



**MODIFIED CBCS CURRICULUM OF
GEOGRAPHY HONOURS PROGRAMME**

SUBJECT CODE = 05

FOR UNDER GRADUATE COURSES UNDER RANCHI UNIVERSITY



Implemented from
Academic Session 2017-2020



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*Submitted for publication
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[Signature]
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13/4/18

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COURSE STRUCTURE FOR UNDERGRADUATE 'HONOURS' PROGRAMME

Table AI-1: Distribution of 140 Credits [*wherever there is a practical there will be no tutorial and vice –versa.]

Course	Papers	Credits	
		Theory + Practical	Theory + Tutorial
I. Core Course	(CC 1 to 14)		
Theory	14 Papers	14X4=56	14X5=70
Practical/Tutorial*	14 Papers	14X2=28	14X1=14
II. Elective Course (EC)			
A. Discipline Specific Elective	(DSE 1 to 4)		
Theory	4 Papers	4X4=16	4X5=20
Practical/ Tutorial*	4 Papers	4X2=8	4X1=4
B. Generic Elective/ Interdisciplinary	(GE 1 to 4)		
Theory	4 Papers	4X4=16	4X5=20
Practical/ Tutorial*	4 papers	4X2=8	4X1=4
III. Ability Enhancement Compulsory Courses (AECC)			
1. English/ Hindi Communication/ NH+MB / Business Communication for Commerce	1 Paper	1X2=2	1X2=2
2. Environmental Science	1 Paper	1x2=2	1x2=2
3. Skill Enhancement Course of the Core Course opted	(SEC 1 & 2) 2 Papers	2X2=4	2X2=4
Total Credit = 140			= 140

Table AI-1.1: Course structure for B.Sc./ B.A./ B.Com.(Hons. Programme)

Semester	Honours (Core Courses) 14 Papers	Allied (Elective Courses) 8 Papers	Ability Enhancement (Compulsory Courses) 4 Papers	Total Credits
Sem-I	C-1, C-2 (6+6=12 Credits)	GE-1 (06 Credits)	Eng / Hindi Comm/ NH + MB (02 Credits)	20 Credits
Sem-II	C-3, C-4 (6+6=12 Credits)	GE-2 (06 Credits)	EVS (02 Credits)	20 Credits
Sem-III	C-5, C-6, C-7 (6+6+6=18 Credits)	GE-3 (06 Credits)	SEC-1 (02 Credits)	26 Credits
Sem-IV	C-8, C-9, C-10 (6+6+6=18 Credits)	GE-4 (06 Credits)	SEC-2 (02 Credits)	26 Credits
Sem-V	C-11, C-12 (6+6=12 Credits)	DSE-1, DSE-2 (6+6=12 Credits)		24 Credits
Sem-VI	C-13, C-14 (6+6=12 Credits)	DSE-3, DSE-4 (6+6=12 Credits)		24Credits

Total = 140 Credits

COURSES OF STUDY FOR UNDERGRADUATE 'Geography Hons' PROGRAMME

Table AI-2 Subject Combinations allowed for Geography Hons. Programme (140 Credits)

Honours/Core Subject CC 14 Papers	Discipline Specific Elective Subject DSES 4 Papers	Skill Enhancement Course SEC 2 Papers	Compulsory Course AECC 1+1=2 Papers
Geography	Geography Specific	SEC in Geography	Language Communication + EVS

Table AI-2.1 Semester wise Examination Structure for Mid Sem & End Sem Examinations:

Sem	Core Honours, Allied DSE, Compulsory AECC Courses		Examination Structure		
	Code	Papers	Mid Semester Theory (F.M.)	End Semester Theory (F.M.)	End Semester Practical/ Viva (F.M.)
I	C1	Geomorphology + Lab	15	60	50
	C2	Oceanography + Lab	15	60	
	GE1	Refer Table AI-2.3 of the Syllabus of Subject opted			
	AECC	Language Communication		100	
II	C3	Human Geography + Lab	15	60	50
	C4	Resource Geography + Lab	15	60	
	GE2	Refer Table AI-2.3 of the Syllabus of Subject opted			
	AECC	EVS		100	
III	C5	Climatology + Lab	15	60	75
	C6	Geography of India + Lab	15	60	
	C7	Geography of Jharkhand + Lab	15	60	
	GE3	Refer Table AI-2.3 of the Syllabus of Subject opted			
	SEC 1	Elementary Computer Application Software + Lab		100	
IV	C8	Economic Geography + Survey	15	60	75
	C9	Environmental Geography + Survey	15	60	
	C10	Population Geography + Survey	15	60	
	GE4	Refer Table AI-2.3 of the Syllabus of Subject opted			
	SEC 2	Hydrology + Project		75	25
V	C11	Geographical Thought + Survey	15	60	50
	C12	Settlement Geography + Survey	15	60	
	DSE 1	Urban Geography + Project	25	75	50
	DSE 2	Social Geography + Project	25	75	
VI	C13	Regional Planning and Development + Dissertation	15	60	50
	C14	Agriculture Geography + Dissertation	15	60	
	DSE 3	Political Geography + Project	15	60	50
	DSE 4	Bio Geography + Project	15	60	

**Table AI-2.2 Generic Subject Papers for B. A. Hons. Programme (140 Credits);
All Four Papers of Any One Subject to be opted leaving aside the papers of Hons. Subject:**

Generic Elective Subject GE 4 Papers	Generic Elective Courses for Arts Stream (GE will be other than Core Subject opted)			
	Semester I GE1	Semester II GE2	Semester III GE3	Semester IV GE4
Hindi	कला और साहित्य +T	अनुवाद +T	साहित्य और पत्रकारिता +T	रचनात्मक लेखन की विधाएँ +T
English	Academic Writing +T	Language & Linguistics +T	Literature: Poems & Short Stories +T	Language, Literature & Culture +T
Bengali	History of Bengali Literature +T	Bengali Poetry, Novel, Short Stories +T	Bengali Poetry, Drama, Short Stories +T	Bengali Poetry, Short Stories, Bengali Essay +T
Urdu	Study of Poet Nazir Akbarabadi +T	Study of Short Story Writer Prem Chand +T	Mass Media: Principles and Practice +T	Study of Short Story Writer +T
Sanskrit	संस्कृत व्याकरण एवं व्याकरण शास्त्र का इतिहास +T	भारतीय संस्कृति एवं राजनीति +T	आयुर्वेद की परम्परा +T	भाषाविज्ञान +T
Ho	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	हो समुदाय की नृत्य शैलियाँ +T
Kharia	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	खड़िया समुदाय की नृत्य शैलियाँ +T
Khortha	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	खोरठा समुदाय की नृत्य शैलियाँ +T
Kurmali	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	कुरमाली समुदाय की नृत्य शैलियाँ +T
Kurux	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	कुँडुख समुदाय की नृत्य शैलियाँ +T
Mundari	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	मुण्डा समुदाय की नृत्य शैलियाँ +T
Nagpuri	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	नागपुरी समुदाय की नृत्य शैलियाँ +T
Panch Pargania	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	पंचपरगनिया समुदाय की नृत्य शैलियाँ +T
Santhali	कला, साहित्य एवं संस्कृति +T	पारम्परिक वाद्य यंत्र +T	झारखण्डी समुदाय का सांस्कृतिक केन्द्र +T	संताल समुदाय की नृत्य शैलियाँ +T
History	Environmental Issues in India +T	Making of Contemporary India +T	History of West Asia +T	India and her Neighbours +T
Political Science	An Introduction to Political Theory +T	Indian Govt. and Politics +T	Comparative Govt. and Politics +T	Public Administration +T
Psychology	Introduction of psychology +Lab	Social psychology +Lab	Psychopathology +Lab	Psychological Statistics +Lab
Sociology	Indian Society and Culture +T	Social Movement in India +T	Sociology of Religion +T	Indian Sociological Theories +T
Economics	Principals of Microeconomics +T	Principals of Macroeconomics +T	Indian Economy +T	Money Banking, Public Finance & International Trade +T
Anthropology	Economic Anthropology +T	Political Anthropology +T	Anthropology of Religion +T	Linguistic Anthropology +T
Philosophy	Indian Philosophy-I +T	Indian Philosophy-II +T	Indian Ethics +T	Western Ethics +T
Home Science	Human Nutrition +Lab	Entrepreneurship for small Catering units +Lab	Current concerns in Public Health Nutrition +T	Care and Wellbeing in Human Development +Lab
Mathematics	Object oriented Programming in C++ +T	Econometrics +T	Information Security +T	Application of Algebra +T

Table AI-2.3 Semester wise Structure for End Sem Examinations of Generic Elective in Geography:

Sem	Core Honours, Allied DSE, Compulsory AECC Courses		Examination Structure		
	Code	Papers	Mid Semester Theory (F.M.)	End Semester Theory (F.M.)	End Semester Practical/ Viva (F.M.)
I	GE1	Geomorphology + Lab		75	25
II	GE2	Human Geography + Lab		75	25
III	GE3	Climatology + Lab		75	25
IV	GE4	Economic Geography + Lab		75	25

SEMESTER I**4 Papers****Total 100 x 4 = 400 Marks****I. ABILITY ENHANCEMENT COMPULSORY COURSE (AECC)**

(Credits: Theory-02)

Any One Compulsory Language Communication Prescribed by Ranchi University:

English Communication/ Hindi Communication / NH + MB Communication

(Refer AECC Curriculum of Ranchi University)**II. GENERIC ELECTIVE (GE 1)**

(Credits: 06)

All Four Papers (One paper to be studied in each semester) of any One Subject to be opted other than the Honours Subject. Refer Content from the Syllabus of Opted Generic Elective Subject.

III. CORE COURSE –C 1:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

GEOMORPHOLOGY**Theory: 60 Lectures**

1. Geomorphology: Nature and Scope.
2. Earth: Interior Structure and Isostasy.
3. Earth Movements: Plate Tectonics, Types of Folds and Faults, Earthquakes and Volcanoes
4. Geomorphic Processes: Weathering, Cycle of Erosion (Davis).
5. Evolution of Landforms (Erosional and Depositional): Fluvial, Karst, Aeolian and Glacial.

Reading List

- Bloom A. L., 2003: *Geomorphology: A Systematic Analysis of Late Cenozoic Landforms*, Prentice-Hall of India, New Delhi.
- Bridges E. M., 1990: *World Geomorphology*, Cambridge University Press, Cambridge.
- Christopherson, Robert W., (2011), *Geosystems: An Introduction to Physical Geography*, 8 Ed., Macmillan Publishing Company

- Kale V. S. and Gupta A., 2001: *Introduction to Geomorphology*, Orient Longman, Hyderabad.
- Knighton A. D., 1984: *Fluvial Forms and Processes*, Edward Arnold Publishers, London.
- Richards K. S., 1982: *Rivers: Form and Processes in Alluvial Channels*, Methuen, London.
- Selby, M.J., (2005), *Earth's Changing Surface*, Indian Edition, OUP
- Skinner, Brian J. and Stephen C. Porter (2000), *The Dynamic Earth: An Introduction to physical Geology*, 4th Edition, John Wiley and Sons
- Thornbury W. D., 1968: *Principles of Geomorphology*, Wiley.
- Gautam, A (2010): *Bhautik Bhugol*, Rastogi Publications, Meerut
- Tikkaa, R N (1989): *Bhautik Bhugol ka Swaroop*, Kedarnath Ram Nath, Meerut
- Singh, S (2009): *Bhautik Bhugol ka Swaroop*, Prayag Pustak, Allahabad
- Tiwary Ram Kumar, *Bhautik bhugol*, Rajasthan Hindi Granth Academy, Jaipur

IV. CORE COURSE- C 2:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75

Pass Marks: Th (MSE +ESE) = 30

Instruction to Question Setter for

Mid Semester Examination (MSE):

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

OCEANOGRAPHY

Theory: 60 Lectures

1. Ocean Floor Topography-Indian Ocean Pacific Ocean and Atlantic Ocean
2. Oceanic Movements – Waves, Currents and Tides.
3. Ocean Salinity and Temperature – Distribution and Determinants.
4. Coral Reefs- Types and Theories of Origin
5. Marine Deposits & Ocean Resources

Reading List

- Andrew. D. Ward and Stanley, Trimble (2004): *Environmental Hydrology*, 2nd edition, Lewis Publishers, CRC Press.
- Karanth, K.R., 1988 : *Ground Water: Exploration, Assessment and Development*, Tata- McGraw Hill, New Delhi.
- Ramaswamy, C. (1985): *Review of floods in India during the past 75 years: A Perspective*. Indian National Science Academy, New Delhi.
- Rao, K.L., 1982 : *India's Water Wealth* 2nd edition, Orient Longman, Delhi,.
- Singh, Vijay P. (1995): *Environmental Hydrology*. Kluwer Academic Publications, The Netherlands.
- Anikouchine W. A. and Sternberg R. W., 1973: *The World Oceans: An Introduction to Oceanography*, Prentice-Hall.
- Garrison T., 1998: *Oceanography*, Wordsworth Company, Belmont.

- Kershaw S., 2000: *Oceanography: An Earth Science Perspective*, Stanley Thorne, UK.
- Pinet P. R., 2008: *Invitation to Oceanography* (Fifth Edition), Jones and Barlett Publishers, USA, UK and Canada.
- Sharma R. C. and Vatal M., 1980: *Oceanography for Geographers*, Chaitanya Publishing House, Allahabad.
- Sverdrup K. A. and Armbrust, E. V., 2008: *An Introduction to the World Ocean*, McGraw Hill, Boston.
- Singh, M., Singh, R.B. and Hassan, M.I. (Eds.) (2014) *Landscape ecology and water management. Proceedings of IGU Rohtak Conference, Volume 2.*
- *Advances in Geographical and Environmental Studies*, Springer

GEOGRAPHY PRACTICAL- C1 + C2 LAB

60 Lectures

Marks : Pr (ESE: 3Hrs) =50

Pass Marks: Pr (ESE) = 20

Instruction to Question Setter for

End Semester Examination (ESE):

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	= 30 marks
<i>Practical record notebook</i>	= 10 marks
<i>Viva-voce</i>	= 10 marks

PRACTICAL - CARTOGRAPHIC TECHNIQUES

Theory: 60 Lectures

1. Scales – Concept and application; Graphical Construction of Plain
3. Map Projections – Classification, Properties and Uses; Graphical Construction of Polar Zenithal Stereographic Projection, Simple Conical Projection with One standard parallel and Two standard parallel, Bonne's Projections.
4. Topographical Map – Concept and Interpretation of a Mountain /plateau area .
5. Profiles- Cross profiles

Reading List

- 1. Anson R. and Ormelling F. J., 1994: *International Cartographic Association: Basic Cartographic Vol.* Pregmen Press.
- 2. Gupta K.K. and Tyagi, V. C., 1992: *Working with Map*, Survey of India, DST, New Delhi.
- 3. Mishra R.P. and Ramesh, A., 1989: *Fundamentals of Cartography*, Concept, New Delhi.
- 4. Monkhouse F. J. and Wilkinson H. R., 1973: *Maps and Diagrams*, Methuen, London.
- Rhind D. W. and Taylor D. R. F., (eds.), 1989: *Cartography: Past, Present and Future*, Elsevier, International Cartographic Association.
- Robinson A. H., 2009: *Elements of Cartography*, John Wiley and Sons, New York.
- Sharma J. P., 2010: *Prayogic Bhugol*, Rastogi Publishers, Meerut.
- Singh R. L. and Singh R. P. B., 1999: *Elements of Practical Geography*, Kalyani Publishers.
- Sarkar, A. (2015) *Practical geography: A systematic approach*. Orient Black Swan Private Ltd., New Delhi
- Singh R L & Rana P B Singh (1991) *Prayogtmak Bhugol ke Mool Tatva*, Kalyani Publishers, New Delhi
- Sharma, J P (2010) *Prayogtmak Bhugol ki Rooprekha*, Rastogi Publications, Meerut
- Singh, R L & Dutta, P K (2012) *Prayogtmak Bhugol*, Central Book Depot, Allahabad

SEMESTER II

4 Papers**Total 100 x 4 = 400 Marks****I. ABILITY ENHANCEMENT COMPULSORY COURSE (AECC)**

(Credits: Theory-02)

Marks : 100 (ESE: 3Hrs) =100**Pass Marks Th ESE = 40*****Instruction to Question Setter for******End Semester Examination (ESE):***

*There will be **objective type test** consisting of hundred questions of 1 mark each. Examinees are required to mark their answer on **OMR Sheet** provided by the University.*

AECC – ENVIRONMENT STUDIES**Theory: 30 Lectures****Unit 1 : Introduction to environmental studies**

Multidisciplinary nature of environmental studies;

Scope and importance; Concept of sustainability and sustainable development.

(2 lectures)**Unit 2 : Ecosystems**

What is an ecosystem? Structure and function of ecosystem; Energy flow in an ecosystem: food chains, food webs and ecological succession. Case studies of the following ecosystems :

Forest ecosystem

Grassland ecosystem

Desert ecosystem

Aquatic ecosystems (ponds, streams, lakes, rivers, oceans, estuaries)

(2 lectures)**Unit 3 : Natural Resources : Renewable and Non--renewable Resources**

Land resources and land use change; Land degradation, soil erosion and desertification.

Deforestation: Causes and impacts due to mining, dam building on environment, forests, biodiversity and tribal populations.

Water : Use and over--exploitation of surface and ground water, floods, droughts, conflicts over water (international & inter--state).

Energy resources : Renewable and non renewable energy sources, use of alternate energy sources, growing energy needs, case studies.

(5 lectures)**Unit 4 : Biodiversity and Conservation**

Levels of biological diversity : genetic, species and ecosystem diversity; Biogeographic zones of India; Biodiversity patterns and global biodiversity hot spots

India as a mega--biodiversity nation; Endangered and endemic species of India

Threats to biodiversity : Habitat loss, poaching of wildlife, man--wildlife conflicts, biological invasions; Conservation of biodiversity : In--situ and Ex--situ conservation of biodiversity. Ecosystem and biodiversity services: Ecological, economic, social, ethical, aesthetic and Informational value.

(5 lectures)

Unit 5 : Environmental Pollution

Environmental pollution : types, causes, effects and controls; Air, water, soil and noise pollution

Nuclear hazards and human health risks

Solid waste management : Control measures of urban and industrial waste.

Pollution case studies.

(5 lectures)

Unit 6 : Environmental Policies & Practices

Climate change, global warming, ozone layer depletion, acid rain and impacts on human communities and agriculture

Environment Laws: Environment Protection Act; Air (Prevention & Control of Pollution) Act; Water (Prevention and control of Pollution) Act; Wildlife Protection Act; Forest Conservation Act. International agreements: Montreal and Kyoto protocols and Convention on Biological Diversity (CBD).

Nature reserves, tribal populations and rights, and human wildlife conflicts in Indian context.

(4 lectures)

Unit 7 : Human Communities and the Environment

Human population growth: Impacts on environment, human health and welfare.

Resettlement and rehabilitation of project affected persons; case studies.

Disaster management : floods, earthquake, cyclones and landslides.

Environmental movements : Chipko, Silent valley, Bishnois of Rajasthan.

Environmental ethics: Role of Indian and other religions and cultures in environmental conservation.

Environmental communication and public awareness, case studies (e.g., CNG vehicles in Delhi).

(3 lectures)

Unit 8 : Field work

Visit to an area to document environmental assets: river/ forest/ flora/fauna, etc.

Visit to a local polluted site--Urban/Rural/Industrial/Agricultural.

Study of common plants, insects, birds and basic principles of identification.

Study of simple ecosystems--pond, river, Delhi Ridge, etc.

(Equal to 4 lectures)

Suggested Readings:

- Raziuddin, M., Mishra P.K. 2014, *A Handbook of Environmental Studies*, Akanaksha Publications, Ranchi.
- Mukherjee, B. 2011: *Fundamentals of Environmental Biology*. Silverline Publications, Allahabad.
- Carson, R. 2002. *Silent Spring*. Houghton Mifflin Harcourt.
- Gadgil, M., & Guha, R. 1993. *This Fissured Land: An Ecological History of India*. Univ. of California Press.
- Gleeson, B. and Low, N. (eds.) 1999. *Global Ethics and Environment*, London, Routledge.
- Gleick, P. H. 1993. *Water in Crisis*. Pacific Institute for Studies in Dev., Environment & Security. Stockholm Env. Institute, Oxford Univ. Press.
- Groom, Martha J., Gary K. Meffe, and Carl Ronald Carroll. *Principles of Conservation Biology*. Sunderland: Sinauer Associates, 2006.
- Grumbine, R. Edward, and Pandit, M.K. 2013. Threats from India's Himalaya dams. *Science*, 339: 36---37.
- McCully, P. 1996. *Rivers no more: the environmental effects of dams*(pp. 29---64). Zed Books.
- McNeill, John R. 2000. *Something New Under the Sun: An Environmental History of the Twentieth Century*.
- Odum, E.P., Odum, H.T. & Andrews, J. 1971. *Fundamentals of Ecology*. Philadelphia: Saunders.
- Pepper, I.L., Gerba, C.P. & Brusseau, M.L. 2011. *Environmental and Pollution Science*. Academic Press.
- Rao, M.N. & Datta, A.K. 1987. *Waste Water Treatment*. Oxford and IBH Publishing Co. Pvt. Ltd.
- Raven, P.H., Hassenzahl, D.M. & Berg, L.R. 2012. *Environment*. 8th edition. John Wiley & Sons.
- Rosencranz, A., Divan, S., & Noble, M. L. 2001. *Environmental law and policy in India*. Tripathi 1992.
- Sengupta, R. 2003. *Ecology and economics: An approach to sustainable development*. OUP.
- Singh, J.S., Singh, S.P. and Gupta, S.R. 2014. *Ecology, Environmental Science and Conservation*. S. Chand Publishing, New Delhi.
- Sodhi, N.S., Gibson, L. & Raven, P.H. (eds). 2013. *Conservation Biology: Voices from the Tropics*. John Wiley & Sons.
- Thapar, V. 1998. *Land of the Tiger: A Natural History of the Indian Subcontinent*.
- Warren, C. E. 1971. *Biology and Water Pollution Control*. WB Saunders.
- Wilson, E. O. 2006. *The Creation: An appeal to save life on earth*. New York: Norton.
- World Commission on Environment and Development. 1987. *Our Common Future*. Oxford University

II. GENERIC ELECTIVE (GE 2):

(Credits: 06)

All Four Papers (One paper to be studied in each semester) of any One Subject to be opted other than the Honours Subject. Refer Content from the Syllabus of Opted Generic Elective Subject.

III. CORE COURSE -C 3:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be two group of questions. Group A is compulsory and will contain five questions of very short answer type consisting of 1 mark each. Group B will contain descriptive type three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type five questions of fifteen marks each, out of which any three are to answer.

Note: *There may be subdivisions in each question asked in Theory Examinations.*

HUMAN GEOGRAPHY**Theory: 60 Lectures**

1. Introduction: Defining Human Geography; Major Themes; Contemporary Relevance
2. Space and Society: Cultural Regions; Race; Religion and Language
3. Population: Population Growth and Distribution; Population Composition; Demographic Transition Theory
4. Settlements: Types of Rural Settlements; Classification of Urban Settlements.
5. Population-Resource Relationship

Reading List

- Chandna, R.C. (2010) Population Geography, Kalyani Publisher.
- Hassan, M.I. (2005) Population Geography, Rawat Publications, Jaipur
- Daniel, P.A. and Hopkinson, M.F. (1989) The Geography of Settlement, Oliver & Boyd, London.
- Johnston R; Gregory D, Pratt G. et al. (2008) The Dictionary of Human Geography, Blackwell Publication.
- Jordan-Bychkov et al. (2006) The Human Mosaic: A Thematic Introduction to Cultural Geography. W. H. Freeman and Company, New York.
- Kaushik, S.D. (2010) Manav Bhugol, Rastogi Publication, Meerut.
- Maurya, S.D. (2012) Manav Bhugol, Sharda Pustak Bhawan. Allahabad.
- Hussain, Majid (2012) Manav Bhugol. Rawat Publications, Jaipur

IV. CORE COURSE -C 4:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

RESOURCE GEOGRAPHY**Theory: 60 Lectures**

1. Natural Resource: Concept and Classification
2. Distribution, Utilisation, Problems and Management of Land Resources and Water Resources
3. Distribution, Utilisation, Problems and Management of Forests and Energy Resources
4. Appraisal and Conservation of Natural Resources
5. Sustainable Resource Development

Reading List

- Cutter S. N., Renwick H. L. and Renwick W., 1991: *Exploitation, Conservation, Preservation: A Geographical Perspective on Natural Resources Use*, John Wiley and Sons, New York.
- Gadgil M. and Guha R., 2005: *The Use and Abuse of Nature: Incorporating This Fissured Land: An Ecological History of India and Ecology and Equity*, Oxford University Press. USA.
- Holechek J. L. C., Richard A., Fisher J. T. and Valdez R., 2003: *Natural Resources: Ecology, Economics and Policy*, Prentice Hall, New Jersey.
- Jones G. and Hollier G., 1997: *Resources, Society and Environmental Management*, Paul Chapman, London.
- Klee G., 1991: *Conservation of Natural Resources*, Prentice Hall, Englewood.
- Mather A. S. and Chapman K., 1995: *Environmental Resources*, John Wiley and Sons, New York.
- Mitchell B., 1997: *Resource and Environmental Management*, Longman Harlow, England.
- Owen S. and Owen P. L., 1991: *Environment, Resources and Conservation*, Cambridge University Press, New York.
- Rees J., 1990: *Natural Resources: Allocation, Economics and Policy*, Routledge. London.

GEOGRAPHY PRACTICAL- C3 + C4 LAB**60 Lectures****Marks : Pr (ESE: 3Hrs) =50****Pass Marks: Pr (ESE) = 20*****Instruction to Question Setter for******End Semester Examination (ESE):***

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	<i>= 30 marks</i>
<i>Practical record notebook</i>	<i>= 10 marks</i>
<i>Viva-voce</i>	<i>= 10 marks</i>

THEMATIC CARTOGRAPHY**Theory: 60 Lectures**

1. Diagrammatic Data Presentation – Line, Bar and Circle.
2. Thematic Mapping Techniques – Properties, Uses and Limitations; Areal Data -- Choropleth, Dot, Proportional Circles; Point Data – Isopleths.
3. Cartographic Overlays – Point, Line and Areal Data.
4. Thematic Maps – Preparation and Interpretation.

Reading List

- Cuff J. D. and Mattson M. T., 1982: *Thematic Maps: Their Design and Production*, Methuen Young Books
- Dent B. D., Torguson J. S., and Holder T. W., 2008: *Cartography: Thematic Map Design* (6th Edition), Mcgraw-Hill Higher Education
- Gupta K. K. and Tyagi V. C., 1992: *Working with Maps*, Survey of India, DST, New Delhi.
- Kraak M.-J. and Ormeling F., 2003: *Cartography: Visualization of Geo-Spatial Data*, Prentice-Hall.
- Mishra R. P. and Ramesh A., 1989: *Fundamentals of Cartography*, Concept, New Delhi.
- Sharma J. P., 2010: *Prayogic Bhugol*, Rastogi Publishers, Meerut.
- Singh R. L. and Singh R. P. B., 1999: *Elements of Practical Geography*, Kalyani Publishers.
- Slocum T. A., McMaster R. B. and Kessler F. C., 2008: *Thematic Cartography and Geovisualization*(3rd Edition), Prentice Hall.
- Tyner J. A., 2010: *Principles of Map Design*, The Guilford Press.
- Sarkar, A. (2015) *Practical geography: A systematic approach*. Orient Black Swan Private Ltd., NewDelhi
- Singh, L R & Singh R (1977): *Manchitra or Pryaogatamek Bhugol* , Central Book, Depot, Allahabad
- Bhopal Singh R L and Dutta P K (2012) *Prayogatama Bhugol*, Central Book Depot, Allahabad.

SEMESTER III

5 Papers**Total 100 x 5 = 500 Marks****I. SKILL ENHANCEMENT COURSE SEC 1:**

(Credits: Theory-02)

Marks : 100 (ESE: 3Hrs) =100**Pass Marks Th ESE = 40***Instruction to Question Setter for**End Semester Examination (ESE):**There will be **objective type test** consisting of hundred questions of 1 mark each. Students are required to mark their answer on **OMR Sheet** provided by the University.***ELEMENTARY COMPUTER APPLICATION SOFTWARES:**

A Common Syllabus Prescribed by Ranchi University

Theory: 30 Lectures**Objective of the Course***The objective of the course is to generate qualified manpower in the area of Information Technology (IT) and Graphic designing which will enable such person to work seamlessly at any Offices, whether Govt. or Private or for future entrepreneurs in the field of IT.***A. INTRODUCTION TO COMPUTER SYSTEM****Basic Computer Concept**Computer Appreciation - Characteristics of Computers, Input, Output, Storage units, CPU, Computer System. **(1 Lecture)****Input and Output Devices**

Input Devices - Keyboard, Mouse, joystick, Scanner, web cam,

Output Devices- Soft copy devices, monitors, projectors, speakers, Hard copy devices, Printers – Dot matrix, inkjet, laser, Plotters. **(4 lectures)****Computer Memory and Processors**

Memory hierarchy, Processor registers, Cache memory, Primary memory- RAM, ROM, Secondary storage devices, Magnetic tapes, Floppy disks, hard disks, Optical Drives- CD-ROM, DVD-ROM, CD-R, CD-RW, USB Flash drive, Mass storage devices: USB thumb drive. Managing disk Partitions, File System. Basic Processor Architecture, Processor speed, Types of processor.

(5 lectures)**Numbers Systems and Logic Gates**

Decimal number system, Binary number system, Octal number system, Hexadecimal number system, Inter-conversion between the number systems. Basic Logic gates-AND, OR, NOT, Universal logic gates- NAND, NOR

(3 lectures)**Computer Software**

Computer Software- Relationship between Hardware and Software, System Software, Application Software, Compiler, Names of some high level languages, Free domain software.

(2 Lectures)

Internet & its uses

History of Internet, WWW and Web Browsers: Web Browsing software, Surfing the Internet, Chatting on Internet, Basic of electronic mail, Using Emails, Document handling, Network definition, Common terminologies: LAN, WAN, MAN, Node, Host, Workstation, Bandwidth, Network Components: Servers, Clients, Communication Media. Wireless network

(3 Lectures)**Operating system-Windows**

Operating system and basics of Windows, The User Interface, Using Mouse and Moving Icons on the screen, The My Computer Icon, The Recycle Bin, Status Bar, Start and Menu & Menu-selection, Running an Application, Windows Explorer Viewing of File, Folders and Directories, Creating and Renaming of files and folders, Opening and closing of different Windows, Windows Setting, Control Panels, Wall paper and Screen Savers, Setting the date and Sound, Concept of menu Using Help, Advanced Windows, Using right Button of the Mouse, Creating Short cuts, Basics of Window Setup, Notepad, Window Accessories

(2 Lectures)**B. MICROSOFT OFFICE 2007 AND LATEST VERSIONS****Word Processing**

Word processing concepts: saving, closing, Opening an existing document, Selecting text, Editing text, Finding and replacing text, printing documents, Creating and Printing Merged Documents, Character and Paragraph Formatting, Page Design and Layout. Editing and Checking. Correcting spellings. Handling Graphics, Creating Tables and Charts, Document Templates and Wizards, Mail merge and Macros.

(3 Lectures)**Microsoft Excel (Spreadsheet)**

Spreadsheet Concepts, Creating, Saving and Editing a Workbook, Inserting, Deleting Work Sheets, entering data in a cell / formula Copying and Moving from selected cells, handling operators in Formulae, Functions: Mathematical, Logical, statistical, text, financial, Date and Time functions, Using Function Wizard. Formatting a Worksheet: Formatting Cells changing data alignment, changing date, number, character or currency format, changing font, adding borders and colors, Printing worksheets, Charts and Graphs – Creating, Previewing, Modifying Charts. Integrating word processor, spread sheets, web pages. Pivot table, goal seek, Data filter and scenario manager

(4 Lectures)**Microsoft Power Point (Presentation Package)**

Creating, Opening and Saving Presentations, Creating the Look of Your Presentation, Working in Different Views, Working with Slides, Adding and Formatting Text, Formatting Paragraphs, Drawing and Working with Objects, Adding Clip Art and other pictures, Designing Slide Shows, Running and Controlling a Slide Show, Printing Presentations. Creating photo album, Rehearse timing and record narration. Master slides.

(3 Lectures)**Reference Books**

- Nishit Mathur, Fundamentals of Computer , Aph publishing corporation(2010)
- Misty E. Vermaat, Microsoft word 2013 1st Edition (2013).
- Satish Jain, M.Geeta, MS- Office 2010 Training Guide, BPB publication (2010)
- Joan Preppernau, Microsoft PowerPoint 2016 step by step, Microsoft press(2015)
- Douglas E Corner, The Internet Book 4th Edition, prentice –Hall(2009)
- Faithe wempen, word 2016 in depth 1st edition, que publishing(2015)
- Steven welkler, Office 2016 for beginners, Create Space Independent publishing Plateform (2016)

SKILL ENHANCEMENT LAB- SEC 1 LAB

A. MS-WORD LAB ASSIGNMENT

1. Write down the following Paragraph OR any one provided by your teacher;

Without a doubt, the Internet is one of the most important inventions of modern times. The Internet is a global interconnected computer networks which allow each connected computer to share and exchange information with each other. The origins of the Internet can be traced to the creation of Advanced Research Projects Agency Network (ARPANET) as a network of computers under the auspices of the U.S. Department of Defense in 1969.

Apply following effects on The paragraph:

- i. Paragraph **font-size** and **font-type** must be 12 Verdana.
- ii. Paragraph **alignment** must be justified and double line spacing.
- iii. **Highlight** the “(ARPANET)” with green color.
- iv. Make the “Internet” keywords **Bold and Italic**.
- v. Insert any “**WordArt**” and a **symbol** to your document.
- vi. Insert a **clipart** to your document.
- vii. Add following lines to your document:
Internet, Intranet, Extranet, URL, WWW, Networking, Protocols, HTTP, TCP/IP

2. Create a Table of following fields:

Name, Surname, Age, Gender, Job and apply the following effects

- i. Insert 10 records
- ii. Font size should be 12
- iii. Title size should be 14
- iv. Font type should be Times new Roman
- v. Title color should be blue
- vi. Text color should be black
- vii. Table border should be 2

3. Write a letter on ‘Road Safety’ and send to ‘Multiple Recipients’ using mail merge.

4. Type the paragraph given below:

Today, the Internet is a public, cooperative and self-sustaining facility accessible to hundreds of millions of people worldwide. Physically, the Internet uses a portion of the total resources of the currently existing public telecommunication networks. Technically, what distinguishes the Internet is its use of a set of protocols called TCP/IP (for Transmission Control Protocol/Internet Protocol). Two recent adaptations of Internet technology, the intranet and the extranet, also make use of the TCP/IP protocol. Today, the Internet is a public, cooperative and self-sustaining facility accessible to hundreds of millions of people worldwide. Physically, the Internet uses a portion of the total resources of the currently existing public telecommunication networks. Technically, what distinguishes the Internet is its use of a set of protocols called TCP/IP (for Transmission Control Protocol/ Internet Protocol). Two recent adaptations of Internet technology, the intranet and the extranet, also make use of the TCP/IP protocol.

Apply the following:

- i. Change Internet into Internets at a time
- ii. Heilight TCP/IP in red color
- iii. Replace protocol into protocols
- iv. Find the word "Public"

B. MICROSOFT EXCEL LAB ASSIGNMENT

Basic Formatting and Spreadsheet Manipulation

1. Add rows and columns to an existing spreadsheet
2. Reformat data (center, comma and currency styles, bold, text color)
3. Work with a simple formula (product) and function (sum)

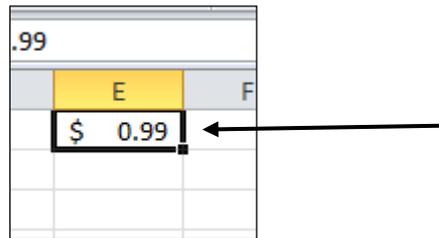
Assignment

1. Create a workbook as shown below.
2. To enter new rows or columns, simply click on the row or column header to select the whole row or column. Then right click with the mouse and choose insert.
3. Add the new row for S Spade with the data that's shown below (between the original rows 7 and 8).
4. Add a column for gender and the data as shown below (between the original columns A and B). Enter the appropriate gender for yourself in the last row.

A	B	C	D
Name	Male/Female	Genre	Number of Songs
J Smith	F	Blues	50
B Doe	M	Country	110
S Spade	F	Country	200
F Zappa	M	Blues	1400
F Zappa	M	Alternative	2300
J Smith	F	Alternative	150
S Spade	F	Blues	1000
B Doe	M	Blues	75
yourname	M	Blues	800

5. Center the data in columns B and C. Do this by selecting the whole column and click the center icon on the ribbon.
6. Bold the data in row 1, the column headings (ensure that the data all remains visible within the column boundaries).
7. Change the font color for row 1 to Blue.
8. Change the format of the data in column D to comma style (no decimal places showing). There is an icon on the home tab that sets it to comma style easily.
9. Add two new column labels to the right of the current columns; **Unit Price** and **Total Cost**. (They will be in columns E and F.) These two columns of data should be currency type so that the dollar sign is shown. There is an icon to quickly format the selected column as currency type.
10. All tunes are \$.99, so enter that value for all rows in Column E. You can copy quickly by using the **Auto Fill** handle and drag that amount down. When you over your mouse over the tiny square in

the bottom right hand corner of the active cell, your mouse shape will become a skinny plus sign, and you can click and drag that cell to make a copy.



11. Calculate Total Cost (column F) as *column D times Column E*. You will type in a formula like this into cell F2: **=D2*E2** (Be sure to begin the formula with an equal sign)
12. Use the AutoFill (skinny plus sign) again to copy the formula down column F; down to F10. Double check the picture below to make sure yours has the correct values
13. Add a border to all of the cells (A1-f10) using the Borders tool in the Fonts group on the Home Tab.
14. Change the page layout to landscape. Do this by clicking the Page Layout tab on the ribbon and then to Orientation to Landscape.
15. Save the file.
16. Click in cell F11 and Use the sum function or the shortcut icon that looks like Σ to get the total of the Total Cost column.
17. Ensure that the data is all visible within the column boundaries. Make the columns wider if needed.
18. Save the workbook. Your final spreadsheet should look like the following when printed.

Name	Male/Female	Genre	Number of Songs	Unit Price	Total Cost
J Smith	F	Blues	50	\$ 0.99	\$ 49.50
B Doe	M	Country	110	\$ 0.99	\$ 108.90
S Spade	F	Country	200	\$ 0.99	\$ 198.00
F Zappa	M	Blues	1,400	\$ 0.99	\$ 1,386.00
F Zappa	M	Alternative	2,300	\$ 0.99	\$ 2,277.00
S Spade	F	Blues	1,000	\$ 0.99	\$ 990.00
J Smith	F	Alternative	150	\$ 0.99	\$ 148.50
B Doe	M	Blues	75	\$ 0.99	\$ 74.25
yourname	M	Blues	800	\$ 0.99	\$ 792.00

\$ 6,024.15

Create a sample table given below in Excel

- Using formula find Total
- Find the maximum value using MAX function from the **Units** column
- Find minimum value from **Total** column

Order Date	Region	Rep	Item	Units	Unit Cost	Total
1/6/2016	East	Jones	Pencil	95	1.99	189.05
1/23/2016	Central	Kivell	Binder	50	19.99	999.50
2/9/2016	Central	Jardine	Pencil	36	4.99	179.64
2/26/2016	Central	Gill	Pen	27	19.99	539.73
3/15/2016	West	Sorvino	Pencil	56	2.99	167.44
4/1/2016	East	Jones	Binder	60	4.99	299.40
4/18/2016	Central	Andrews	Pencil	75	1.99	149.25
5/5/2016	Central	Jardine	Pencil	90	4.99	449.10
5/22/2016	West	Thompson	Pencil	32	1.99	63.68
6/8/2016	East	Jones	Binder	60	8.99	539.40
6/25/2016	Central	Morgan	Pencil	90	4.99	449.10
7/12/2016	East	Howard	Binder	29	1.99	57.71
7/29/2016	East	Parent	Binder	81	19.99	1,619.19
8/15/2016	East	Jones	Pencil	35	4.99	174.65
9/1/2016	Central	Smith	Desk	2	125.00	250.00
9/18/2016	East	Jones	Pen Set	16	15.99	255.84
10/5/2016	Central	Morgan	Binder	28	8.99	251.72
10/22/2016	East	Jones	Pen	64	8.99	575.36
11/8/2016	East	Parent	Pen	15	19.99	299.85
11/25/2016	Central	Kivell	Pen Set	96	4.99	479.04
12/12/2016	Central	Smith	Pencil	67	1.29	86.43
12/29/2016	East	Parent	Pen Set	74	15.99	1,183.26

C. MS-POWERPOINT LAB ASSIGNMENT

Activity 1 : Using Text & Background/Themes

- i. Create one new slide and insert any text.
- ii. To make your slide more attractive, use the themes or background.
- iii. Make sure it apply for every slide not only one slide.

Activity 2 : Apply Custom Animation On Text

- i. Use the custom animation to add effects on your text. Set the text move after you click the mouse.
- ii. If you have more than one text, add effects for each of text.

Activity 3 : Insert Image & WordArt

- i. Insert one new blank slide.
- ii. Choose one pictures or clip art from any source and insert in your new slide.
- iii. Using the WordArt, make a note or title on your picture.
- iv. Use the custom animation again to add effects on your picture and WordArt.

Activity 4 : Insert Text Box

- i. Insert one new blank slide.
- ii. Use the text box to insert one paragraph of text and adjust your text.

Activity 5 : Insert Smart Art

- i. Insert one new blank slide.
- ii. Insert the Smart Art and put your text on the Smart Art.

Activity 6 : Insert Audio

- i. Back to your first slide and insert one audio on that slide. The audio must play automatically when you show your slide.
- ii. Make sure the speaker also not appear when you show your slide. (the icon).
- iii. The audio must play when you show alls your slide, not only one slide.

Activity 7 : inserting Video

- i. Insert one new slide and insert one short video

Activity 8 : Save File

- i. Save your file

Activity 9 : Create Photo Album & Hyperlink

- i. Insert one new slide and put a text ex: "My Photo Album"
- ii. Create one photo album and adjust your text and your photos
- iii. Save your photo album with a new file
- iv. Make a hyperlink to your photo using the text "My Photo Album"

Reference Books:

- Faithe wempen, word 2016 in depth 1st edition, que publishing(2015)
 - steven welkler, Office 2016 for bignners, Create Space Independent publishing plateform(2016)
 - Elaine Marmel, office 2016 simplified, 1st Edition, John wiley and sons Inc(2016)
 - Patrice-Anne Rutledge, Easy office 2016 1st edition, Que publishing(2016)
-

II. GENERIC ELECTIVE (GE 3)

(Credits: 06)

All Four Papers (One paper to be studied in each semester) of any One Subject to be opted other than the Honours Subject. Refer Content from the Syllabus of Opted Generic Elective Subject.

III. CORE COURSE -C 5:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be two group of questions. Group A is compulsory and will contain five questions of very short answer type consisting of 1 mark each. Group B will contain descriptive type three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type five questions of fifteen marks each, out of which any three are to answer.

Note: *There may be subdivisions in each question asked in Theory Examinations.*

CLIMATOLOGY**Theory: 60 Lectures**

1. Atmospheric Composition and Structure – Variation with Altitude, Latitude and Season.
2. Insolation and Temperature – Factors and Distribution, Heat Budget, Temperature Inversion.
3. Atmospheric Pressure and Winds – Planetary Winds, Forces affecting Winds, General Circulation, Jet Streams.
4. Atmospheric Moisture – Evaporation, Humidity, Condensation, Fog and Clouds, Precipitation Types, Stability and Instability; Climatic Regions (Koppen)
5. Cyclones – Tropical Cyclones, Extra Tropical Cyclones, Monsoon - Origin and Mechanism.

Reading List

- Barry R. G. and Carleton A. M., 2001: *Synoptic and Dynamic Climatology*, Routledge, UK.
- Barry R. G. and Corley R. J., 1998: *Atmosphere, Weather and Climate*, Routledge, New York.
- Critchfield H. J., 1987: *General Climatology*, Prentice-Hall of India, New Delhi
- Lutgens F. K., Tarbuck E. J. and Tasa D., 2009: *The Atmosphere: An Introduction to Meteorology*, Prentice-Hall, Englewood Cliffs, New Jersey.
- Oliver J. E. and Hidore J. J., 2002: *Climatology: An Atmospheric Science*, Pearson Education, New Delhi.
- Trewartha G. T. and Horne L. H., 1980: *An Introduction to Climate*, McGraw-Hill.
- Gupta L S(2000): *Jalvayu Vigyan*, Hindi Madhyam Karyanvay Nidishalya, Delhi Vishwa Vidhyalaya, Delhi
- Lal, D S (2006): *Jalvayu Vigyan*, Prayag Pustak Bhavan, Allahabad
- Vatal, M (1986): *Bhautik Bhugol*, Central Book Depot, Allahabad
- Singh, S (2009): *Jalvayu Vigyan*, Prayag Pustak Bhawan, Allahabad

IV. CORE COURSE -C 6:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

GEOGRAPHY OF INDIA**Theory: 60 Lectures**

1. Structure and Physiographic Divisions of India
2. Drainage and climate
3. Soil and natural vegetation
4. Population: Distribution and growth, structure, race, sexratio, religion.
5. Economic: Mineral and power resources distribution and utilisation of iron ore, coal, petroleum, gas; agricultural production and distribution of rice and wheat, industrial development : iron and steel industry, cotton textile, cement

Reading List

- Deshpande C. D., 1992: *India: A Regional Interpretation*, ICSSR, New Delhi.
- Johnson, B. L. C., ed. 2001. *Geographical Dictionary of India*. Vision Books, New Delhi.
- Mandal R. B. (ed.), 1990: *Patterns of Regional Geography – An Intenational Perspective. Vol. 3 –Indian Perspective*.
- Sdyasuk Galina and P Sengupta (1967): *Economic Regionalisation of India*, Census of India
- Sharma, T. C. 2003: *India - Economic and Commercial Geography*. Vikas Publ., New Delhi.
- Singh R. L., 1971: *India: A Regional Geography*, National Geographical Society of India.
- Singh, Jagdish 2003: *India - A Comprehensive & Systematic Geography*, Gyanodaya Prakashan, Gorakhpur.
- Spate O. H. K. and Learmonth A. T. A., 1967: *India and Pakistan: A General and Regional Geography*, Methuen.
- Tirtha, Ranjit 2002: *Geography of India*, Rawat Pubs., Jaipur & New Delhi.
- Pathak, C. R. 2003: *Spatial Structure and Processes of Development in India*. Regional Science Assoc., Kolkata.
- Tiwari, R.C. (2007) *Geography of India*. Prayag Pustak Bhawan, Allahabad
- Sharma, T.C. (2013) *Economic Geography of India*. Rawat Publication, Jaipur

V. CORE COURSE -C 7:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be two group of questions. Group A is compulsory and will contain five questions of very short answer type consisting of 1 mark each. Group B will contain descriptive type three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

GEOGRAPHY OF JHARKHAND**Theory: 60 Lectures**

1. Structure and Physiographic Divisions of Jharkhand
2. Drainage and climate
3. Soil and natural vegetation
4. Social features: Population and tribes (Santhal, Oraon, Munda)
5. Economic features: Agriculture, minerals and industry -iron and steel industry, silk, cement

Reading List

- 1. Govt of India: (1965) The Gazetteer of India Vol I & III Publication Division, New Delhi
- Mandal R. B. (ed.), 1990: *Patterns of Regional Geography – An International Perspective. Vol. 3 –Indian Perspective.*
- 3. Tiwari Ram Kumar (2010): Jharkhand ka Bhugol, Rajesh Publication New Delhi.
- Sdyasuk Galina and P Sengupta (1967): *Economic Regionalisation of India*, Census of India
- Tiwari Ram Kumar: Jharkhand ki Rooprekha, Shivangan Publication Ranchi
- Singh R. L., 1971: *India: A Regional Geography*, National Geographical Society of India.
- Singh, Jagdish 2003: *India - A Comprehensive & Systematic Geography*, Gyanodaya Prakashan, Gorakhpur.
- Spate O. H. K. and Learmonth A. T. A., 1967: *India and Pakistan: A General and Regional Geography*, Methuen.
- Tirtha, Ranjit 2002: *Geography of India*, Rawat Publs., Jaipur & New Delhi.
- Pathak, C. R. 2003: *Spatial Structure and Processes of Development in India*. Regional Science Assoc., Kolkata.
- Tiwari, R.C. (2007) *Geography of India*. Prayag Pustak Bhawan, Allahabad

GEOGRAPHY PRACTICAL- C5 + C6 + C7 LAB**60 Lectures****Marks : Pr (ESE: 3Hrs) =75****Pass Marks: Pr (ESE) = 30*****Instruction to Question Setter for******End Semester Examination (ESE):***

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	<i>= 45 marks</i>
<i>Practical record notebook</i>	<i>= 15 marks</i>
<i>Viva-voce</i>	<i>= 15 marks</i>

PRACTICAL- STATISTICAL METHODS IN GEOGRAPHY

1. Use of Data in Geography: Geographical Data , Significance of Statistical Methods in Geography; Sources of Data, Scales of Measurement (Nominal, Ordinal, Interval, Ratio).
2. Tabulation and Descriptive Statistics: Frequencies (Deciles, Quartiles), Cross Tabulation,
3. Central Tendency (Mean, Median and Mode)
4. Dispersion (Standard Deviation, Variance and Coefficient of Variation) Scattered diagram, Histogram, Frequency Polygon & Frequency Curve
5. Sampling: Purposive, Random, Systematic and Stratified.
6. Association and Correlation: Rank Correlation and Simple Regression,

Class Record: Each student will submit a record containing five exercises:

1. Measures of central tendency and dispersion would be computed and interpreted for any two attributes.
2. Histograms and frequency curve would be prepared **and** interpreted for one or two variables.
3. Based on of the sample set and using two relevant attributes, a scatter and regression line would be plotted and mapped with a short interpretation.

Reading List

- Berry B. J. L. and Marble D. F. (eds.): *Spatial Analysis – A Reader in Geography*.
- Ebdon D., 1977: *Statistics in Geography: A Practical Approach*.
- Hammond P. and Mc Cullagh P. S., 1978: *Quantitative Techniques in Geography: An Introduction*, Oxford University Press.
- King L. S., 1969: *Statistical Analysis in Geography*, Prentice-Hall.
- Mahmood A., 1977: *Statistical Methods in Geographical Studies*, Concept.
- Pal S. K., 1998: *Statistics for Geoscientists*, Tata McGraw Hill, New Delhi.
- Sarkar, A. (2013) *Quantitative geography: techniques and presentations*. Orient Black Swan PrivateLtd., New Delhi
- Silk J., 1979: *Statistical Concepts in Geography*, Allen and Unwin, London.
- Spiegel M. R.: *Statistics, Schaum's Outline Series*.
- Yeates M., 1974: *An Introduction to Quantitative Analysis in Human Geography*, McGraw Hill, NewYork.
- Shinha, Indira (2007) *Sankhyiki bhugol*. Discovery Publishing House, New Delhi

SEMESTER IV**5 Papers****Total 100 x 5 = 500 Marks****I. SKILL ENHANCEMENT COURSE SEC 2:**

(Credits: Theory-02)

Marks : Pr (ESE: 3Hrs) =75**Pass Marks: Pr (ESE) = 30*****Instruction to Question Setter for******End Semester Examination (ESE):***

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

HYDROLOGY**Theory: 15 Lectures**

1. Hydrological Cycle: Systems approach in hydrology, human impact on the hydrological cycle;
2. Precipitation, interception, evaporation, evapo-transpiration, infiltration, ground-water, run off and over land flow;
- 3 Hydrological input and output.
4. River Basin and Problems of Regional Hydrology: Characteristics of river basins, basin surface run-off, measurement of river discharge
5. Floods and droughts.

SKILL ENHANCEMENT PROJECT- SEC 1**30 Lectures****Marks : 25 (Pr 3Hrs) =25****Pass Marks: Pr ESE =10*****Guidelines to Examiners for******End Semester Examination (ESE):***

Evaluation of project work may be as per the following guidelines:

Project model (if any) and the Project record notebook = 15 marks
Project presentation and viva-voce = 10 marks

Overall project dissertation may be evaluated under the following heads:

- *Motivation for the choice of topic*
- *Project dissertation design*
- *Methodology and Content depth*
- *Results and Discussion*
- *Future Scope & References*
- *Presentation style*
- *Viva-voce*

PROJECT WORK

Student alone or in a group of not more than five, shall undertake one Project approved by the Subject Teacher/H.O.D. of the Department/College concerned. The progress of the Project shall be monitored by the faculty members at regular intervals.

II. GENERIC ELECTIVE (GE 4)

(Credits: 06)

All Four Papers (One paper to be studied in each semester) of any One Subject to be opted other than the Honours Subject. Refer Content from the Syllabus of Opted Generic Elective Subject.

III. CORE COURSE -C 8:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

ECONOMIC GEOGRAPHY**Theory: 60 Lectures**

1. Introduction: Concept and classification of economic activity
2. Factors Affecting location of Economic Activity with special reference to Agriculture (Von Thunen theory), Industry (Weber's theory).
3. Primary Activities: Subsistence and Commercial agriculture, forestry, fishing and mining.
4. Secondary Activities: Manufacturing (Cotton Textile, Iron and Steel- with reference to world), Concept of Manufacturing Regions, Special Economic Zones
5. Tertiary Activities: Transport, Trade and Services.

Reading List

- Alexander J. W., 1963: *Economic Geography*, Prentice-Hall Inc., Englewood Cliffs, New Jersey.
 - Coe N. M., Kelly P. F. and Yeung H. W., 2007: *Economic Geography: A Contemporary Introduction*, Wiley-Blackwell.
 - Hodder B. W. and Lee Roger, 1974: *Economic Geography*, Taylor and Francis.
 - Combes P., Mayer T. and Thisse J. F., 2008: *Economic Geography: The Integration of Regions and Nations*, Princeton University Press.
 - Wheeler J. O., 1998: *Economic Geography*, Wiley.
 - Durand L., 1961: *Economic Geography*, Crowell.
 - Bagchi-Sen S. and Smith H. L., 2006: *Economic Geography: Past, Present and Future*, Taylor and Francis.
 - Willington D. E., 2008: *Economic Geography*, Husband Press.
 - Clark, Gordon L.; Feldman, M.P. and Gertler, M.S., eds. 2000: *The Oxford*
-

IV. CORE COURSE -C 9:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

ENVIRONMENTAL GEOGRAPHY**Theory: 60 Lectures**

1. Environmental Geography – Concept and Scope
2. Human-Environment Relationships – Historical Progression, Adaptation in different Biomes.
3. Ecosystem – Concept, Structure and Functions
4. Environmental Problems in Tropical, Temperate and Polar Ecosystems
5. Environmental Programmes and Policies – Global, National and Local levels

Reading List

- Chandna R. C., 2002: *Environmental Geography*, Kalyani, Ludhiana.
- Cunningham W. P. and Cunningham M. A., 2004: *Principals of Environmental Science: Inquiry and Applications*, Tata Macgraw Hill, New Delhi.
- Goudie A., 2001: *The Nature of the Environment*, Blackwell, Oxford.
- Singh, R.B. (Eds.) (2009) *Biogeography and Biodiversity*. Rawat Publication, Jaipur
- Miller G. T., 2004: *Environmental Science: Working with the Earth*, Thomson Brooks Cole, Singapore.
- MoEF, 2006: *National Environmental Policy-2006*, Ministry of Environment and Forests, Government of India.
- Singh, R.B. and Hietala, R. (Eds.) (2014) *Livelihood security in Northwestern Himalaya: Case studies from changing socio-economic environments in Himachal Pradesh, India*. Advances in Geographical and Environmental Studies, Springer
- Odum, E. P. et al, 2005: *Fundamentals of Ecology*, Ceneage Learning India.
- Singh S., 1997: *Environmental Geography*, Prayag Pustak Bhawan. Allahabad.
- UNEP, 2007: *Global Environment Outlook: GEO4: Environment For Development*, United Nations Environment Programme.
- Singh, M., Singh, R.B. and Hassan, M.I. (Eds.) (2014) *Climate change and biodiversity: Proceedings of IGU Rohtak Conference, Volume 1*. Advances in Geographical and Environmental Studies, Springer
- Singh, R.B. (1998) *Ecological Techniques and Approaches to Vulnerable Environment*, New Delhi, Oxford & IBH Pub..
- Singh, Savindra (2001) *Paryavaran Bhugol*, Prayag Pustak Bhawan, Allahabad. (in Hindi)
- Tiwari Ram Kumar(2006) *Paryavaran Addhyayan*, Lakshmi Publication, Delhi

V. CORE COURSE -C 10:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for*****Mid Semester Examination (MSE):**

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

POPULATION GEOGRAPHY**Theory: 60 Lectures**

1. Defining the Field – Nature and Scope; Sources of Data with special reference to India (Census, Vital Statistics and NSS).
2. Population Size, Distribution and Growth – Determinants and Patterns; Theories of Growth – Malthusian Theory and Demographic Transition Theory.
3. Population Dynamics: Fertility, Mortality and Migration – Measures, Determinants and Implications.
4. Population Composition and Characteristics – Age-Sex Composition; Rural and Urban Composition; Literacy.
5. Contemporary Issues – Ageing of Population; Declining Sex Ratio; HIV/AIDS.

Reading List

- Barrett H. R., 1995: *Population Geography*, Oliver and Boyd.
- Bhende A. and Kanitkar T., 2000: *Principles of Population Studies*, Himalaya Publishing House.
- Chandna R. C. and Sidhu M. S., 1980: *An Introduction to Population Geography*, Kalyani Publishers.
- Clarke J. I., 1965: *Population Geography*, Pergamon Press, Oxford.
- Jones, H. R., 2000: *Population Geography*, 3rd ed. Paul Chapman, London.
- Lutz W., Warren C. S. and Scherbov S., 2004: *The End of the World Population Growth in the 21st Century*, Earthscan
- Newbold K. B., 2009: *Population Geography: Tools and Issues*, Rowman and Littlefield Publishers.
- Pacione M., 1986: *Population Geography: Progress and Prospect*, Taylor and Francis.
- Wilson M. G. A., 1968: *Population Geography*, Nelson.
- Panda B P (1988): *Janasankya Bhugol*, M P Hindi Granth Academy, Bhopal
- Maurya S D (2009) *Jansankya Bhugol*, Sharda Putak Bhawan, Allahabad
- Chandna, R C (2006), *Jansankhya Bhugol*, Kalyani Publishers, Delhi
- Tiwari Ram Kumar (2015) *Jansankhya Bhugol* Pravalika Publication, Allahabad
- Roy.D.(2015) *Population Geography*, Books & Allied Publication, Kolkata

GEOGRAPHY PRACTICAL- C8 + C9 + C10 LAB**60 Lectures****Marks : Pr (ESE: 3Hrs) =75****Pass Marks: Pr (ESE) = 30*****Instruction to Question Setter for*****End Semester Examination (ESE):**

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	<i>= 45 marks</i>
<i>Practical record notebook</i>	<i>= 15 marks</i>
<i>Viva-voce</i>	<i>= 15 marks</i>

INSTRUMENTAL SURVEY

1. Plane Table: Radiation, Intersection Method.
2. Plane Table: Resection: Trial & Error, Tracing Paper Method.
3. Prismatic Compass: Open & Closed Traverse.
4. Dumpy Level & Abny level
5. Indian Clinometer.
6. Concept of GPS

Reading List:

- Misra, R.P & Ramesh A: (1986): Fundamentals of Cartography, McMillan Co.New Delhi
 - Robinson A.H (1995) Elements of Cartography John Wiley & Sons USA
 - Sarkar A.K.(1997): Practical Geography :A Systematic Approach, Oriental Longman Calcutta
 - Sharma J.P.(2010): Prayogatmak Bhugol, Sahitya Bhawan
-

SEMESTER V

4 Papers**Total 100 x 4 = 400 Marks**

(Credits: Theory-05, Tutorials-01)

I. GEOGRAPHY SPECIFIC (DSE 1):**Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75****Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for
Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

URBAN GEOGRAPHY**Theory: 60 Lectures**

1. Urban geography: Introduction, nature and scope
2. Patterns of Urbanisation in developed and developing countries
3. Functional classification of cities: Quantitative and Qualitative Methods
4. Urban Issues: problems of housing, slums, civic amenities (water and transport)
5. Case studies of Delhi, Mumbai, Kolkata, Chennai and Chandigarh with reference to Land use and Urban Issues

Reading List

- Fyfe N. R. and Kenny J. T., 2005: *The Urban Geography Reader*, Routledge.
 - Graham S. and Marvin S., 2001: *Splintering Urbanism: Networked Infrastructures, Technological Mobilities and the Urban Condition*, Routledge.
 - Hall T., 2006: *Urban Geography*, Taylor and Francis.
 - Kaplan D. H., Wheeler J. O. and Holloway S. R., 2008: *Urban Geography*, John Wiley.
 - Knox P. L. and McCarthy L., 2005: *Urbanization: An Introduction to Urban Geography*, PearsonPrentice Hall New York.
 - Knox P. L. and Pinch S., 2006: *Urban Social Geography: An Introduction*, Prentice-Hall.
 - Pacione M., 2009: *Urban Geography: A Global Perspective*, Taylor and Francis.
 - Sassen S., 2001: *The Global City: New York, London and Tokyo*, Princeton University Press.
 - Ramachandran R (1989): *Urbanisation and Urban Systems of India*, Oxford University Press, NewDelhi
 - Ramachandran, R., 1992: *The Study of Urbanisation*, Oxford University Press, Delhi
 - Singh, R.B. (Eds.) (2001) *Urban Sustainability in the Context of Global Change*, Science Pub Inc., Enfield (NH), USA and Oxford & IBH Pub., New Delhi.
 - Singh, R.B. (Ed.) (2015) *Urban development, challenges, risks and resilience in Asian megacities. Advances in Geographical and Environmental Studies*, Springer
-

II. GEOGRAPHY SPECIFIC (DSE 2):

(Credits: Theory-05, Tutorials-01)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

SOCIAL GEOGRAPHY**Theory: 60 Lectures**

1. Social Geography: Concept, Origin, Nature and Scope.
2. Peopling Process of India: Technology and Occupational Change; Migration.
3. Social Categories: Caste, Class, Religion, Race and Gender and their Spatial distribution
4. Geographies of Welfare and Well being: Concept and Components – Healthcare, Housing and Education.
5. Social Geographies of Inclusion and Exclusion, Slums, Gated Communities, Communal Conflicts and Crime.

Reading List

- Ahmed A., 1999: *Social Geography*, Rawat Publications.
- Casino V. J. D., Jr., 2009) *Social Geography: A Critical Introduction*, Wiley Blackwell.
- Cater J. and Jones T., 2000: *Social Geography: An Introduction to Contemporary Issues*, Hodder Arnold.
- Holt L., 2011: *Geographies of Children, Youth and Families: An International Perspective*, Taylor & Francis.
- Panelli R., 2004: *Social Geographies: From Difference to Action*, Sage.
- Rachel P., Burke M., Fuller D., Gough J., Macfarlane R. and Mowl G., 2001: *Introducing Social Geographies*, Oxford University Press.
- Smith D. M., 1977: *Human geography: A Welfare Approach*, Edward Arnold, London.
- Smith D. M., 1994: *Geography and Social Justice*, Blackwell, Oxford.
- Smith S. J., Pain R., Marston S. A., Jones J. P., 2009: *The SAGE Handbook of Social Geographies*, Sage Publications.
- Sopher, David (1980): *An Exploration of India*, Cornell University Press, Ithasa
- Valentine G., 2001: *Social Geographies: Space and Society*, Prentice Hall.

GEOGRAPHY PROJECT- DSE 1 + DSE 2**Marks : Pr (ESE: 3Hrs) =50****Pass Marks: Pr (ESE) = 20*****Instruction to Question Setter for******End Semester Examination (ESE):***

Evaluation of project work may be as per the following guidelines:

Project model (if any) and the Project record notebook = 25 marks
Project presentation and viva-voce = 25 marks

Overall project dissertation may be evaluated under the following heads:

- *Motivation for the choice of topic*
- *Project dissertation design*
- *Methodology and Content depth*
- *Results and Discussion*
- *Future Scope & References*
- *Presentation style*
- *Viva-voce*

PROJECT WORK

Student alone or in a group of not more than five, shall undertake one Project approved by the Subject Teacher/H.O.D. of the Department/College concerned. The progress of the Project shall be monitored by the faculty members at regular intervals.

III. CORE COURSE -C 11:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75

Pass Marks: Th (MSE +ESE) = 30

Instruction to Question Setter for***Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

GEOGRAPHICAL THOUGHT**Theory: 60 Lectures**

1. Nature, objective and relevance of Geographical Thought, Its place in classification of Sciences
2. Pre-Modern – Early Origins of Geographical Thinking with reference to the Classical and Medieval Philosophies.
3. Modern – Evolution of Geographical Thinking and Disciplinary Trends in Germany, France, Britain, United States of America.
4. Debates – Environmental Determinism and Possibilism, Systematic and Regional, Ideographic and Nomeothetic.
5. Trends – Quantitative Revolution and its Impact, Behaviouralism, Systems Approach, Radicalism, Feminism; Towards Post Modernism – Changing Concept of Space in Geography, Future of Geography.

Reading List

- Arentsen M., Stam R. and Thuijjs R., 2000: *Post-modern Approaches to Space*, ebook.
- Bhat, L.S. (2009) *Geography in India (Selected Themes)*. Pearson
- Bonnett A., 2008: *What is Geography?* Sage.
- Dikshit R. D., 1997: *Geographical Thought: A Contextual History of Ideas*, Prentice– Hall India.
- Hartshone R., 1959: *Perspectives of Nature of Geography*, Rand MacNally and Co.
- Holt-Jensen A., 2011: *Geography: History and Its Concepts: A Students Guide*, SAGE.
- Johnston R. J., (Ed.): *Dictionary of Human Geography*, Routledge.
- Johnston R. J., 1997: *Geography and Geographers, Anglo-American Human Geography since 1945*, Arnold, London.
- Kapur A., 2001: *Indian Geography Voice of Concern*, Concept Publications.
- Martin Geoffrey J., 2005: *All Possible Worlds: A History of Geographical Ideas*, Oxford.
- Soja, Edward 1989. *Post-modern Geographies*, Verso, London. Reprinted 1997: Rawat Publ., Jaipur and New Delhi.

IV. CORE COURSE -C 12:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be two group of questions. Group A is compulsory and will contain five questions of very short answer type consisting of 1 mark each. Group B will contain descriptive type three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

SETTLEMENT GEOGRAPHY**Theory: 60 Lectures**

1. Nature scope & contents of Settlement Geography.
2. Definition of Urban & Rural Settlement: Salient features of human settlements in India
3. Settlement site & structure: Internal morphology, external forms, field patterns, functions, rural housetypes with reference to India
4. Spatial organization: size, spacing, hierarchy of settlements.
5. Functional classification of towns and cities, rural –urban fringe, slums.

Readings:

- Bose A. India's Urbanization 1947-2000 Tata Mcgraw Hill, New Delhi.
- Chisholm, M: (1970) Rural Settlements and Landuse, Hutchinson, London
- Clout, R.D (1970) Rural Geography, Pergamon Press, London
- Dickenson, R.E (1947) City, Region and Regionalism, Kegan Paul Trench Trubner & Co. London
- Krishnan, G.: Nagar Bhugol, Punjab State University text Book Board, Chandigarh (Punjab)
- Misra, H.N (ed) (1987) Rural Geography, Heritage Publishers, New Delhi
- Mukherji, R.K (1968) Man and his habitation, Popular Books, Bombay
- Singh R.L (1972) Readings in Rural Settlement Geography, Banaras Hindu University, department of geography, Varanasi
- Turner Roy (ed) (1962): India's urban future, Oxford University press, Bombay

GEOGRAPHY PRACTICAL- C11 + C12 LAB**60 Lectures****Marks : Pr (ESE: 3Hrs) =50****Pass Marks: Pr (ESE) = 20*****Instruction to Question Setter for*****End Semester Examination (ESE):**

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	<i>= 30 marks</i>
<i>Practical record notebook</i>	<i>= 10 marks</i>
<i>Viva-voce</i>	<i>= 10 marks</i>

PHYSICAL SURVEY

Excursion Report for Environmental studies in any part of India. The report should be completed/ prepared as per the applicability under the following broad themes.

- 1) Landforms and settlement
 - 2) Landforms and landuse
 - 3) Social and Cultural Aspects
 - 4) Urban and rural environment
 - 5) Environmental Degradation
-

SEMESTER VI
4 Papers

Total 100 x 4 = 400 Marks
I. GEOGRAPHY SPECIFIC (DSE 3):

(Credits: Theory-06)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for
Mid Semester Examination (MSE):***

There will be two group of questions. Group A is compulsory and will contain five questions of very short answer type consisting of 1 mark each. Group B will contain descriptive type three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

POLITICAL GEOGRAPHY**Theory: 60 Lectures**

1. Introduction: Concepts, Nature and Scope.
2. State, Nation and Nation State – Concept of Nation and State, Attributes of State – Frontiers, Boundaries, Shape, Size, Territory and Sovereignty, Concept of Nation State; Geopolitics; Theories (Heartland and Rimland)
3. Electoral Geography – Geography of Voting, Geographic Influences on Voting pattern, Geography of Representation, Gerrymandering.
4. Political Geography of Resource Conflicts – Water Sharing Disputes, Disputes and Conflicts Related to Forest Rights and Minerals.
5. Politics of Displacement: Issues of relief, compensation and rehabilitation: with reference to Dams and Special Economic Zones

Reading List

- Agnew J., 2002: *Making Political Geography*, Arnold.
 - Agnew J., Mitchell K. and Toal G., 2003: *A Companion to Political Geography*, Blackwell.
 - Cox K. R., Low M. and Robinson J., 2008: *The Sage Handbook of Political Geography*, Sage Publications.
 - Cox K., 2002: *Political Geography: Territory, State and Society*, Wiley-Blackwell
 - Gallaher C., et al, 2009: *Key Concepts in Political Geography*, Sage Publications.
 - Glassner M., 1993: *Political Geography*, Wiley.
 - Jones M., 2004: *An Introduction to Political Geography: Space, Place and Politics*, Routledge .
 - Mathur H M and M M Cernea (eds.) Development, Displacement and Resettlement – Focus on Asian Experience, Vikas, Delhi
 - Painter J. and Jeffrey A., 2009: *Political Geography*, Sage Publications.
 - Taylor P. and Flint C., 2000: *Political Geography*, Pearson Education.
 - Verma M K (2004): Development, Displacement and Resettlement, Rawat Publications, Delhi
 - Hodder Dick, Sarah J Llyod and Keith S McLachlan (1998), *Land Locked States of Africa and Asia* (vo.2), Frank Cass
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II. GEOGRAPHY SPECIFIC (DSE 4):

(Credits: Theory-06)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for
Mid Semester Examination (MSE):***

There will be two group of questions. Group A is compulsory and will contain five questions of very short answer type consisting of 1 mark each. Group B will contain descriptive type three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

BIOGEOGRAPHY**Theory: 60 Lectures**

1. Defining the Field – Concept, And Relevance
2. Evolution of Plants and Animals – Adaptation, Dispersal, Colonization and Extinction.
3. Factors Affecting the Community – Plant Succession, Arresting Factors, Vegetation Climax
4. Biomes – Forest, Grassland, Desert and Mountain.
5. Biodiversity – Preservation and Conservation.

GEOGRAPHY PROJECT- DSE 3 + DSE 4**Marks : Pr (ESE: 3Hrs) =50****Pass Marks: Pr (ESE) = 20*****Guidelines to Examiners for******End Semester Examination (ESE):***

Evaluation of project work may be as per the following guidelines:

Project model (if any) and the Project record notebook = 25 marks
Project presentation and viva-voce = 25 marks

Overall project dissertation may be evaluated under the following heads:

- *Motivation for the choice of topic*
- *Project dissertation design*
- *Methodology and Content depth*
- *Results and Discussion*
- *Future Scope & References*
- *Presentation style*
- *Viva-voce*

PROJECT WORK

Student alone or in a group of not more than five, shall undertake one Project approved by the Subject Teacher/H.O.D. of the Department/College concerned. The progress of the Project shall be monitored by the faculty members at regular intervals.

III. CORE COURSE -C 13:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75**Pass Marks: Th (MSE +ESE) = 30*****Instruction to Question Setter for******Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

REGIONAL PLANNING & DEVELOPMENT**Theory: 60 Lectures**

1. Definition of Region, Evolution and Types of Regional planning: Formal, Functional, and Planning Regions and Regional Planning; Need for Regional Planning; Types of regional Planning.
2. Choice of a Region for Planning: Characteristics of an Ideal Planning Region; Delineation of Planning Region; Regionalization of India for Planning (Agro Ecological Zones)
3. Theories and Models for Regional Planning: Growth Pole Model of Perroux; Growth Centre Model in Indian Context; Myrdal, Hirschman, Rostow and Friedmann; Village Cluster
4. Changing Concept of Development, Concept of underdevelopment; Efficiency-Equity Debate
5. Measuring development: Indicators (Economic, Social and Environmental); Human development.

Reading List

- Blij H. J. De, 1971: *Geography: Regions and Concepts*, John Wiley and Sons.
- Claval P.I, 1998: *An Introduction to Regional Geography*, Blackwell Publishers, Oxford and Massachusetts.
- Friedmann J. and Alonso W. (1975): *Regional Policy - Readings in Theory and Applications*, MIT Press, Massachusetts.
- Gore C. G., 1984: *Regions in Question: Space, Development Theory and Regional Policy*, Methuen, London.
- Gore C. G., Köhler G., Reich U-P. and Ziesemer T., 1996: *Questioning Development; Essays on the Theory, Policies and Practice of Development Intervention*, Metropolis- Verlag, Marburg.
- Haynes J., 2008: *Development Studies*, Polity Short Introduction Series.
- Johnson E. A. J., 1970: *The Organization of Space in Developing Countries*, MIT Press, Massachusetts.
- Peet R., 1999: *Theories of Development*, The Guilford Press, New York.
- UNDP 2001-04: *Human Development Report*, Oxford University Press.
- World Bank 2001-05: *World Development Report*, Oxford University Press, New Delhi
- Puri V.K & Chand.M (1998) *Regional Planning in India*, Allied Publication
- Chand R.C (2010) *Pradeshik Niyijan tatha Vikash*, Kalyani Publishers Ludhiana.

IV. CORE COURSE -C 14:

(Credits: Theory-04, Practicals-02)

Marks : 15 (MSE: 1Hr) + 60 (ESE: 3Hrs) =75

Pass Marks: Th (MSE +ESE) = 30

Instruction to Question Setter for***Mid Semester Examination (MSE):***

There will be **two** group of questions. **Group A is compulsory** and will contain five questions of **very short answer type** consisting of 1 mark each. **Group B will contain descriptive type** three questions of five marks each, out of which any two are to answer.

End Semester Examination (ESE):

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** five questions of fifteen marks each, out of which any three are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

AGRICULTURAL GEOGRAPHY**Theory: 60 Lectures**

1. Defining the Field: Introduction, nature and scope; Land use/ land cover definition and classification.
2. Determinants of Agriculture: Physical, Technological and Institutional
3. Agricultural Regions of India: Agro-climatic, Agro-ecological & Crop Combination Regions.
4. Agricultural Systems of the World (Whittlesey's classification) and Agricultural Land use model (Von Thuenen, modification and relevance).
5. Agricultural Revolutions in India: Green, White, Blue, Pink

Reading List

- Basu, D.N., and Guha, G.S., 1996: *Agro-Climatic Regional Planning in India*, Vol.I & II, Concept Publication, New Delhi.
- Bryant, C.R., Johnston, T.R, 1992: *Agriculture in the City Countryside*, Belhaven Press, London.
- Burger, A., 1994: *Agriculture of the World*, Aldershot, Avebury.
- Grigg, D.B., 1984: *Introduction to Agricultural Geography*, Hutchinson, London.
- Ilbery B. W., 1985: *Agricultural Geography: A Social and Economic Analysis*, Oxford University Press.
- Mohammad, N., 1992: *New Dimension in Agriculture Geography*, Vol. I to VIII, Concept Pub., NewDelhi.
- Roling, N.G., and Wageruters, M.A.E.,(ed.) 1998: *Facilitating Sustainable Agriculture*, CambridgeUniversity Press, Cambridge.
- Shafi, M., 2006: *Agricultural Geography*, Doring Kindersley India Pvt. Ltd., New Delhi
- Singh, J., and Dhillon, S.S., 1984: *Agricultural Geography*, Tata McGraw Hill, New Delhi.
- Tarrant J. R., 1973: *Agricultural Geography*, David and Charles, Devon.

GEOGRAPHY PRACTICAL- C13 + C14 LAB**Marks : Pr (ESE: 3Hrs) =50****Pass Marks: Pr (ESE) = 20*****Guidelines to Examiners for******End Semester Examination (ESE):***

Evaluation of project dissertation work may be as per the following guidelines:

Project model (if any) and the Project record notebook = 25 marks
Project presentation and viva-voce = 25 marks

Overall project dissertation may be evaluated under the following heads:

- *Motivation for the choice of topic*
- *Project dissertation design*
- *Methodology and Content depth*
- *Results and Discussion*
- *Future Scope & References*
- *Presentation style*
- *Viva-voce*

DISSERTATION

Student alone or in a group of not more than five, shall undertake one Project Dissertation approved by the Subject Teacher/H.O.D. of the Department/College concerned. The progress of the Project Dissertation shall be monitored by the faculty members at regular intervals.

COURSES OF STUDY FOR **GENERIC ELECTIVE ‘B. A. Hons’** PROGRAMME IN
“GEOGRAPHY”

SEMESTER I**GENERIC ELECTIVE****1 Paper**

Total 100 x 1 = 100 Marks

I. GENERIC ELECTIVE (GE 1)

(Credits: Theory-04, Practicals-02)

- All Four Generic Papers (One paper to be studied in each semester) of Geography to be studied by the Students of **Other than Geography Honours**.
- Students of **Geography Honours** must Refer Content from the **Syllabus of Opted Generic Elective Subject**.

Marks : 75 (ESE: 3Hrs) + 25 (Pr 3Hrs)=100	Pass Marks: Th ESE = 30 + Pr ESE =10
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*Instruction to Question Setter for
 End Semester Examination (ESE):*

*There will be two group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** six questions of fifteen marks each, out of which any four are to answer.*

Note: There may be subdivisions in each question asked in Theory Examinations.

GEOMORPHOLOGY**Theory: 60 Lectures**

1. Geomorphology: Nature and Scope.
2. Earth: Interior Structure and Isostasy.
3. Earth Movements: Plate Tectonics, Types of Folds and Faults, Earthquakes and Volcanoes
4. Geomorphic Processes: Weathering, Cycle of Erosion (Davis).
5. Evolution of Landforms (Erosional and Depositional): Fluvial, Karst, Aeolian and Glacial.

Reading List

- Bloom A. L., 2003: *Geomorphology: A Systematic Analysis of Late Cenozoic Landforms*, Prentice-Hall of India, New Delhi.
- Bridges E. M., 1990: *World Geomorphology*, Cambridge University Press, Cambridge.
- Christopherson, Robert W., (2011), *Geosystems: An Introduction to Physical Geography*, 8 Ed., Macmillan Publishing Company
- Kale V. S. and Gupta A., 2001: *Introduction to Geomorphology*, Orient Longman, Hyderabad.
- Knighton A. D., 1984: *Fluvial Forms and Processes*, Edward Arnold Publishers, London.
- Richards K. S., 1982: *Rivers: Form and Processes in Alluvial Channels*, Methuen, London.
- Selby, M.J., (2005), *Earth's Changing Surface*, Indian Edition, OUP
- Skinner, Brian J. and Stephen C. Porter (2000), *The Dynamic Earth: An Introduction to physical Geology*, 4th Edition, John Wiley and Sons
- Thornbury W. D., 1968: *Principles of Geomorphology*, Wiley.
- Gautam, A (2010): *Bhautik Bhugol*, Rastogi Publications, Meerut
- Tikkaa, R N (1989): *Bhautik Bhugol ka Swaroop*, Kedarnath Ram Nath, Meerut
- Singh, S (2009): *Bhautik Bhugol ka Swaroop*, Prayag Pustak, Allahabad
- Tiwary Ram Kumar, *Bhautik bhugol*, Rajasthan Hindi Granth Academy, Jaipur

GEOGRAPHY PRACTICAL- GE 1 LAB**60 Lectures****Marks : Pr (ESE: 3Hrs) =25****Pass Marks: Pr (ESE) = 10*****Instruction to Question Setter for******End Semester Examination (ESE):***

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	<i>= 15 marks</i>
<i>Practical record notebook</i>	<i>= 5 marks</i>
<i>Viva-voce</i>	<i>= 5 marks</i>

CARTOGRAPHIC TECHNIQUES

1. Scales – Concept and application; Graphical Construction of Plain

2. Map Projections – Classification, Properties and Uses; Graphical Construction of Polar Zenithal Stereographic Projection, Simple Conical Projection with One standard parallel and Two standard parallel, Bonne's Projections.

Reading List

- 1. Anson R. and Ormelling F. J., 1994: *International Cartographic Association: Basic Cartographic Vol.* Pregmen Press.
- 2. Gupta K.K. and Tyagi, V. C., 1992: *Working with Map*, Survey of India, DST, New Delhi.
- 3. Mishra R.P. and Ramesh, A., 1989: *Fundamentals of Cartography*, Concept, New Delhi.
- 4. Monkhouse F. J. and Wilkinson H. R., 1973: *Maps and Diagrams*, Methuen, London.
- Rhind D. W. and Taylor D. R. F., (eds.), 1989: *Cartography: Past, Present and Future*, Elsevier, International Cartographic Association.
- Robinson A. H., 2009: *Elements of Cartography*, John Wiley and Sons, New York.
- Sharma J. P., 2010: *Prayogic Bhugol*, Rastogi Publishers, Meerut.
- Singh R. L. and Singh R. P. B., 1999: *Elements of Practical Geography*, Kalyani Publishers.
- Sarkar, A. (2015) *Practical geography: A systematic approach*. Orient Black Swan Private Ltd., New Delhi
- Singh R L & Rana P B Singh (1991) *Prayogtmak Bhugol ke Mool Tatva*, Kalyani Publishers, New Delhi
- Sharma, J P (2010) *Prayogtmak Bhugol ki Rooprekha*, Rastogi Publications, Meerut
- Singh, R L & Dutta, P K (2012) *Prayogtmak Bhugol*, Central Book Depot, Allahabad

SEMESTER II**GENERIC ELECTIVE****1 Paper****Total 100 x 1 = 100 Marks****II. GENERIC ELECTIVE (GE 2)**

(Credits: Theory-04, Practicals-02)

Marks : 75 (ESE: 3Hrs) + 25 (Pr 3Hrs)=100**Pass Marks: Th ESE = 30 + Pr ESE =10*****Instruction to Question Setter for******End Semester Examination (ESE):***

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

HUMAN GEOGRAPHY**Theory: 60 Lectures**

1. Introduction: Defining Human Geography; Major Themes; Contemporary Relevance
2. Space and Society: Cultural Regions; Race; Religion and Language
3. Population: Population Growth and Distribution; Population Composition; Demographic Transition Theory
4. Settlements: Types of Rural Settlements; Classification of Urban Settlements.
5. Population-Resource Relationship

Reading List

- Chandna, R.C. (2010) Population Geography, Kalyani Publisher.
- Hassan, M.I. (2005) Population Geography, Rawat Publications, Jaipur
- Daniel, P.A. and Hopkinson, M.F. (1989) The Geography of Settlement, Oliver & Boyd, London.
- Johnston R; Gregory D, Pratt G. et al. (2008) The Dictionary of Human Geography, Blackwell Publication.
- Jordan-Bychkov et al. (2006) The Human Mosaic: A Thematic Introduction to Cultural Geography. W. H. Freeman and Company, New York.
- Kaushik, S.D. (2010) Manav Bhugol, Rastogi Publication, Meerut.
- Maurya, S.D. (2012) Manav Bhugol, Sharda Pustak Bhawan. Allahabad.
- Hussain, Majid (2012) Manav Bhugol. Rawat Publications, Jaipur

GEOGRAPHY PRACTICAL- GE2 LAB**60 Lectures****Marks : Pr (ESE: 3Hrs) =25****Pass Marks: Pr (ESE) = 10*****Instruction to Question Setter for*****End Semester Examination (ESE):**

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	<i>= 15 marks</i>
<i>Practical record notebook</i>	<i>= 5 marks</i>
<i>Viva-voce</i>	<i>= 5 marks</i>

PRACTICAL- THEMATIC CARTOGRAPHY

1. Diagrammatic Data Presentation – Line, Bar and Circle.
2. Thematic Mapping Techniques – Properties, Uses and Limitations; Areal Data -- Choropleth, Dot, Proportional Circles; Point Data – Isopleths.

Reading List

- Cuff J. D. and Mattson M. T., 1982: *Thematic Maps: Their Design and Production*, Methuen Young Books
- Dent B. D., Torguson J. S., and Holder T. W., 2008: *Cartography: Thematic Map Design* (6th Edition), Mcgraw-Hill Higher Education
- Gupta K. K. and Tyagi V. C., 1992: *Working with Maps*, Survey of India, DST, New Delhi.
- Kraak M.-J. and Ormeling F., 2003: *Cartography: Visualization of Geo-Spatial Data*, Prentice-Hall.
- Mishra R. P. and Ramesh A., 1989: *Fundamentals of Cartography*, Concept, New Delhi.
- Sharma J. P., 2010: *Prayogic Bhugol*, Rastogi Publishers, Meerut.
- Singh R. L. and Singh R. P. B., 1999: *Elements of Practical Geography*, Kalyani Publishers.
- Slocum T. A., McMaster R. B. and Kessler F. C., 2008: *Thematic Cartography and Geovisualization*(3rd Edition), Prentice Hall.
- Tyner J. A., 2010: *Principles of Map Design*, The Guilford Press.
- Sarkar, A. (2015) *Practical geography: A systematic approach*. Orient Black Swan Private Ltd., NewDelhi
- Singh, L R & Singh R (1977): *Manchitra or Pryaogatamek Bhugol* , Central Book, Depot, Allahabad
- Bhopal Singh R L and Dutta P K (2012) *Prayogatama Bhugol*, Central Book Depot, Allahabad.

SEMESTER III**GENERIC ELECTIVE****1 Paper****Total 100 x 1 = 100 Marks****III. GENERIC ELECTIVE (GE 3)**

(Credits: Theory-04, Practicals-02)

Marks : 100 (ESE: 3Hrs) =100**Pass Marks: Th ESE = 40*****Instruction to Question Setter for******End Semester Examination (ESE):***

There will be two group of questions. Group A is compulsory and will contain two questions. Question No.1 will be very short answer type consisting of ten questions of 1 mark each. Question No.2 & 3 will be short answer type of 5 marks. Group B will contain descriptive type six questions of twenty marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

CLIMATOLOGY**Theory: 60 Lectures**

1. Atmospheric Composition and Structure – Variation with Altitude, Latitude and Season.
2. Insolation and Temperature – Factors and Distribution, Heat Budget, Temperature Inversion.
3. Atmospheric Pressure and Winds – Planetary Winds, Forces affecting Winds, General Circulation, Jet Streams.
4. Atmospheric Moisture – Evaporation, Humidity, Condensation, Fog and Clouds, Precipitation Types, Stability and Instability; Climatic Regions (Koppen)
5. Cyclones – Tropical Cyclones, Extra Tropical Cyclones, Monsoon - Origin and Mechanism.

Reading List

- Barry R. G. and Carleton A. M., 2001: *Synoptic and Dynamic Climatology*, Routledge, UK.
- Barry R. G. and Corley R. J., 1998: *Atmosphere, Weather and Climate*, Routledge, New York.
- Critchfield H. J., 1987: *General Climatology*, Prentice-Hall of India, New Delhi
- Lutgens F. K., Tarbuck E. J. and Tasa D., 2009: *The Atmosphere: An Introduction to Meteorology*, Prentice-Hall, Englewood Cliffs, New Jersey.
- Oliver J. E. and Hidore J. J., 2002: *Climatology: An Atmospheric Science*, Pearson Education, New Delhi.
- Trewartha G. T. and Horne L. H., 1980: *An Introduction to Climate*, McGraw-Hill.
- Gupta L S(2000): *Jalvayu Vigyan*, Hindi Madhyam Karyanvay Nidishalya, Delhi Vishwa Vidhyalaya, Delhi
- Lal, D S (2006): *Jalvayu Vigyan*, Prayag Pustak Bhavan, Allahabad
- Vatal, M (1986): *Bhautik Bhugol*, Central Book Depot, Allahabad
- Singh, S (2009): *Jalvayu Vigyan*, Prayag Pustak Bhawan, Allahabad

GEOGRAPHY PRACTICAL- GE3 LAB**60 Lectures****Marks : Pr (ESE: 3Hrs) =25****Pass Marks: Pr (ESE) = 10*****Instruction to Question Setter for******End Semester Examination (ESE):***

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	= 15 marks
<i>Practical record notebook</i>	= 5 marks
<i>Viva-voce</i>	= 5 marks

PRACTICAL- STATISTICAL METHODS IN GEOGRAPHY

1. Tabulation and Descriptive Statistics: Frequencies (Deciles, Quartiles), Cross Tabulation,
2. Central Tendency (Mean, Median and Mode)
3. Dispersion (Standard Deviation, Variance and Coefficient of Variation) Scattered diagram, Histogram, Frequency Polygon & Frequency Curve

Class Record: Each student will submit a record containing five exercises:

1. Measures of central tendency and dispersion would be computed and interpreted for any two attributes.
2. Histograms and frequency curve would be prepared **and** interpreted for one or two variables.
3. Based on of the sample set and using two relevant attributes, a scatter and regression line would be plotted and mapped with a short interpretation.

Reading List

- Berry B. J. L. and Marble D. F. (eds.): *Spatial Analysis – A Reader in Geography*.
- Ebdon D., 1977: *Statistics in Geography: A Practical Approach*.
- Hammond P. and Mc Cullagh P. S., 1978: *Quantitative Techniques in Geography: An Introduction*, Oxford University Press.
- King L. S., 1969: *Statistical Analysis in Geography*, Prentice-Hall.
- Mahmood A., 1977: *Statistical Methods in Geographical Studies*, Concept.
- Pal S. K., 1998: *Statistics for Geoscientists*, Tata McGraw Hill, New Delhi.
- Sarkar, A. (2013) *Quantitative geography: techniques and presentations*. Orient Black Swan PrivateLtd., New Delhi
- Silk J., 1979: *Statistical Concepts in Geography*, Allen and Unwin, London.
- Spiegel M. R.: *Statistics, Schaum's Outline Series*.
- Yeates M., 1974: *An Introduction to Quantitative Analysis in Human Geography*, McGraw Hill, New York.
- Shinha, Indira (2007) *Sankhyiki bhugol*. Discovery Publishing House, New Delhi

SEMESTER IV**GENERIC ELECTIVE****1 Paper****Total 100 x 1 = 100 Marks****IV. GENERIC ELECTIVE (GE 4)**

(Credits: Theory-04, Practicals-02)

Marks : 75 (ESE: 3Hrs) + 25 (Pr 3Hrs)=100**Pass Marks: Th ESE = 30 + Pr ESE =10***Instruction to Question Setter for**End Semester Examination (ESE):*

There will be **two** group of questions. **Group A is compulsory** and will contain two questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 will be short answer type** of 5 marks. **Group B will contain descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

ECONOMIC GEOGRAPHY**Theory: 60 Lectures**

1. Introduction: Concept and classification of economic activity
2. Factors Affecting location of Economic Activity with special reference to Agriculture (Von Thunen theory), Industry (Weber's theory).
3. Primary Activities: Subsistence and Commercial agriculture, forestry, fishing and mining.
4. Secondary Activities: Manufacturing (Cotton Textile, Iron and Steel- with reference to world), Concept of Manufacturing Regions, Special Economic Zones
5. Tertiary Activities: Transport, Trade and Services.

Reading List

- Alexander J. W., 1963: *Economic Geography*, Prentice-Hall Inc., Englewood Cliffs, New Jersey.
- Coe N. M., Kelly P. F. and Yeung H. W., 2007: *Economic Geography: A Contemporary Introduction*, Wiley-Blackwell.
- Hodder B. W. and Lee Roger, 1974: *Economic Geography*, Taylor and Francis.
- Combes P., Mayer T. and Thisse J. F., 2008: *Economic Geography: The Integration of Regions and Nations*, Princeton University Press.
- Wheeler J. O., 1998: *Economic Geography*, Wiley.
- Durand L., 1961: *Economic Geography*, Crowell.
- Bagchi-Sen S. and Smith H. L., 2006: *Economic Geography: Past, Present and Future*, Taylor and Francis.
- Willington D. E., 2008: *Economic Geography*, Husband Press.
- Clark, Gordon L.; Feldman, M.P. and Gertler, M.S., eds. 2000: *The Oxford*

GEOGRAPHY PRACTICAL- GE4 LAB**60 Lectures****Marks : Pr (ESE: 3Hrs) =25****Pass Marks: Pr (ESE) = 10*****Instruction to Question Setter for******End Semester Examination (ESE):***

There will be one Practical Examination of 3Hrs duration. Evaluation of Practical Examination may be as per the following guidelines:

<i>Experiment</i>	<i>= 15 marks</i>
<i>Practical record notebook</i>	<i>= 5 marks</i>
<i>Viva-voce</i>	<i>= 5 marks</i>

INSTRUMENTAL SURVEY

1. Plane Table: Radiation, Intersection Method.
2. Prismatic Compass: Open & Closed Traverse.

Reading List:

- Misra, R.P & Ramesh A: (1986): Fundamentals of Cartography, McMillan Co.New Delhi
 - Robinson A.H (1995) Elements of Cartography John Wiley & Sons USA
 - Sarkar A.K.(1997): Practical Geography :A Systematic Approach, Oriental Longman Calcutta
 - Sharma J.P.(2010): Prayogatmak Bhugol, Sahitya Bhawan
-

**SAMPLE CALCULATION FOR SGPA & CGPA FOR UNDERGRADUATE 'B.Sc./B.A./B.Com
Honours & General' PROGRAMME**

Distribution of Credits Semester wise for Undergraduate Honours Courses

Table B-1: UG (B.A./ B.Sc./B.Com. Hons. Programme)

Semester wise distribution of 140 Credits

	CC	AECC	GE	SEC	DSE	Total credits
Semester I	12	02	06			20
Semester II	12	02	06			20
Semester III	18		06	02		26
Semester IV	18		06	02		26
Semester V	12				12	24
Semester VI	12				12	24
	84	04	24	04	24	140

CC=Core Course; AECC=Ability Enhancement Compulsory Course; GE=Generic Elective; SEC=Skill Enhancement Course; DSE=Discipline Specific Elective

Table B-2: UG (B.A./ B.Sc./B.Com. Programme)

Semester wise distribution of 120 Credits

	CC	AECC	GE	SEC	DSE	Total credits
Semester I	18	02				20
Semester II	18	02				20
Semester III	18			02		20
Semester IV	18			02		20
Semester V				02	18	20
Semester VI				02	18	20
	72	04		08	36	120

CC=Core Course; AECC=Ability Enhancement Compulsory Course; GE=Generic Elective; SEC=Skill Enhancement Course; DSE=Discipline Specific Elective

Table B-3: Sample calculation for SGPA for B.Sc./B.A./B.Com Honours Programme

Course	Credit	Grade Letter	Grade Point	Credit Point (Credit X Grade)	SGPA (Credit Point/Credit)
Semester I					
C-1	06	A	8	48	
C-2	06	B+	7	42	
AECC-1	02	B	6	12	
GE-1	06	B	6	36	
Total	20			138	6.9 (138/20)
Semester II					
C-3	06	B	6	36	
C-4	06	C	5	30	
AECC-2	02	B+	7	14	
GE-2	06	A+	9	54	
Total	20			134	6.7 (134/20)
Semester III					
C-5	06	A+	9	54	
C-6	06	O	10	60	
C-7	06	A	8	48	
SEC-1	02	A	8	16	
GE-3	06	O	10	60	
Total	26			238	9.15 (238/26)
Semester IV					
C-8	06	B	6	36	
C-9	06	A+	9	54	
C-10	06	B	6	36	
SEC-2	02	A+	9	18	
GE-4	06	A	8	48	
Total	26			192	7.38 (192/26)
Semester V					
C-11	06	B	6	36	
C-12	06	B+	7	42	
DSE-1	06	O	10	60	
DSE-2	06	A	8	48	
Total	24			186	7.75 (186/24)
Semester VI					
C-13	06	A+	9	54	
C-14	06	A	8	48	
DSE-3	06	B+	7	42	
DSE-4	06	A	8	48	
Total	24			192	8.0 (192/24)
CGPA					
Grand Total	140			1080	7.71 (1080/140)

Table B-4: Sample calculation for CGPA for B.Sc./B.A./B.Com Honours Programme

Semester I	Semester II	Semester III	Semester IV	Semester V	Semester VI
Credit:20; SGPA:6.9	Credit:20; SGPA: 6.7	Credit:26; SGPA: 9.15	Credit:26; SGPA: 7.38	Credit:24; SGPA: 7.75	Credit:24; SGPA: 8.0

Thus CGPA= (20x6.9+20x6.7+26x9.15+26x7.38+24x7.75+24x8.0)/140=7.71

Table B-5: Sample calculation for SGPA for B.A./B.Sc./B.Com. Program

Course	Credit	Grade Letter	Grade Point	Credit Point (Credit X Grade)	SGPA (Credit Point/Credit)
Semester I					
DSC - 1A	06	B	6	36	
DSC - 2A	06	B+	7	42	
DSC - 3A	06	C	5	30	
AECC – 1	02	B	6	12	
Total	20			120	6.0 (120/20)
Semester II					
DSC - 1B	06	B	6	36	
DSC - 2B	06	B	6	36	
DSC - 3B	06	C	5	30	
AECC – 2	02	A+	9	18	
Total	20			120	6.0 (120/20)
Semester III					
DSC - 1C	06	A	8	48	
DSC - 2C	06	A+	9	54	
DSC - 3C	06	A	8	48	
SEC – 1	02	A	8	16	
Total	20			166	8.3 (166/20)
Semester IV					
DSC - 1D	06	C	5	30	
DSC - 2D	06	B	6	36	
DSC - 3D	06	B+	7	42	
SEC - 2	02	A+	9	18	
Total	20			126	6.3 (126/20)
Semester V					
DSE - 1A	06	B	6	36	
DSE - 2A	06	A+	9	54	
DSE - 3A	06	A	8	48	
SEC – 3	02	B	6	12	
Total	20			150	7.5 (150/20)
Semester VI					
DSE - 1B	06	B+	7	42	
DSE - 1B	06	B	6	36	
DSE - 1B	06	C	5	30	
SEC - 4	02	C	5	10	
Total	20			118	5.9 (118/20)
CGPA					
Grand Total	120			800	6.67 (800/120)

Table B- 6: Sample calculation for CGPA for B.A./B.Sc./B.Com. Program

Semester I	Semester II	Semester III	Semester IV	Semester V	Semester VI
Credit:20; SGPA: 6.0	Credit:20; SGPA: 6.0	Credit:20; SGPA: 8.3	Credit:20; SGPA: 6.3	Credit:20; SGPA: 7.5	Credit:20; SGPA: 5.9

Thus CGPA= (20x6.0+20x6.0+20x8.3+20x6.3+20x7.5+20x5.9)/120=6.67

MARKS DISTRIBUTION FOR EXAMINATIONS AND FORMAT OF QUESTION PAPERS

Marks Distribution of Mid Semester Theory Examinations:**Table No. 15:** Marks distribution of Theory Examinations of Mid Semester

Topic	Code	Full Marks	Pass Marks	Time	Group-A (Very short answer type Compulsory Questions) No. of Questions x Marks = F.M.	Group-B (Descriptive Questions with Choices) No. of Questions x Marks = F.M.	Total No. of Questions to Set	
							Group A	Group B
Mid Sem*	T15	15	6	1 Hr	5 x 1 =5	2 (out of 3) x 5 =10	5	3
	T25	25	10	1 Hr	5 x 1 =5	4 (out of 6) x 5 =20	5	6

Marks Distribution of End Semester Theory Examinations:**Table No. 16:** Marks distribution of Theory Examinations of End Semester

Topic	Code	Full Marks	Pass Marks	Time	Group-A# (Very short answer type Compulsory Questions) No. of Questions x Marks = F.M.	Group-B (Descriptive Questions with Choices) No. of Questions x Marks = F.M.	Total No. of Questions to Set	
							Group A#	Group B
End Sem	T60	60	24	3 Hrs	Q.No.1 (10x1) + 1x5 =15	3 (out of 5) x 15 =45	2	5
	T75	75	30	3 Hrs	Q.No.1 (10x1) + 1x5 =15	4 (out of 6) x 15 =60	2	6
	T100	100	40	3 Hrs	Q.No.1 (10x1) + 2x5 =20	4 (out of 6) x 20 =80	3	6
	T50 +T50	50X2=100	20	3 Hrs	2 x 5 =10	2 (out of 3) x 20 =40	2	3

Question No.1 in Group-A carries 10 very short answer type 1 Mark Questions.

Marks Distribution of Mid/End Semester Practical Examinations:**Table No. 17:** Marks distribution of Practical Examinations of End Semester

Topic	Code	Full Marks	Pass Marks	Time	Distribution of Marks			Total No. of Questions to Set
					Experiment	Record	Viva	
End Sem	P25	25	10	3 Hrs	15	5	5	
	P50	50	20	3 Hrs	30	10	10	Pr. with components of both papers
	P75	75	30	3 Hrs	45	15	15	Pr. with components of all three papers
	P100	100	40	3 Hrs	60	20	20	Pr. with components of all four papers

Abbreviations : T= Theory Examination, P= Practical Examination.

Mid Sem* : There will be 15 Marks Theory Examination in Practical Subjects and 25 Marks Theory Examination in Non-Practical Subjects/ Papers. 25 Marks Theory Examination may include 10 Marks questions from Assignment/ Project/ Tutorial where ever applicable.

Note : There may be subdivisions in each question asked in Theory Examinations.

FORMAT OF QUESTION PAPER FOR MID SEM EXAMINATION

OF

SUBJECTS WITH PRACTICAL



Ranchi University, Ranchi

Mid Sem No.Exam Year

Subject/ Code

F.M. =15**Time**=1Hr.

General Instructions:

समान्य निर्देश :

- i. **Group A** carries very short answer type compulsory questions.
(खंड 'A' में अत्यंत लघु उत्तरीय अनिवार्य प्रश्न हैं।)
- ii. **Answer 2 out of 3** subjective/ descriptive questions given in **Group B**.
(खंड 'B' के तीन में से किन्हीं दो विषयनिष्ठ/ वर्णनात्मक प्रश्नों के उत्तर दें।)
- iii. Answer in your own words as far as practicable.
(यथासंभव अपने शब्दों में उत्तर दें।)
- iv. Answer all sub parts of a question at one place.
(एक प्रश्न के सभी भागों के उत्तर एक साथ लिखें।)
- v. Numbers in right indicate full marks of the question.
(पूर्णांक दायीं ओर लिखे गये हैं।)

Group A

- | | |
|---------|---------|
| 1. | [5x1=5] |
| 2. | |
| 3. | |
| 4. | |
| 5. | |

Group B

- | | |
|---------|-----|
| 6. | [5] |
| 7. | [5] |
| 8. | [5] |

Note: There may be subdivisions in each question asked in Theory Examination.

FORMAT OF QUESTION PAPER FOR MID SEM EXAMINATION

OF

SUBJECTS WITHOUT PRACTICAL



Ranchi University, Ranchi

Mid Sem No.Exam Year

Subject/ Code

F.M. =25

Time=1Hr.

General Instructions:

समान्य निर्देश :

- i. **Group A** carries very short answer type compulsory questions.
(खंड 'A' में अत्यंत लघु उत्तरीय अनिवार्य प्रश्न हैं।)
- ii. **Answer 4 out of 6** subjective/ descriptive questions given in **Group B**.
(खंड 'B' के छः में से किन्हीं चार विषयनिष्ठ/ वर्णनात्मक प्रश्नों के उत्तर दें।)
- iii. Answer in your own words as far as practicable.
(यथासंभव अपने शब्दों में उत्तर दें।)
- iv. Answer all sub parts of a question at one place.
(एक प्रश्न के सभी भागों के उत्तर एक साथ लिखें।)
- v. Numbers in right indicate full marks of the question.
(पूर्णांक दायीं ओर लिखे गये हैं।)

Group A

- | | |
|---------|---------|
| 1. | [5x1=5] |
| 2. | |
| 3. | |
| 4. | |
| 5. | |

Group B

- | | |
|----------|-----|
| 6. | [5] |
| 7. | [5] |
| 8. | [5] |
| 9. | [5] |
| 10. | [5] |
| 11. | [5] |

Note: There may be subdivisions in each question asked in Theory Examination.

FORMAT OF QUESTION PAPER FOR END SEM EXAMINATION

OF

AECC NH + MB COMMUNICATION



Ranchi University, Ranchi

End Sem No.Exam Year

Subject/ Code

F.M. =50**P.M.**=20**Time**=1.5Hrs.

General Instructions:

- i. **Group A** carries short answer type **compulsory** questions.
(खंड 'A' में लघु उत्तरीय अनिवार्य प्रश्न हैं।)
- ii. **Answer 2 out of 3** subjective/ descriptive questions given in **Group B**.
(खंड 'B' के तीन में से किन्हीं दो विषयनिष्ठ/ वर्णनात्मक प्रश्नों के उत्तर दें।)
- iii. Answer in your own words as far as practicable.
(यथासंभव अपने शब्दों में उत्तर दें।)
- iv. Answer all sub parts of a question at one place.
(एक प्रश्न के सभी भागों के उत्तर एक साथ लिखें।)
- v. Numbers in right indicate full marks of the question.
(पूर्णांक दायी ओर लिखे गये हैं।)

Group A

1. [5]
2. [5]

Group B

3. [20]
4. [20]
5. [20]

Note: There may be subdivisions in each question asked in Theory Examination.

FORMAT OF QUESTION PAPER FOR END SEM EXAMINATION

OF

SUBJECTS WITH PRACTICAL



Ranchi University, Ranchi

End Sem No.Exam Year

Subject/ Code

F.M. =60**P.M.**=30 (Including Mid Sem)**Time**=3Hrs.

General Instructions:

- i. **Group A** carries very short answer type **compulsory** questions.
- ii. **Answer 3 out of 5** subjective/ descriptive questions given in **Group B**.
(खंड 'B' के पाँच में से किन्हीं तीन विषयनिष्ठ/ वर्णनात्मक प्रश्नों के उत्तर दें।)
- iii. Answer in your own words as far as practicable.
(यथासंभव अपने शब्दों में उत्तर दें।)
- iv. Answer all sub parts of a question at one place.
(एक प्रश्न के सभी भागों के उत्तर एक साथ लिखें।)
- v. Numbers in right indicate full marks of the question.
(पूर्णांक दायीं ओर लिखे गये हैं।)

Group A

- | | | |
|-------|-------|-----------|
| 1. | | [10x1=10] |
| i. | ..... | [10x1=10] |
| ii. | ..... |  |
| iii. | ..... |  |
| iv. | ..... |  |
| v. | ..... |  |
| vi. | ..... |  |
| vii. | ..... |  |
| viii. | ..... |  |
| ix. | ..... |  |
| x. | ..... |  |
| 2. | ..... | [5] |

Group B

- | | | |
|----|-------|------|
| 3. | ..... | [15] |
| 4. | ..... | [15] |
| 5. | ..... | [15] |
| 6. | ..... | [15] |
| 7. | ..... | [15] |

Note: There may be subdivisions in each question asked in Theory Examination.

FORMAT OF QUESTION PAPER FOR END SEM EXAMINATION

OF

SUBJECTS WITHOUT PRACTICAL



Ranchi University, Ranchi

End Sem No.Exam Year

Subject/ Code

F.M. =75**P.M.**=40 (Including Mid Sem)**Time**=3Hrs.

General Instructions:

- i. **Group A** carries very short answer type **compulsory** questions.
- ii. **Answer 4 out of 6** subjective/ descriptive questions given in **Group B**.
(खंड 'B' के छः में से किन्हीं चार विषयनिष्ठ/ वर्णनात्मक प्रश्नों के उत्तर दें।)
- iii. Answer in your own words as far as practicable.
(यथासंभव अपने शब्दों में उत्तर दें।)
- iv. Answer all sub parts of a question at one place.
(एक प्रश्न के सभी भागों के उत्तर एक साथ लिखें।)
- v. Numbers in right indicate full marks of the question.
(पूर्णांक दायीं ओर लिखे गये हैं।)

Group A

- | | | |
|----|------------|-----------|
| 1. | | [10x1=10] |
| | i. | |
| | ii. | |
| | iii. | |
| | iv. | |
| | v. | |
| | vi. | |
| | vii. | |
| | viii. | |
| | ix. | |
| | x. | |
| 2. | ..... | [5] |

Group B

- | | | |
|----|-------|------|
| 3. | ..... | [15] |
| 4. | ..... | [15] |
| 5. | ..... | [15] |
| 6. | ..... | [15] |
| 7. | ..... | [15] |
| 8. | ..... | [15] |

Note: There may be subdivisions in each question asked in Theory Examination.

FORMAT OF QUESTION PAPER FOR END SEM EXAMINATION

OF

GE, SEC, GENERAL & AECC HINDI/ ENGLISH COMMUNICATION



Ranchi University, Ranchi

End Sem No.Exam Year

Subject/ Code

F.M. =100**P.M.**=40**Time**=3Hrs.**General Instructions:**

- i. **Group A** carries very short answer type **compulsory** questions.
- ii. **Answer 4 out of 6** subjective/ descriptive questions given in **Group B**.
(खंड 'B' के छः में से किन्हीं चार विषयनिष्ठ/ वर्णनात्मक प्रश्नों के उत्तर दें।)
- iii. Answer in your own words as far as practicable.
(यथासंभव अपने शब्दों में उत्तर दें।)
- iv. Answer all sub parts of a question at one place.
(एक प्रश्न के सभी भागों के उत्तर एक साथ लिखें।)
- v. Numbers in right indicate full marks of the question.
(पूर्णांक दायीं ओर लिखे गये हैं।)

Group A

- | | | |
|----|------------|-----------|
| 1. | ..... | [10x1=10] |
| | i. | |
| | ii. | |
| | iii. | |
| | iv. | |
| | v. | |
| | vi. | |
| | vii. | |
| | viii. | |
| | ix. | |
| | x. | |
| 2. | ..... | [5] |
| 3. | ..... | [5] |

Group B

- | | | |
|----|-------|------|
| 4. | ..... | [20] |
| 5. | ..... | [20] |
| 6. | ..... | [20] |
| 7. | ..... | [20] |
| 8. | ..... | [20] |
| 9. | ..... | [20] |

Note: There may be subdivisions in each question asked in Theory Examination.