC/BPT/ETC.

NP-3440

BBA/BCA/BFA/ETC. Examination, May 2018

ENVIRONMENTAL STUDIES

(BBA/BCA/BFA-008)

Time : *Three Hours*]　　　　　[*Maximum Marks : 100*

Note : This paper is divided into three Sections– A, B and C. Section–A contains Descriptive Answer Questions, Section–B contains Short Answer Questions and Section–C contains Very Short Answer Questions. Attempt all the Sections as per instructions.

इस प्रश्न-पत्र को तीन खण्डों–अ, ब तथा स में विभाजित किया गया है । खण्ड-अ में विस्तृत उत्तरीय प्रश्न, खण्ड-ब में लघु उत्तरीय प्रश्न तथा खण्ड-स में अति लघु उत्तरीय प्रश्न हैं । सभी खण्डों को निर्देशानुसार हल कीजिए ।

Section-A

खण्ड–अ

(Descriptive Answer Questions)

(विस्तृत उत्तरीय प्रश्न)

This Section contains *six* questions, attempt any *three* questions. Each question carries 20 marks. Answer must be descriptive.　　　　20×3=60

इस खण्ड में छ: प्रश्न हैं, किन्हीं **तीन** प्रश्नों को हल कीजिए । प्रत्येक प्रश्न 20 अंकों का है । विस्तृत उत्तर अपेक्षित है ।

1.　Write an essay on Air Pollution.

वायु प्रदूषण पर एक निबन्ध लिखिए ।

2.　Write an essay on importance of forest.

वन के महत्त्व पर निबन्ध लिखिए ।

3.　Describe the structure and function of an ecosystem studied by you.

अपने द्वारा पढ़े हुए किसी एक ईकोतन्त्र की संरचना तथा कार्य का वर्णन कीजिए ।

4.　Give an account of *in situ* an *ex situ* conservation of biodiversity.

'स्व स्थाने' तथा 'उत्स्थाने' जैवविविधता संरक्षण पर लेख लिखिए ।

5.　Write short notes on any two of the following :

　(a)　Soil erosion

　(b)　Renewable and non-renewable energy sources

　(c)　Grassland ecosystem.

निम्नलिखित में से किन्हीं दो पर संक्षिप्त टिप्पणियाँ लिखिए :

　(a)　मृदा अपरदन

　(b)　नवीकरणीय तथा अनवीकरणीय ऊर्जा स्रोत

　(c)　घासक्षेत्र इकोतन्त्र ।

NP-3440

6. Give an account of ecological succession.

पारिस्थितिक अनुक्रमण पर लेख लिखिए ।

Section-B

खण्ड-ब

(Short Answer Questions)

(लघु उत्तरीय प्रश्न)

This Section contains *three* questions, attempt any *two* questions. Each question carries 10 marks.   10×2=20

इस खण्ड में तीन प्रश्न हैं, किन्हीं **दो** प्रश्नों को हल कीजिए । प्रत्येक प्रश्न 10 अंकों का है ।

7. Give an account of energy flow in an ecosystem.

किसी इकोतन्त्र में ऊर्जा प्रवाह पर लेख लिखिए ।

8. Write an essay on environment and human health.

वातावरण व मानव स्वास्थ्य पर निबन्ध लिखिए ।

9. Write notes on the following :

(a) Global warming

(b) Acid rain.

निम्नलिखित पर टिप्पणियाँ लिखिए :

(a) पृथ्वी उष्मायन

(b) अम्ल वर्षा ।

Section C

खण्ड स

(Very Short Answer Questions)

(अति लघु उत्तरीय प्रश्न)

This Question contains five parts, *all* parts are compulsory. Each part carries 4 marks.   4×5=20

इस प्रश्न के पाँच भाग हैं, **सभी** भाग अनिवार्य हैं । प्रत्येक भाग 4 अंकों का है ।

10. (i) Environment Protection Act

पर्यावरण संरक्षण अधिनियम

(ii) Human Rights

मानव अधिकार

(iii) Earthquake

भूकम्प

(iv) Ozone layer depletion.

ओजोन स्तर अवक्षय ।

(v) Hot spots of Biodiversity

जैवविविधता के हॉटस्पॉट ।

G

(21218)   Roll No. ....

BCA-I Sem.

18004

B. C. A. Examination, Dec. 2018

Business Communication

(BCA-106)

(New Course)

Time : Three Hours]   [Maximum Marks : 75

Section-A

(Very Short Answer Questions)

Attempt all the five questions. Each question carries 3 marks. Very short answer is required not exceeding 75 words.   3×5=15

1. What do you mean by good news letter ?

2. Define the term 'enclosures'.

3. What is teleprinter ?

---

4. Suggest the five steps which are used to write a good report.

5. How can the 'grapevine' help in raising the morale of the workers ?

Section-B

(Short Answer Questions)

Attempt any two questions out of the following three questions. Each question carries 7½ marks. Short answer is required not exceeding 200 words. 7½×2=15

1. How can oral communication be made effective ?

2. Give the differences between official letters and business letters.

3. Discuss in detail any two types of interviews.

Section-C

(Detailed Answer Questions)

Attempt any three questions out of the following five questions. Each question carries 15 marks. Answer is required in detail.   15×3=45

18004

1. What do you understand by oral presentation ? Discuss the factors affecting the oral presentation.

2. What do you understand by "good news letters" ? Give a specimen of good news letters.

3. Write short notes on the following :
   (a) Office orders
   (b) Office circulars
   (c) Office memorandums.

4. (a) What precautions would be taken while preparing an oral report ?
   (b) Discuss in detail the 7C's communication.

5. "Communication is an essential part of a business." Explain this statement.

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(21218)
BCA-I Sem.

Roll No. ....

18003

B. C. A. Examination, Dec. 2018

Principles of Management

(BCA-104)

(New Course)

Time : Three Hours]　　　　　[Maximum Marks : 75

Note : Attempt questions from all Sections as per instructions.

Section-A

(Very Short Answer Questions)

Answer all the *five* questions. Each question carries 3 marks. Very short answer is required not exceeding 75 words.　　　　　　　　　3×5=15

1.　What are the social responsibilities of business?

2.　What is 'Organization Chart' ?

3.　Explain the concept of management of change.

4.　What are different managerial skills ?

5.　Write the steps of controlling.

Section-B

(Short Answer Questions)

Answer any *two* questions out of the following three questions. Each question carries 7½ marks. Short answer is required not exceeding 200 words. 7½×2=15

6.　Define strategy. Explain its meaning.

7.　Define stress. Explain the concepts of stress management.

18003

8. Distinguish between authority and responsibility.

13. Describe the process of strategy formulation.

Section-C

(Detailed Answer Questions)

Answer any *three* questions out of the following five questions. Each question carries 15 marks. Answer is required in detail. 15×3=45

9. What do you understand by leadership ? Examine the different styles of leadership and their importance.

10. Explain system approach of modern management theory.

11. Explain the various causes of resistance to change.

12. Describe the concepts of total quality management. What are the emerging issues and challenges in quality management ?

18003

18003-4-

G
(21218)
BCA-I Sem.

Roll No. ....

18002

B. C. A. Examination, Dec. 2018

Programming Principles & Algorithm

(BCA-102)

(New Course)

Time : Three Hours]   *[Maximum Marks : 75*

Note : Attempt questions from all Sections as - per instructions.

Section-A

(Very Short Answer Questions)

Answer all the *five* questions. Each question carries 3 marks. Very short answer is required not exceeding 75 words.   3×5=15

1. What do you mean by primitive and non-primitive data types ?

2. What is Algorithm ? Define with example.

3. Explain the working of 'Nested if-else' with suitable example.

4. What is the use of get ch ( ) and get char ( ) functions in C language ?

5. Explain the use of break and continue statement.

Section-B

(Short Answer Questions)

Answer any *two* questions out of the following three questions. Each question carries 7½ marks. Short answer is required not exceeding 200 words. 7½×2=15

6. Write down the algorithm for solving towers of Hanoi problem.

18002

7. What is function ? Also explain the types of functions.

8. Explain the time and space complexity.

Section-C

(Detailed Answer Questions)

Answer any *three* questions out of the following five questions. Each question carries 15 marks. Answer is required in detail. 15×3=45

9. Write an algorithm for finding maximum element of an array perform best, worst and average case complexity with appropriate order notations.

(10. Differentiate between flowchart and algorithm. Write an algorithm to compute the Fibonacci series for 'n' terms.

11. What is operator ? Explain the different types of operator in 'C'.

12. What is the use of loops in 'C' ? Also explain the types of loop with suitable example.

13. Write the asymptotic notations used for best case, average case and worst case analysis of algorithms.

G

(21218)

Roll No. ....

BCA-I Sem.

18005

B. C. A. Examination, Dec. 2018

MATHEMATICS-I

(BCA-101)

(New Course)

Time : Three Hours]   *[Maximum Marks : 75*

Note : Attempt questions from all Sections as per instructions.

Section-A

(Very Short Answer Questions)

Attempt all the *five* questions. Each question carries 3 marks. Very short answer is required.

3×5=15

1. Show that $A = \begin{bmatrix} 3 & 1+2i \\ 1-2i & 2 \end{bmatrix}$ is Hermitian.

2. Define limit of a function at a point.

3. Find the asymptotes of the curve $\dfrac{a^2}{x^2} - \dfrac{b^2}{y^2} = 1$.

4. State fundamental theorem of calculus.

5. Define vector in 2-dimension with example.

Section-B

(Short Answer Questions)

Attempt any *two* questions out of the following three questions. Each question carries 7½ marks. Short answer is required.   7½×2=15

6. Determine the values of a, b, c for which the function :

$$f(x) = \begin{cases} \dfrac{\sin(a+1)x + \sin x}{x} & \text{for } x < 0 \\ c & \text{for } x = 0 \\ \dfrac{(x+bx^2)^{1/2} - x^{1/2}}{bx^{3/2}} & \text{for } x > 0 \end{cases}$$

is continuous at $x = 0$.

18005

7. If $y = a \cos (\log x) + b \sin (\log x)$, show that :

$x^2 y_2 + xy_1 + y = 0$ and $x^2 y_{n+2} + (2n+1)xy_{n+1} + (n^2+1)y_n = 0$.

8. Calculate the area of parallelogram spanned by the vectors $a = (1, -1, 3)$ and $b = (2, -7, 1)$.

Section-C

(Detailed Answer Questions)

Attempt any *three* questions out of the following five questions. Each question carries 15 marks. Answer is required in detail. 15×3=45

9. Verify Cayley -Hamilton theorem for the matrix :

$$A = \begin{bmatrix} 1 & 2 & 2 \\ 2 & 1 & 2 \\ 2 & 2 & 1 \end{bmatrix}.$$

Also determine the characteristic roots and corresponding characteristic vector of the matrix A.

10. Check the continuity of the following functions at $x = 0$:

(i) $f(x) = \dfrac{|x|}{x}$ for $x \neq 0$ and $f(0) = 0$

(ii) $f(x) = \dfrac{e^{1/x} \sin(1/x)}{1 + e^{1/x}}$ for $x \neq 0$ and $f(0) = 0$.

11. Trace the curve $9ay^2 = (x - 2a)(x - 5a)^2$.

12. (i) Expand $\dfrac{e^x}{e^x + 1}$ by Maclaurin's theorem.

(ii) Expand $\log x$ in power of $(x - 1)$ by Taylor's theorem.

13. Evaluate :

(i) $\int \tan^4 x \, dx$

(ii) $\int \dfrac{\cos 2x - \cos 2\alpha}{\cos x - \cos \alpha} dx$.