

BLISc /MLISc-I and MLISc-II
Syllabus for Semester and Choice Based Credit System
(From Session 2016-17)
Rashtrasant Tukadoji Maharaj Nagpur University Nagpur
Department of Library and Information Science

A) General

1. Bachelor of Library and Information Science One Year Course will be in two semesters i.e. Semester-I and Semester-II on the basis of Credit Based Semester pattern. It is recommended that it will be treated as equivalent to First Year of the MLISc (Two Years Integrated Choice Based Credit System pattern Course).
2. Semester I of BLISc (CBS) will be equivalent to MLISC-I (CBCS) Semester I
3. Semester II of BLISc (CBS) will be equivalent to MLISC-I (CBCS) Semester II
4. Semester 1 and 2 will be for MLISc Part-I and Semester 3 and 4 will be for MLISc Part-II.
5. There shall be minimum 90 teaching days in each Semester.
6. There shall be 3 Theory papers and 4 Practical papers in each Semester for BLISc (CBS) / MLISc-I (CBCS). All the papers are Core and compulsory.
7. There shall be 3 Core, 3 Elective and 1 Foundation Paper for MLISc-II (CBCS) for each semester. The student has to take all the 3 Core papers, any 1 Elective Papers from the options given in the syllabus for semester III and IV. The Foundation paper given in the syllabus is for the students coming from other departments. MLISc – II (CBCS) Semester III and IV students should select the Foundation Course from any other department of their choice. They should earn the credits from the respective departments.
8. There will be 100 marks in each paper, out of which 80 marks will be for university examination and 20 marks will be for Internal Assessment.

B) Pattern of Question Paper

9. There will be 4 units in each paper and one question will be asked on each unit. Total there will be 5 questions. The 5^h question on Short Note encompassing all units. Each Question will carry 16 marks.
10. Maximum marks for each paper will be 100.
11. Duration of question paper will be 3 hours.

C) Internal assessment

12. In the Internal Assessment of 20 marks for each paper, 10 marks will be for assignment and 10 marks will be for seminar / viva-voce.
13. There will be 4 credits in each paper. 3.2 credits for university examination and 0.8 credit for internal assessment.
14. Details of Minimum passing marks for each paper is appended as Examination Scheme.
15. The students will be required to pass in both university examination and Internal assessment separately, and obtain minimum 40 marks in each paper of each semester.
16. Credits will be calculated on marks obtained out of 100.

D) Absorption scheme

17. While switching over to semester system, failure students will be given three chances to clear yearly pattern.
18. To get admission to the third semester, students should clear first semester. While appearing for fourth semester exam, a student must have cleared second semester
19. BLISc (CBS) / MLISc-I (CBCS) students shall get admission to third semester directly.
20. For absorption of the failure student in existing course who is not cleared MLISc Part-II he will be admitted for third semester.
21. A person who is unable to clear MLISc Part-I (Two year Integrated Course) exam to the given chances will be admitted for 1st semester.

E) Grade Point average (GPA) and Course Grade Point Average (CGPA)

22. On clearing paper, based on the cumulative score (out of 100) in that paper, a student will be given Grade Point Average (GPA) (Maximum of 10, and minimum of 4) for that paper. The students will be slotted a Course Grade Point average (CGOA) after clearing all the 4 Semesters as indicated below. (See Table I)
23. The enclosed chart gives the abstract of Semester Pattern scheme.

F) Admission

1. Admission of Post graduate programs (MLISc-4 semester course) will be based on merit at the graduation level . (B.A B.Sc. & B.Com)
2. ATKT refers to allowed to keep them in higher semester as per University norms

G) Examination

Examination of all subjects of I, II, III & IV semester shall be conducted by RTM Nagpur University as per the scheme of Examination is appended

H) Credit system for BLISc (CBS) / MLISc (CBCS)

- One credit Course of theory will be of one clock hour per week running for 15 weeks.
- Two credit course of theory will be of two clock hours per week running for 15 weeks
- Four credit course of theory will be of four clock hours per week running for 15 weeks
- Four credit course of practical will consist of 8 hours of computer laboratory / classroom

H) Exercise For 15 Weeks

- One credit shall be given for every 25 marks two credit for every 50 marks, four credit for 100 marks.
- Student can get requisite credit from the concerned college where she/he is mutually permitted on terms mutually agreed to complete the same and be eligible to appear for term end examination.
- The term and examination, however, shall be conducted by the RTM Nagpur university, Nagpur in the allotted centers

- The proportion of internal and external marks for each theory / practice subjects shall be of 20:80 marks (Internal Examination weightage 20%, external examination weightage 80%)
- For the external candidate, the internal marks shall be assigned in proportion to the marks scored by the candidate in external examination by the university
- Grades marks for each Course which requires minimum passing percentage as 50% would be converted to grades as shown in Table -1

Table 1: Conversion of marks to grades in grade point credit system

Mark Obtained	Grade	Grade Points
100-85	O	10
84-75	A	9
74-65	B	8
64-60	C	7
59-55	D	6
54-50	E	5
49 and less	F	0-Failed

A. Student failed to score minimum 50% mark in each head of passing and in aggregate shall be given F grade.

B. A Student who passes the internal tests but fails in term and Examination of Course shall be given F grade

C. Student with F grade in a course would be granted credit for that course would be granted credit for that course but not the grade for that course.

D. The Computation of Semester Grade Point Average (SGPA) and Cumulative Grade Point Average (C GPA) of an examinee shall be as per University pattern.

**Examination Leading to the Degree of Master of Library and Information
Science
(2 Year Integrated Course: Semester, Choice Based Credit System)
and BLISc (CBS) (equivalent to MLISc First Year CBCS)
First Year**

Semester I

Theory

Paper	Subject	Total Credits	Total Marks
I-01	Foundation of Library and Information Science	04	100 (80+20)
I-02	Knowledge Organization	04	100 (80+20)
I-03	Information Sources and Services	04	100 (80+20)
	Total	12	300

Practical

Paper	Subject	Total Credits	Total Marks
I-P01	Classification Practice (Part I)	04	100 (80+20)
I-P02	Cataloguing Practice (Part-I)	04	100 (80+20)
I-P03	Information Technology Basics (Part –I)	04	100 (80+20)
I-P04	Information Sources (Part-I)	04	100 (80+20)
	Total	16	400

Internal Assessment marks will be based on Assignments and Class Work.

Semester II

Theory

Paper	Subject	Total Credits	Total Marks
II-04	Management of Libraries and Information Centres	04	100 (80+20)
II-05	Information Technology Basics	04	100 (80+20)
II-06	Research Methods and Statistical Techniques	04	100 (80+20)
	Total	12	600

Practical

**Internal Assessment marks will be based on Assessment marks will be based on
Assignments and Class Work.**

Paper	Subject	Total Credits	Total Marks
II-P05	Classification Practice (Part II)	04	100
II-P06	Cataloguing Practice (Part-II)	04	100
II-P07	Information Technology Basics (Part –II)	04	100
II-P08	Information Sources (Part-II)	04	100
	Total	16	400

Second Year

Semester III

Theory

Paper	Subject	Total Credits	Total Marks
III-07	Information and Communication	04	100 (80+20)
III-08	Information Storage, Retrieval and Bibliographical Control	04	100 (80+20)
III-09	ICT Applications in Libraries and Information Centres	04	100 (80+20)
III -10 Elective Paper	Any one of the following	04	100 (80+20)
Elective Papers			
III –Elective I	Agricultural Information System		
III –Elective II	Legal Information System		
III –Elective III	Industrial Information System		
Foundation Paper (Not for Library and Information Science Students)			
III-11 Foundation Course –Part I	Fundamentals of Library Science	04	100 (80+20)
Total		20	500

Practical (Internal Assessment marks will be based on Assessment marks will be based on Assignments and Class Work.)

Paper	Subject	Total Credits	Total Marks
III-P09	Information Technology Applications (Part I)	04	100 (80+20)
III- P10	Survey of Libraries and Information Centres (Educational Tour Report)	02	50
III- P11	Internship	02	50
III-P12	Project Seminar	02	50
Total		10	250

Semester IV

Theory

Paper	Subject	Total Credits	Total Marks
IV-12	System Analysis and Bibliometrics	04	100 (80+20)
IV-13	Information Analysis, Repackaging and Consolidation	04	100 (80+20)
IV-14	Modern Libraries	04	100 (80+20)
IV-15 Elective Paper	Any one of the following	04	100 (80+20)
Elective Papers			
IV –Elective I	Archival, Museum and Archeological Information System		
IV–Elective II	Biotechnology Information System		
IV–Elective III	Engineering and Technological Library and Information System		
Foundation Paper (Not for Library and Information Science Students)			
IV-16 Foundation Course –Part I	Fundamentals of Information Science	04	100 (80+20)
	Total	24	500

Practical (Internal Assessment will be based on Assignments and Class Work)

Paper	Subject	Total Credits	Total Marks
IV-P13	Information Technology Applications (Part I I)	04	100 (80+20)
IV-P14	Project Work Report Viva Voce	04 02	100 (80+20) 50
	Total	10	250

BLISc (CBS) Semester I / MLISc -I (CBCS) Semester I

Sr. No.	Theory Paper	Teaching Scheme (Hrs/Week)	Credits	Examination Scheme						
				Duration (Hrs)	Maximum Marks		Total Marks	Minimum Passing Marks		Total
		External TH Marks (University)			Internal Assessment Marks	External TH Marks (University)		Internal Assessment Marks		
1	I-01	4	4	4	80	20	100	32	08	40
2	I-02	4	4	4	80	20	100	32	08	40
3	I-03	4	4	4	80	20	100	32	08	40
	Total	12	12	12	240	60	300	96	24	120
Practical Papers										
1	I-P01	8	4	8	80	20	100	32	08	40
2	I-P02	8	4	8	80	20	100	32	08	40
3	I-P03	8	4	8	80	20	100	32	08	40
4	I-P04	8	4	8	80	20	100	32	08	40
	Total	32	16	32	320	80	400	128	32	160
Net Total (Theory & Practical)		44	28	44	560	140	700	224	56	280

BLISc (CBS) Semester II / MLISc - I (CBCS) Semester II

Sr. No.	Theory Paper	Teaching Scheme (Hrs/Week)	Credits	Examination Scheme						
				Duration (Hrs)	Maximum Marks		Total Marks	Minimum Passing Marks		Total
		External TH Marks (University)			Internal Assessment Marks	External TH Marks (University)		Internal Assessment Marks		
1	II-04	4	4	4	80	20	100	32	08	40
2	II-05	4	4	4	80	20	100	32	08	40
3	II-06	4	4	4	80	20	100	32	08	40
	Total	12	12	12	240	60	300	96	24	120
Practical Papers										
1	II-P05	8	4	8	80	20	100	32	08	40
2	II-P06	8	4	8	80	20	100	32	08	40
3	II-P07	8	4	8	80	20	100	32	08	40
4	II-P08	8	4	8	80	20	100	32	08	40
	Total	32	16	32	320	80	400	128	32	160
Net Total (Theory & Practical)		44	28	44	560	140	700	224	56	280

MLISc - II (CBCS) Semester III

Core/ Elective/ Foundation	Theory Paper	Teaching Scheme (Hrs/Week)	Credits	Examination Scheme						
				Duration (Hrs)	Maximum Marks		Total Marks	Minimum Passing Marks		Total
					External TH Marks (University)	Internal Assessment Marks		External TH Marks (University)	Internal Assessment Marks	
Core	III-07	4	4	4	80	20	100	32	08	40
Core	III-08	4	4	4	80	20	100	32	08	40
Core	III-09	4	4	4	80	20	100	32	08	40
Elective	III-10 Elective Paper	4	4	4	80	20	100	32	08	40
Foundation	III-11 Foundation Course	4	4	4	80	20	100	32	08	40
	Total	20	20	20	400	100	500	160	40	200
Practical Papers										
Core	III-P09	8	4	8	80	20	100	32	08	40
Core	III-P10	--	2	--	---	50	50	---	20	20
Core	III-P11	--	2	30 Working days	---	50	50	---	20	20
Core	III-P12	4	2	4	---	50	50	---	20	20
	Total	12	10	12	80	170	250	---	68	100
Net Total (Theory & Practical)		32	30	32	480	270	750	192	108	300

MLISc - II (CBCS) Semester IV

Core/ Elective/ Foundation	Theory Paper	Teaching Scheme (Hrs/Week)	Credits	Examination Scheme						
				Duration (Hrs)	Maximum Marks		Total Marks	Minimum Passing Marks		Total
					External TH Marks (University)	Internal Assessment Marks		External TH Marks (University)	Internal Assessment Marks	
Core	IV-12	4	4	4	80	20	100	32	08	40
Core	IV-13	4	4	4	80	20	100	32	08	40
Core	IV-14	4	4	4	80	20	100	32	08	40
Elective	IV-15 Elective Paper	4	4	4	80	20	100	32	08	40
Foundation	IV-16 Foundation Course	4	4	4	80	20	100	32	08	40
	Total	20	20	20	400	100	500	160	40	200
Practical Papers										
Core	IV-P13	8	4	8	80	20	100	32	08	40
Core	IV-P14	8	4+2=6	--	80+50	20	150	32+20	08	58
	Total	16	10	08	210	40	250	84	16	100
Net Total (Theory & Practical)		36	30	28	610	140	750	244	56	300

BLISc (CBS) / MLISc- I (CBCS)
SEMESTER- I

Paper I-01
FOUNDATIONS OF LIBRARY AND INFORMATION SCIENCE

Unit I:

- Library as a Social Institution
- History of Libraries-Origin, Development with special reference to India
- Types of Libraries: Academic Libraries: School, College and University Libraries
- Public Libraries, National Library, Calcutta: Concept, Functions and Services
- Special Libraries and Information Centers: State Central Libraries in Maharashtra
- Recent Trends in Library and Information activities in India

Unit II:

- Normative Principles of Library Science
- Five Laws of Library Science by S. R. Ranganathan and its implication to Library and Information Science
- Postulates and Canons
- Public Relation and Publicity
- Extension Activities and Outreach Services
- Promotional and Consultancy Services

Unit III:

- Library Legislation in India
- Salient Features of Maharashtra Public Library Act 1967
- Press and Registration Act and Delivery of Books and News Papers (Public Libraries) Act and Copy Right Act
- Role of Union and State Governments (Committees & Commissions on Libraries, UGC, RRRLF etc.)
- National Information Policy, India

Unit IV:

- Library Movement with Special Reference of India
- Librarianship as a Profession
- Attributes, Ethics of a Profession
- Philosophy of Librarianship
- Professional Associations: National (ILA, IATLIS) and International (IFLA, ALA, LA)
- Extension Services and Outreach Activities
- Promotional Consultancy Services

Recommended Books for Study

1. Chakraaborty, N.C. Library Movement in India. Delhi, Hindustan.1962.
2. Khanna, J. K. Library and Society. Kurukshetra Research Publication. 1987.
3. Krishna Kumar. Public Library Stem in India. Indian Book Industry 21st 1992.
4. Kumar PSG. Indian Library Chronology,Ed.2. Bombay, Allied Publishers. 2000.
5. Kumar, PSG. Fundamentals of Information Science. Delhi, S. Chand. 1997.
6. Mittal, R.L. Library Administration. Delhi, Metropolita. 1964
7. Nalhe, Umaji. Working and Finance of Aided Public Libraries. ISBN-978-93-82664-38-3; Satyam Publishers & Distributors, Jaipur. (Rajasthan). 2015.
8. Ranganathan S. R.New Education and School Library. Ed.2. Delhi, Vikas.1973.
9. Ranganathan, S.R. Five Laws of Library Science. Madras LibraryAssociation. 1957.
10. Sharma, O.P. History of the Development of University Libraries in India: an appraisal. Indian Librarian. Dec.1964.
11. Sharma, Pandey S. K. Library and Society. Ed. 2 ND. Ess Ess . 1992
12. Subramoni (TS) Public Relations in Libraries (IASLIC Bulletin v31;1986.
13. The National Library (Calcutta). Brochure,1992.
14. Vashisth, C.P. University Libraries in India: a review. Library Herald V 19: 1980.
15. Vyas, S.D. Library and Society. Jaipur. Panchasheel. 1993.

**BLISc (CBS) / MLISc- I (CBCS)
SEMESTER-I**

**Paper I-02
KNOWLEDGE ORGANISATION**

Unit I: Universe of Knowledge and Library Classification

- Knowledge: Concept, Definition, Types
- Universe of Subject: Structure, Attributes and Mode of Formation
- Library Classification: Concept, Definition, Need and Purpose
- Knowledge Classification Vs Book Classification

Unit II: Classification: Foundation And Trends

- Basic Concepts and Terminology
- Canons for three Planes: Idea, Verbal, Notation.
- Schemes of Classification: CC, DDC, UDC, LC.
- Modern Trends in Classification: CRG, BSO, Web Dewey

Unit III: Cataloguing Foundation

- Cataloguing: Concept, Need, Purpose
- Cataloguing Code & Standard: AACR-II
- Canons of Cataloguing
- Types of Entries: Main, Added, Reference, Cross Reference
- Parts of Book

Unit IV: Cataloguing Trends

- Cataloguing of Non Book Material: Traditional & Electronic
- Selected rules in DC & CC
- OPAC, Web OPAC, CCF
- Subject Heading Lists: LC, Sear's

Recommended Books for Study

1. American Library Association Anglo American Cataloguing Rules 1967, North American Text, Chicago:A.L.A., 1967.
2. Bavakutty, M.Conons of Library Classification, Trivandrum: Kerala Library Associations, 1981.
3. Campbell, M. Cataloguing of Non Book Material, U.S.A: University Microfilms, 1965.
4. Chakraborty, A.K. Bibliography: theory and practice, Calcutta; World Press, 1987.
5. Coates, E.J. Subject Catalogue Heading and Structure, London: Library Association, 1961.

6. Dhyani, P. Library Classification, Theory and Principles New Delhi: Vishva Prakashan, 1998.
7. Girija Kumar and Krishan Kumar. Bibliography, New Delhi: Vikas Publications, 1990.
8. Girija Kumar and Krishan Kumar. Cataloguing, New Delhi: Vikas Publications, 1986.
9. Hingve, K.S. Granthalaya Vergikaran, Pune: Suvichar Prakashan, 1974.
10. Horner, J. Cataloguing, London: Association of Assistant Librarian, 1970.
11. Husain, S. Library Classification: Facets and Analysis, New Delhi: Tat McGraw Hill, 1993.
12. Khanna, J.K. Handbook of Library Classification System, New Delhi: Beacon Books, 1997.
13. Krishan Kumar, Theory of Classification, 5th ed. New Delhi: Vikas Publication, 1996.
14. Kumar P.S.G. and Mohammad , Riaz. Cataloguing, New Delhi: Vikas Publications,m 1986.
15. Kumar, P.S.G. Knowledge Organisation, Information Processing and Retrieval. New Delhi. B.R.Publishing House, 2003.
16. Kumar, P.S.G. Practical Guide to DDC 20. Nagpur, Dattasons, 1990.
17. Kumar, P.S.G., Knowledge organization, information processing and Retrieval: Practical paper 3 of UGC Model curriculum. B.R. Publication, New Delhi, 2003.
18. Lihitkar, Shalini, R. and Veranjanallu. Cataloguing: Theory and Practice. B.S. Publication, 2012.Hyderabad.
19. Mahajan, S.G.Granthalayan Talikikaran Prathyakshika. Vol. 1, Pune: Maharashtra Vidyapith Granth Nivedhi Mandal, 1974.
20. Marcella, R.A. New Manual of Classification, Delhi: Jaico Publications, 1997.
21. Pande, S.K.Sharma. POusthakalaya Siddantha. Delhi: Satisahitya Prakashan.
22. Rajyalakshmi, D. Impact of Ranganathan on AACR. Datison Publication, 2004. New Delhi.
23. Ranganathan, S.R. Classification and Communication, Bangalore: Sarada Ranganathan Endowment for Library Science, 1989.
24. Ranganathan, S.R. Classified Catalogue Code, 5th ed. Bombay: Asia Publication House, 1964.
25. Sajita, M.P. Manual of Practical Colon Classification, New Delhi: Sterling Publishers, 1984.
26. Satija, M.P. DDC-20th Edi: Practice.
27. Satija, M.P. Theory and Practice of Subject Headings: The Sears List. Today and Tomorrow's Printers and Publishers, New Delhi, 2011.
28. Satijia, M.P. and Goswami, J.P. Exercises in the 21st edition of DDC, New Delhi: Sterling Pub.Pvt. Ltd, 1998.
29. Sengupta, B,K. Cataloguing: Its Theory and Practice, 3rd ed., Calcutta: Work Press, 1974.
30. Shera, J.H. Classified Catalogue Basic Principles of Practice, Chicago: A.L.A., 1956.
31. Tripathi, S.M. and Showkeen, N.S. Prasuchirkaran Siddantatha Multalva. Agra: .K.Publishers, 1997.
32. Tripathi, S.M. Modern Cataloguing theory and practice, Agra: Shivilal Agrawal, 1969.
33. Vishwanathan, C.G. Cataloguing: Theory and Practice, 6th ed., New Delhi: Today and Tomorrow, 1970.

BLISc (CBS) / MLISc- I (CBCS)
SEMESTER-I

Paper I-03
INFORMATION SOURCES AND SERVICES

Unit I: Information Sources

- Need for Information Sources in Library.
- Sources of Information: Documentary and Non Documentary Information Sources/ Electronic Information Sources.
- Nature, Characteristics of Printed and Electronic Reference books and Criteria for Evaluation of Printed and Electronic Reference Books.

Unit II: Reference Services, User Studies and User Education

- Definition, Need, Nature and scope of Reference Service (Manual and Electronic).
- Types of Reference Service: Ready and long Range Reference Services, Anticipatory, Responsive Service and Electronic Reference Service.
- Steps in Reference Services, Reference Services in Public, Academic and Special Libraries
- Organisation of Reference Department.
- Types of Users, User studies: Purpose and Techniques.
- User education: Objective and Techniques.

Unit III: Information Services

- Information Services: Definition, Concept, Need and Current Trends.
- Types of Abstracts: International and National Abstracting Services.
- Index: Meaning, Types and its use, International and National Indexing services.
- Alerting (CAS and SDI), Bibliographical, Referral, Electronic Document delivery Service and Translation Services.
- Internet as a source of information in Library Services.

Unit IV: Trends in Reference and information Services & Information Centers/ System

- Impact of IT on Reference and Information Services: Databases, E-books and Journals.
- Digital and Virtual Reference Service.
- National Information Centres and systems (NISCAIR, NASSDOC, DESIDOC, NCSI).
- International Information systems (INIS, AGRIS, DEVSIS, MEDLARS).

Recommended Books for Study

1. Bhat, S.G, Pralekhan Parichaya, Nagpur: Maharashtra Rajya Granth Mirmiti Manda, 1977.
2. Bose, H.C. Information Science, Principles and Practices, 2nd ed. Delhi: Sterling, 1993.
3. Chaturvedi, D. Sandarbha Seva Ke Vividha Ayam, Mumbai: Himalaya Publishing house, 1993.
4. Foskett, D.J. Information Service in Libraries, New Delhi: Anmol Publications, 1994
5. Guha, B. Documentation and Information, 2nd ed. Calcutta: World Press, 1983.
6. Katz W.A. Introduction to Reference work. Vol. I and II, 6th Ed. New Delhi: Vikas Pub. House, 1992.
7. Krishna Kumar Reference Service, 5th edition, New Delhi: Vikas Pub. House, 1996.
8. Kumar, P.S.G. Information Sources & Services: Theory & Practice. New Delhi, B.R. Publishers, 2004.
9. Mukherjee, A.K. Reference work and its tool, 3rd ed. Calcutta: World Press, 1975.
10. Ranganathan, S.R. Documentaation, Genesis and Development. New Delhi: Vikas Pub. House, 1975.
11. Ranganathan, S.R. Reference Services, 2nd ed. Banglore: Sarda Rangnathan Endowment for Library Science, 1961 [Reprint (1990)].
12. Sewa Singh. Manual of Reference Service and Sources, New Delhi: B.R. Publishing Corporation, 2004.
13. Sharma, J.S. and Grover, D.R. Reference Service and Sources of information, New Delhi: Ess Ess Publications, 1987.
14. Sharma, S.K. Reference Service, New Delhi: Shree Publications, 2008.
15. Sood, S.P. (ed.) Pralekhan Evam Suchana Vigyan, Jaipur: Raj Publishing House, 1994.
16. Tripathi, S.M. Sandarbha Avam Suchana Seva Ke Navin Ayam (New Dimension of Reference/information services), Agra: Y.K. Publishers, 1993.
17. Varma, S.R. Reference and Information Service, New Delhi: Shree Publications, 2006.
18. Walfard, A.J. (ed.) Concise Guide to Reference Material, London: Library Association, 1981.
19. Kale, K.B. Sandarbha Seva Ani Mahiti Sadhananche Mulyankan (Reference and Evaluation of Information Sources), Nagpur: Vishva Publishers and Distributors, 2010.
20. Kale, K.B. Mahiti Seva Va Sadhane (Information Services and Sources), Nagpur: Vishva Publishers and Distributors, 2010.
21. Bhat, S.G. Electronic Mohiti Sadhane, Nagpur : Pimpalapure Book Dustributor, 2008.

List of Reference Sources for Evaluation

Dictionaries (शब्दकोश)

1. Webster's Third New International dictionary of English Language
2. Oxford English Dictionary
3. The Twenty Century English-Marathi Dictionary
4. Chambers English-Hindi Dictionary
5. मोल्सवर्थ यांचा English-Marathi शब्दकोश
6. The Librarians Glossary of Terms Used in Librarianship, Documentation
7. भारतीय व्यवहार कोश

Encyclopedias (ज्ञानकोश / विश्वकोश)

1. The New Encyclopaedia Britannica
2. Encyclopaedia Americana
3. मराठी विश्वकोश
4. McGraw-Hill Encyclopaedia of Science & Technology
5. International Encyclopaedia of the Social Sciences
6. Encyclopaedia of Library and Information Science

Yearbooks & Almanacs (वार्षिके आणि पंचांग)

1. India 2014 : A Reference Annual
2. Manorama Yearbook.
3. The Statesman's Yearbook.
4. The Europa World Yearbook.
5. World Almanac and Book of Facts

Biographical Sources (जीवन चरित्रात्मक साधने)

1. India who's who
2. The International who's who
3. Who's who of Indian Writers:1999
4. Dictionary of National Biography (by S.P. Sen)

Geographical Sources (भौगोलिक साधने)

1. Britannica World Atlas
2. महाराष्ट्र राज्य गॅझेटिअर: नागपूर जिल्हा
3. महाराष्ट्र पर्यटन कोश
4. India Handbook (Broadnauk, Robert)
5. Gazetteer of India: Indian Union

Directories (निर्देशिका / मार्गदर्शिका)

1. Directories of Libraries in India
2. World of learning.
3. Commonwealth Universities Yearbook: A Directory
4. University Handbook: AIU Publication (INDIA)

Handbook and Manuals (निर्देशग्रंथ व हस्तपुस्तके)

1. Guinness Book of World Record.
2. Limca Book of Record.

Bibliographies (ग्रंथसूची)

1. Indian National Bibliography
2. British National Bibliography
3. Indian Books in Print
4. Books in Print (R.R. Bowker)
5. National Union Catalogue of Scientific Serials (NUCSSI)
6. Ulrich's International Periodicals Directory

Indexing Sources (निर्देशन साधने)

1. Guide to Indian Periodical Literature: Social Sciences and Humanities
2. Index India
3. Current Technology Index

Abstracting Sources (सार साधने)

1. Indian Library Science Abstracts
2. Indian Science Abstracts
3. Chemical Abstracts
4. Biological Abstracts
5. Library and Information Science Abstracts (LISA)
6. Sociological Abstracts

SEMISTER –I

PRACTICE

- I-P 01 Classification Practice (Part I) Marks – 100**
- Classification of Subject using DDC (Latest Edition)
 - Basic Subject and Compound Subject
 - Tables : 1, 2 and 3
 - “Add” Instruction
- I-P 02 Cataloguing Practice (Part I) Marks – 100**
- Cataloguing of Documents using AACR (Latest Edition)
 - Simple, Joint Author, Corporate Author, Composite Books, Pseudonymous
 - Structure of Main entries, Added entries, Reference entries
- I-P 03 Information Technology Basics (Part-I) Marks – 100**
- MS-Office
 - Creation of Purchase Order, Bio-data in Word file
 - Creation of presentation in MS-Power Point
 - Creation of Marksheet, Salary Slips, Accession Register in MS-Excel
 - Creation of Charts
 - Internet Searching
- I-P 0 4 Information Sources (Part – I) Marks – 100**
- Study of various Reference Sources with special reference to India: Dictionaries, Encyclopaedias, Year Books and Directories
 - Evaluation of selected standard Reference Sources
 - Finding information from above standard reference sources
 - List of the sources enclosed

**BLISc (CBS) / MLISc- I (CBCS)
SEMESTER- II**

**Paper II-04
MANAGEMENT OF LIBRARY AND INFORMATION CENTRES**

Unit I: Management of LICs

- Meaning and definitions, Role/functions and principles of management, schools of thoughts in management, levels of management
- Planning: Characteristics Need, Forecasting, Types and Steps
- Organisational structure, Authority and Delegation

Unit II: Library Housekeeping Operations

- Sections of Library and Information Centers, Book Ordering, Acquisition and Technical Processing, Serial Control, Circulation Control, Maintenance, Stock Verification,
- Online Books Shops, Weeding, Conservation and Preservation of Library Resources
- Library Committee, Library Statistics, Library Reports, Library Rules and Regulations
- Building and Space Management in LICs

Unit III: HRM and Financial Management

- Recruitment and Selection, Training and Development, Leadership Styles, Motivation.
- Financial Management: Budgeting Techniques Traditional- PPBS and ZBB
- Sources of Finance and Resource Mobilisation
- Budget and Control – Cost effectiveness and Cost benefit Analysis.

UNIT IV: Trends in Management Techniques

- Trends in Management Techniques-MBO, TQM, SWOT, MIS, Management of Change, Outsourcing.

Recommended Books for Study

1. Evans, E. Management Techniques for Libraries, New York, Academic Press Inc. 1984.
2. Faraqui Khalid, F. (ed). Planning Budget in Libraries, New Delhi: Anmol Publications, 1997.
3. Jain, M.K. Library Manual: A Practical Approach to Management, New Delhi: Shipra Publication, 1996.
4. Kale, K.B. Library Security, Nagpur: Dattason's Publication, 2010.

5. Khan, M.A. The Principles and Practice of Library Science, New Delhi: Sarup & Sons, 1996.
6. Khanna, J.K. Fundamentals of Library Organisation, New Delhi: Ess Ess Publication, 1984.
7. Koontz, H and Weithglic, H. Essentials of Management. 5th ed. New Delhi, Tata McGraw Hill Publishing Co.Ltd., 1998.
8. Krishan Kumar. Library Administration.
9. Krishan Kumar. Library Mannual
10. Krishna Murthy, R. Library Administration & Resources, New Delhi: Common Wealth Publishers, 1997.
11. Kumar, PSG. Management of Libraries and Information Centers, B R Publication, Delhi.
12. Lahiri, R. Management of Libraries Concepts and Practices, New Delhi: Ess Ess Pub. 1996.
13. Mittal, R.L. Library Administration: Theory and Practice, New Delhi: Metropolitan, 1996.
14. Mukherjee, S.K. and Sengupta, B. Library Organisation and Library Administration, 2nd ed. Calcutta: The World Press Private Ltd., 1977.
15. Narayanan, G.J. Library Management and Information of Management. New Delhi, Printice Hall of India, 1991.
16. Nikose, S.M. Aadhunik Granthalaya Vyvasthan (M) Pradyna Publication, Nagpur. 2007.
17. Nikose, S.M. Granthalaya Vyvasthan (M). Pradyna Publication, Nagpur. 2007.
18. Pawar, B.S. and Vyas, S.D. Library Management, New Delhi: B.R. Publishing Corporation, 1986.
19. Ranganathan, S.R. Library Administration. Madras: Asia Publishing House, 1959.
20. Sehgal, R.L. Guide to Library and Information Science, New Delhi: Ess Ess Publications, 1999.

**BLISc (CBS) / MLISc- I (CBCS)
SEMESTER- II**

**Paper II-05
INFORMATION TECHNOLOGY – BASICS**

Unit I: Information Technology

- Information Technology: Definition, Need, Scope and Objectives
- Applications of IT in Libraries and Information Centres
- Introduction to Computers: Historical Development, Generations, Classification and Components, Architecture, Input devices, Output devices, Main Memory, Secondary storage devices

Unit II: Computer Software

- Introduction to System Software and Application Software
- Operating Systems: MS-DOS, MS-Windows, XP, Vista, Windows NT, LINUX, UNIX, etc.
- Programming Languages
- Information Processing: Word Processing, Spreadsheets, Power point Presentation, DBMS
- Algorithms and Flow Charting

Unit III: Fundamentals of Telecommunication

- Fundamentals of Telecommunication – Concepts, Data transmission, Signals, Media, Modes and Devices.
- Computer network: Types, and Topologies.

Unit IV: Introduction to Internet

- Basics of Internet: History and Development
- Web Browsers, Search Engines, Meta Search Engines
- Search Techniques
- Protocols: TCP/IP, FTP, HTTP, E-mail Protocols

Recommended Books for study

1. Arvind Kumar. Ed.(2006). Information technology for all (2 vols.). New Delhi: Anmol
2. Dhiman, A.K.(2003). Basics of Information technology for librarians and Information scientists, Vol.1. New Delhi: ESS ESS.
3. Bansal, S.K.(2005). Information technology and globalisation, New Delhi: A.P.H. Publishing Corporation
4. Curtin, D.P. & others: Information technology: The breaking wave. New Delhi: TMH, Latest Edition
5. Sinha, P.K.(1992). Computer fundamentals: concept, systems and applications. 2nd ed. NewDelhi: BPB Publications, 1992.

BLISc (CBS) / MLISc- I (CBCS)
SEMESTER- II

Paper II-06
RESEARCH METHODS AND STATISTICAL TECHNIQUES

Unit I: Introduction to Research

- Concept, Meaning, Need and purpose of Research, Motivation and objectives of research.
- Types of Research : Basic and Applied Research
- Ethics in Research: Areas of Research in LIS, Role of research in the development of scholarship.

Unit II: Research Methods and Design

- Planning of research- The planning process, review of literature
- Selection of a problem for research-mode of selection, sources of problem, process of identification, criteria of selection.
- Hypothesis- Meaning, types, sources, functions, conceptualization and operationalization
- Designing research proposal
- Literature search-Print, non print and electronic sources
- Research methods- Scientific method, historical method, descriptive, survey and case study method.

Unit III: Research Tools and Statistical Techniques

- Questionnaire, schedule, Interview, Observation,, Library records etc. Primary and secondary data
- Sampling techniques, sample design, sample size, criteria of selecting sample.
- Statistical analysis of data- Mean, Median and Mode, Measures of central tendency.
- Presentation of data-Tabular, Graphic, Bar diagram, Pie chart etc
- Statistical Packages- SPSS, Web based tools etc

Unit IV: Research Report Writing

- Organisation of report, structure, style, contents, Guidelines of research reports.
- Style Manual-Chicago. MCA., APA, .e-citations etc
- Current Travels in LIS research
- Role of computer in Research.

Recommended Books for Study

1. Gorman, G.E. and Clayton, P. Qualitative Research for Information Professionals: A Practical Hand Book.
1. Goswami, M. Research Methodology in Library Science. New Delhi. Common Wealth Publications, 1995.
2. Kothari, C.R. Research Methodology: Methods and Techniques: New Delhi. Wiley Eastern Limited, 1985.
3. Krishan Kumar. Research Methods in Library and Information Science. New Delhi. Har Anand Publications, 1999.
4. Kumar, P.S.G. A Student's Manual of Library and Information Science. New Delhi. B.R.Publishing House, 2002.
5. Nikose, S.M. Granthalaya Aani Mahitishatra Sanshodhan Padhati, Pradnya Publication, Nagpur 2007.
6. Ravichandra Rao I.K. Quantitative Methods for Library and Information Science. New Delhi. Wiley Eastern Limited, 1983.
7. Wilkinson, T.S. and Bhandarkar, P.L. Methodology and Techniques of Social Research. Bombay. Himalaya Publishing House. 1984.

SEMISTER –II

PRACTICE

- II P 05 Classification Practice (Part-II) Marks – 100**
- Classification of subject using DDC (Latest Edition)
 - Complex Subject
 - Tables 4, 5, 6 and 7
 - Assigning Book Number (Using at least one standard Book Numbering System)
- II P 06 Cataloguing Practice (Part-II) Marks – 100**
- Cataloguing of Documents using AACR (Latest Edition)
 - Government Publications, Serial Publications, Collected Work, Series
 - Non-Book Materials: Audio – Video Disks, Microforms, Maps, Atlases, Globes
 - Assigning Subject Heading either by standard Subject Heading Lists or by Chain Procedure
- II P 07 Information Technology Basics (Part-II) Marks – 100**
- Database Creation using at least one DBMS Software
 - Database creation using any Library Automation Software
 - Searching of Bibliographic database, OPAC
 - Creation of Users Database
 - Internet Searching
- II 08 Information Sources (Part II) Marks – 100**
- Study of various reference sources with special reference to India: Bibliographical sources, Geographical sources, Special Reference Sources, Bibliographical Sources
 - Evaluation of selected above standard reference sources
List of sources enclosed in Semester I syllabus

MLISc- II (CBCS)
SEMESTER- III

Paper III-07
INFORMATION AND COMMUNICATION

Unit I: Information Science

- Definition, Genesis, Scope and Objectives
- Growth and Development of Library and Information Science
- Information and Knowledge Society: Genesis, Characteristics and Implication
- Interdisciplinary nature of Information Science

Unit II: Communication of Information

- Information: Nature and Characteristics
- Generation of Information
- Value and Use of Information
- Communication Channels, Models and Barriers

Unit III: Economics of Information

- Information as a Commodity
- Economics of Information
- Information Industry- Generators, Providers and Intermediaries
- Global village

Unit IV: Current Trends in Information and Communication

- Databases: Security and Legality
- Copyright Act, Intellectual Property Right Act, Right to Information Act
- National Information Policy, National Knowledge Commission
- Information Superhighway

Recommended Books for Study

1. Hirwade Anil. Patent Information Sources on Internet, Himalaya Publishing House: Mumbai, 2009.
2. Hirwade M.A. and Anil W. Hirwade. Fundamentals of Intellectual Property Rights. Mumbai, Himalaya Publishing House. 2007. P 92.
3. Kumar P.S.G. Fundamentals of Information Science, New Delhi: S.Chand & Co. 1998.
4. Kumar, P.S.G. Information and Communication. Vol.8: Paper 9 of UGC Model Curriculum, B.R.Publication, New Delhi.2004.
5. Lihitkar, Shalini, R. Information Systems and Networks in India. Today Tomorrow, Printer & Publishers, New Delhi, 2012.
6. Lihitkar, Shalini, R. Libraries and Information centres in Maharashtra. Pimplapure Publication Nagpur, 2012.
7. McGrarry, K.J. The Changing Context of Information: An Introductory Analysis, London: CliveBingley, 1981.

8. Narayana, G.J. Knowledge and Information Perspective and Prospects. Ess Ess Publication, New Delhi.2010.
9. Nikose, S.M. Resource Sharing Through Networking of University Libraries, Pradnya Prakashan, Chandrapur. 2006.
10. Toffer, Alvin. The Power shift: Knowledge wealth and violence at the Edge of the 21st Century, New York: Bantam House, 1991.
11. Vickery, B.c. & Vickery, A. Information Science in Theory and Practice. London: Butterworth, 1987.

**MLISc- II (CBCS)
SEMESTER- III**

Paper III-08

INFORMATION STORAGE, RETRIEVAL AND BIBLIOGRAPHICAL CONTROL

Unit I: Information Storage and Retrieval

- Information Storage and Retrieval: Concept, Objectives and Functions
- Document Description: Concept, Standards and Trends
- Information exchange
- Concept, History and Principles of subject Indexing

Unit II: Indexing models and control devices

- Pre-coordinate Indexing
- Post Co-ordinate Indexing
- Characteristics of Indexing Language
- Vocabulary Control: Concept
- Vocabulary Control Devices: Thesaurus and Subject Heading List

Unit III: Trends in Information Retrieval

- Citation Indexing
- Computer Based Indexing System: KWIC, KWOC etc.
- Search Strategy
- Search Processes:
- Offline and Online Information Retrieval Techniques
- Evolution of Information Retrieval System
- Research in Information Retrieval System

Unit IV: Bibliographic Control

- Bibliographical control: Concept and Need
- National Bibliographical Control
- Universal Bibliographical Control
- Role of UNESCO and IFLA for Bibliographical Control

Recommended Books for Study

1. Atchison, J. Gilchrist: Thesaurus Construction, a practical manual, 1972.
2. Austin D., Precise, A Manual of concept analysis and subject indexing: 2nd ed. 1984.
3. Chowdhary G.C. Introduction to Modern Information Retrieval, London. Facet Publishing, 2009.
4. Dhawan, K.S. Principles of Information Retrieval. New Delhi, Commonwealth Publication, 1997.
5. Ellis, D. New Horizons in Information Retrieval, London: Library Association, 1990.
6. Fosket, A.C. Subject Approaches to Information 5th Ed. London: Clive Bingley, 1996.
7. Ghosh, S.B. and Satpathi, J.N. Subject Indexes: Methods and Techniques.
8. Gopinath, M.A. Preparation of an Index to a Book: Case study Lib.Sci with a slant to Documentation, 1967, Paper E.
9. Kesarwani, S.K. Information Access to contributions from LIS festschrifts published from India. New Delhi, Ess Ess Publication, 2011.
10. Kochen, M et.al., Principles of Information Retrieval, 1974.
11. Kumbhar, Rajendra. Thesaurus of Library and Information Science terms. New Delhi, Ess Ess Publication, 2004.
12. Lancaster, F.W. Indexing and abstracting theory and practice. London, facet Publication, 2009.
13. Lancaster, F.W. Information Retrieval System Characteristics, Testing and Evaluation, New York: John Wiley, 1968.
14. Lancaster, F.W. Vocabulary Control for Information Retrieval, New York: Information Resources Press, 1972.
15. Prashar, R.G. Index and indexing system, New Delhi, Medollian Press, 1990.
16. Sengupta, B. and others. Documentation and Information Retrieval, Calcutta, World Press, 1972.

MLISc- II (CBCS)
SEMESTER- III

Paper III-09

ICT APPLICATIONS IN LIBRARIES AND INFORMATION CENTRES

Unit I: Planning of Library Automation

- Steps in Planning Library automation: Feasibility Study, system analysis, Design, Implementation and Evaluation
- Selection of Hardware and Software
- Human Resource Development For IT Challenges
- Automation of Housekeeping Operations: Acquisition, Cataloguing, Circulation, Serial Control

Unit II: Library Management Software

- CDS/ISIS
- LIBSIS
- SOUL
- Open Source Library Management software: Salient features
 - e-Granthalaya
 - Koha

Unit III: Web Technologies in Libraries and Information Centres

- Library Websites: Contents, Design and Evaluation
- WebOPACs, M-OPACs
- Web 2.0 and Web 3.0: Features and Functions
- Web 2.0 Tools and their applications in Libraries: Weblogs, Podcasts, RSS Feed, Instant Messaging, Wikis, Flickr, Social Networking

Unit IV: Emerging Technologies in Libraries

- Library Security Technology: RFID, Bar Code, Smart Card, 3M Security, CCTV
- Audio and Video Conferencing: Concept, Tools and Techniques
- E-Learning: Concept, Need, Objectives, Tools
- Multimedia applications in libraries
- Cloud Computing: Concept, Need, Objectives, Tools

Recommended Books for Study

1. Ackermann, F and Hartman, K. The Information specialist's guide to searching and Researching on the Internet and the World Wide Web, Chicago: Fitzroy Dearborn Publishers, 1999.
2. Bhatnagar, S.C and Ramani, K.U. Computers and Information Management: A Printers for practicing Managers, New Delhi: Printice Hall of India, 1989.
3. Bradley, P. and Smith, A. World Wide Web: How to design and construct home pages, London: ASLIB, 1996.
4. Chaudhary, C.G. Text Retrieval System in Information Management, New Delhi: New Age Internation, 1996.
5. Hirwade M.A. Websites of Indian Universities: An Evaluation. Mumbai, Himalaya Publishing House. 2006.p.376. (ISBN 818-4886802 & 978-8184886801)
6. Hirwade, M.A. and Anil W. Hirwade. Information Technology: A Practical Manual. Mumbai, Himalaya Publishing House. 2007. P. 164.
7. Kumar, P.S.G. Computerisation of Indian Libraries, New Delhi: B.R. Publishing, 1987.
8. Kumar, P.S.G. Information Technology Application: Theory & practice. Vol-2: paper 13 &14 of UGC model Curriculum. B.R. Publication. New Delhi, 2004.
9. Leon, A and Leon, M. Fundamentals of Information Technology. Chennai, Leon Tech World 1999.
10. Lihitkar, Shalini, R. Information Systems and Networks in India. Today and Tomorrow's printer and publishers, New Delhi.2012.
11. Ravichandra Rao, I.K. Library Automation, New Delhi: Wiley eastern, 1993.
12. Saffady, W. Introduction to Automation for Librarians, 3rd ed. London: American Library Association, 1996.
13. Taxali, R.K. FOXPRO 2.5 Made Simple for DOS and Windows, New Delhi: BPB Publications, 1996.
14. Thomas,R and Yates, J.A. User's guide to the Unix System, 2nd ed. New Delhi: Tata McGraw Hill, 1995.
15. Wadhawa, R.K. Management Information Systems and Corporate Coomunications, New Delhi: Kanishka Publishers, 1998.

**MLISc- II (CBCS)
SEMESTER- III**

**Paper III-10
ELECTIVE- I
AGRICULTURAL INFORMATION SYSTEM**

Unit I: Agricultural Education and Research

- Growth and development of Agricultural Education in India
- Growth and development of Agricultural Research in India
- Role of Libraries in Agricultural Education, Research and Extension
- Development of Agricultural Libraries in India

Unit II: Information Needs

- Information requirement of Agricultural faculty
- Information requirement of Agricultural Research Workers, Farmers Extension Workers
- Study of Local Agricultural Libraries and Preparation of Report
- User Education

Unit III: Information Resource Development, Organization of Sources

- Collection Development
- Sources of Information:
 - Documentary
 - Non-Documentary
 - Electronic Resources
 - Agricultural Databases
- Internet as a source of information
- Organization and Documentary Sources
- Classification
- Cataloguing
- Indexing
- Storage of document

Unit IV: Management Aspects

- Management of Agricultural Libraries and Information centres
- Planning of Library and Information Centres
- Human Resource Development-Staffing, Training and Development
- Professional Skills
- Financial Management- Budgetary Provisions, Resource Generation

Recommended Books for study

1. Alan Chard, J.R. and Farrel, Lois. Guide to Agricultural and Biological Research. Berkeley: University of California, 1981.
2. Banerjee, S.R. and Moitra, S. Agricultural Documentation Services in India. New Delhi: ICAR Library (Unpublished).
3. Deshmukh, P.P. Indian Council of Agricultural Research (Delhi). Agricultural University Libraries on Committee, Find Report, New Delhi: ICAR, 1969.
4. Gupta, S.R. Stock Verification in Libraries; Problems and Solutions. Delhi: Ken Pub, 1990.
5. Kumar, P.S.G. Agricultural Librarianship MLISc Elective paper; K umar's curriculum series in Library & information science 12, 2008 x, 380 B.R. Publication, New Delhi.
6. Lihitkar, Shalini.R. Information Systems & Networks in India. Today& Tomorrow's printer & publishers, New Delhi, 2012.
7. Lihitkar, Shalini, R. Libraries and Information centres in Maharashtra. Pimplapure Publication.Nagpur, 2012.
8. Lilley, G.P. Information Sources in Agriculture and Food Science. London: Butter Worths, 1981.
9. Maharashtra Government of: Report of the Advisory Committee for Establishment of Agricultural University, Maharashtra, November, 1965, Bombay: Govt. of Maharashtra.
10. Ramtirth, Agris. Information System for Agriculture Science and Technology Inperspective in Library and Information Science. 1, 1982. Pp211-214.
11. Rokde, S.M. Agriculture Education and Libraries in India. Masford Publication. New Delhi, 2009.

**MLISc- II (CBCS)
SEMESTER- III**

**Paper III-10
ELECTIVE- II
LEGAL INFORMATION SYSTEM**

Unit I: Law Librarianship

- Growth and development of Legal Institutions in India
- Nature, Principles and characteristics of legal information and law libraries
- Types of Law Libraries
- Legal Information Systems: National and International
- Resource sharing and Networks of Legal Information

Unit II: Information Sources

- Special Information Sources: Bills, Acts, Books, Serials, Law Reports, Law Court Notices, Law Case amendments
- Tribunal Report, Law Digests, Legal judgments, delegated legislation
- Rules and Orders, Legal information Sources and Lexicons
- Legal Databases and Digital Libraries

Unit III: Organization and Management of Resources

- Information Processing: Classification, Cataloguing and Indexing
- Developing Special Skills and Techniques to handle legal information
- Managing Finances: Funds and Fund Generation

Unit IV: Information needs and Services

- Special needs of lawyers and legal professionals
- Information Services to Law students, faculty and Research Scholars
- Preparation of a Report on Law Libraries (Local)
- Dissemination methods and techniques
- Advanced Information Services and Products

Recommended Books for Study

1. Anthony, L.J. Handbook of Special Librarianship and Information Work 5th ed. ASLIB, 1982.
2. Banks, M.A. Using a Law Library. 3rd ed. Agricultural in Court out, carsurth, 1980.
3. Dane, J. and Thomas, P.A. How to use Law Library, Sweet and Maxwell, 1979.
4. Kumar, P.S.G., Law Librarianship MLISc Elective Paper Kumar Curriculum series in LISc-15 B.R. Publisher, New Delhi, 2008.
5. Lihitkar, Shalini,R. Information Systems and Networks in India, Today's & Tomorrow: Printer & Publisher, New Delhi, 2012.
6. Lihitkar, Shalini, R. Libraries and Information centres in Maharashtra. Pimplapure Publication.Nagpur, 2012.
7. Logaw, R.G. Information Sources in Law. Butter Worths, 1986.
8. Miskin, E. Library and Information Services for the legal profession. London: British Library Research & Development Report, 5633, 1981.
9. Moys, E.M. Ed. Manual of Law Librarianship. Ed.2 Wiltshire: Redwood, 1987.
10. Moys, E.N. Ed.Manual of Law Librarianship: the use and organization of legal literature.2nd Ed.Hants, UK: Gower, 1987.

**MLISc- II (CBCS)
SEMESTER- III**

**Paper III-10
ELECTIVE- III**

INDUSTRIAL INFORMATION SYSTEM

Unit I: Industries and Industrial Information

- Types of industries
- Industrialization and growth of industries in India
- Categories of Industrial Organizations
- Industrial Information, Nature and Characteristics, Users and Role
- Industrial Libraries and Information Centres: Characteristics and Roles

Unit II: Information Sources, Management of Industrial Libraries and Information Centres

- Information Resource Development
- Information Sources: Internal and External Sources
- Information Sources specific to Industries: Government Document, Technical Report Literature, Trade Literature, Standards, Patents
- Management Aspects

Unit III: Information Service and Products

- Information requirement of various categories and levels of users, function/activities areas in industries
- Reference, Referral and Document Delivery Services
- Technical enquiry service, Alerting Service, Translation Service
- Development of Information Analysis and Consolidation Products: Reviews, State of the Art Report, Trend Report, Technical Digest
- Information Service to Management: Management briefs, Technical notes, Feasibility Study Reports, Mark of Survey Reports, Company Profiles
- Data Services

Unit IV: Impact of IT, Resource Sharing and Networking, Information Systems and Centres

- Impact of IT: Impact on Collection Development, Industrial Databases, Use of Internet and Digital Resources
- Resource Sharing and Networking, Consortia
- National Information Centres: CSIR and its National Laboratories, NISCAIR, SENDOC, Patent Information System, TIFAC
- Role of International Organizations in Industrial Information: UNIDO, UNDP, OECD, ISO etc.

Recommended Books for Study

1. Anthony, L.J. Handbook of Special Librarianship and Information Work 5th ed. London, ASLIB, 1982.
2. Blakewell, K.Y. Industrial Libraries throughout the World. Oxford, Pergamon Press, 1969.
3. Burkett, Jack. Industrial and Related Information Services in United Kingdom 3rd. London: LA. 1972.
4. DRTC Annual Seminar-17 Industrial Information Systems and Services, Bangalore, Documentation Research and Training Centre, 1979.
5. Gopinath, M.A. and Seetarama, S. Industrial Information Systems and Services, DRTC, Annual Seminar (17), 1979, Bangalore: DRTC, 1979.
6. Houghton, Berhard, Technical Information services. 2nd ed. London, Clive Bingley, 1972.
7. Jackson, E.B. and Jackson, R.L. Industrial Information Systems: A Manual for Higher Management and their information officers/ Librarian Associates. F.Stroudsberg. Dowden G. Huchenson Association and Ross, 1978.
8. Kumar, P.S.G. Business/Industrial Librarianship, New Delhi, B.R.Publishing Corporation, 2008.
9. Library Association Industrial group: Industrial and commercial Library , An Introductory guide. London, Library Association, 1986.
10. Lihitkar, Shalini, R. Libraries and Information centres in Maharashtra. Pimplapure Publication. Nagpur, 2012.
11. Neelameghan, A: Information for small enterprises. Bangalore, Sarda Ranganathan Endowment for Library Science, 1994.
12. Sasikala, C. Industrial Library System, New Delhi, Reliance Publishing House, 1994.
13. Seetharama. S: Planning of Library and Information Centres, Calcutta, IASLIC, 1990.
14. Seetharama. S: Dynamics of Planning and Marketing of Modern Libraries and Information Centres in an Information Technology based environment, Calcutta, IASLIC, 2015.
15. Thakur, D.S. Scientific and Technical Libraries. New Delhi, Ess Ess Publication, 2006.

**MLISc- II (CBCS)
SEMESTER- III**

FOUNDATION COURSE PART-I

Paper III-11

FUNDAMENTALS OF LIBRARY AND INFORMATION SCIENCE

Unit I:

- History of Libraries-Origin, Development with special reference to India
- Educational and Social Functions of Libraries
- Promotion of Reading Habits
- Library & Information Science Education

Unit II:

- Five Laws of Library Science by S R Ranganathan
- Types of Libraries (Academic, Public, Special and National): Characteristics, Sections and Functions
- Professionalism
- Professional Associations

Unit III:

- Library movement with special Reference to India
- Library Legislation with special Reference to Maharashtra Public Libraries Act.
- Public Relations and Extension Activities
- Resource Sharing and Consortia: Concept

Unit IV:

- Library House Keeping Operations
- Selection and Acquisition of Document
- Technical Processing
- Circulation
- Stock Verification and Maintenance
- Annual Report

Recommended Books for Study

1. Agarwal, U.K. Library legislation in India, Jaipur. RBSA, 1999.
2. Iyer, V.K. Public Library System in India, Delhi: Rajat Publications, 1999.
3. Kumar, P.S.G. Foundations of Library and Information Science, vol.1.: paper I of UGC Model Curriculum. B.R. publication, New Delhi, 2003.
4. Kumar, P.S.G. Fundamentals of Library and Information Science, New Delhi: B.R. Publishing House, 2003.
5. Kumar, P.S.G. Indian Library Chronology, 2nd ed. Mumbai: Allied Publishers Ltd., 2000.
6. Malwad N.M.(ed). Digital Libraries; Dynamics Store House of Digital Information, Delhi: New Age International, 1996.
7. Nath, Mahendra. Pushakalaya Aur Samaj, Jaipur: Pointer Publications, 1998.
8. Ranganathan, S.R. Five Laws of Library Science, Reprint ed. Bangalore: Sarada Ranganathan Endowment for Library Science, 1996.
9. Saini, O.P. Granthalaya Avam Samaj, Agra: Y.K.Publishers, 1999.
10. Sehgal, R. Guide to Library and Information Science, New Delhi: Ess Ess Publication, 1999.
11. Tripath, S.M. Granthalay Samaj Avam Granthalaya Vidnyan Ke Panch Sutra, Tatja Proudh Shikshan Mein Granthalaya Ki Bhumika, Agra: Y.K.Publishers, 1999.

SEMESTER-III

PRACTICE

III 09	Information Technology Applications (Part I)	Marks – 100
	<ul style="list-style-type: none">• Information Searching from CD-ROM Databases and Retrieval: LISA – Novice, Advanced and Expert Search• Automated Circulation Systems• Creation of E-mail ID, Sending and receiving mails, File attachments• Internet Searching from websites – Library Networks, Library Consortia, Library Associations, Vidyanidhi, NDLTD, LIS Gateways, Infolibrarian, Information Systems, Digital Libraries, Open Source Software, Plagiarism detecting software, etc.	
III P 10	Survey of Libraries and Information Centres (Educational Tour Report)	Marks – 50
III P 11	Internship	Marks – 50
III P 12	Project Seminar	Marks- 50

MLISc- II (CBCS)
SEMESTER- IV

Paper IV-12
SYSTEM ANALYSIS AND BIBLIOMETRICS

Unit I: System Study

- Concepts, Types of System
- Library as a System
- Computerized Information System
- Automated sub-system of a library
- Planning and Development of Computerized Information System
- Database Management System (DBMS)
- Management Information System (MIS)

Unit II: System Analysis, System Design and Development

- System Analysis
- Role of System Analyst
- Professional skills for System Analyst
- System Development Life Cycle (SDLC)
- Structured System Development
- Methodology for System Development
- Flowcharts

Unit III: Bibliometric Studies

- Definitions, Concepts, Growth and Development of Bibliometrics
- Application of Bibliometrics
- Bibliometric Laws: Bradford's Law, Zipf's Law, Lotka's Law
- Citation Analysis
- Bibliographic Coupling
- Obsolescence of Literature
- Ethics of Citations

Unit V: Futuristic Approaches

- Trends in Bibliometrics
 - Scientometrics
 - Informetrics
 - Cybermetrics
 - Webometrics, Almetrics
- Globalization of Information (Global Villages)
- Information Super highways
- Cyber Laws

Recommended Books for Study

1. Awad, E.M. System Analysis and Design 2nd Ed. New Dwlhi. Goltatia Publications (P) Ltd. 2000.
2. Curtis, G. Business Information Systems: Analysis Design and Practice, London: Wisley Publishing Company, 1990.
3. Gerald, J.F. and Gerald, A.F. Fundamentals of System Analysis: Using Structured Analysis and Design, 3rd ed. New York: John Wiley & Sons, 1987.
4. Hirwade, M.A. and Anil W. Hirwade. Chicago Style Manual. Nagpur, Payal Publication, 2008.
5. Hussain, K.M. and Hussain, D. Information Systems: Analysis, Design and Implementation, New Delhi: Tata McGraw Hill, 1995.
6. Rowley, J. The Basics of System Analysis and Design for Information Managers, London: Clive Bingley, 1990.

MLISc- II (CBCS)
SEMESTER- IV

Paper IV-13
INFORMATION ANALYSIS, REPACKAGING AND CONSOLIDATION

Unit I: Information analysis and Consolidation

- Definition, Concept and Need
- Methods of Information analysis
- Abstracting: Types, Techniques, Standards and Guidelines

Unit II: Packaging, Repackaging and Consolidation

- Content analysis
- Packaging and Repackaging
- Methods of Consolidation: Prerequisites and Steps
- Tools for Consolidation

Unit III: Information Consolidation Products

- Nature, concept and different types Consolidation Products
- Design and development of Information Products
- Tools and Techniques
- Electronic Content Creation
- Marketing of Information services and Products
- Evaluation of Information Products
- Recent Trends in Information analysis Consolidation and Repackaging

Unit IV: Information Agencies and Trends

- Information analysis Centres (IAC): Planning and Management
- Government and Non-Government Information Agencies: NISCAIR, NASSDOC, DESIDOC, SENDOC, PIS etc

Recommended Books for Study

1. Bhat, S. G. Mahiti Prakriya wa Tantrik Lekhan, Nagpur: Pimpalpure Books Distributors, 2014
2. Bhattacharya, G. DRTC Annual Seminar on IA+C: A Review (DRTC Annual Seminar, 18, 1981; Paper IA).
3. Brandreth, M. Specialised Information/Analysis Centres in International Development: Report of a meeting held at Montebellow, Quebec, Canada 4-8, October, 1982. 12DC Manuscript Series. March, 1984.
4. Bryson (J.O.) Effective Library and Information Centre Management, USA Gower Publishing Company, 1980.
5. Chandra, A. and Saxena, P. Style Manual for Writing thesis, Dissertations and papers in Social Science. 1979. Metropolitan Book Co.Pvt. Ltd., Delhi.
6. Chattergee, Amitabh. Elements of Information analysis, Consolidation and Repackaging, Calcutta. Prova Prakashan, 2014.

7. Dinesh, E. and Ramachandran, M. Organisation and set up of an Information Analysis Centers (DRTC Annual Seminar 18, 1981. Paper HB)
8. G.J. Narayana, Library and Information Management, New Delhi. Printice Hall India, Pvt.Ltd. 1991.
9. Gopinath, M.A. Typology of structural relations for Information Analysis and Consolidation Products: Feed Back and Evaluation: A case Study. DRTC Annual Seminar. 18: 1981, paper EA.
10. Kumar P.S.G. Information Analysis, Repackaging Consolidation and Information Retrieval. B.R. Publication Vol.9: Paper X & XI of UGC Model Curriculum, 2004. New Delhi.
11. Metcalfe, J.R. Organisation of information consolidation units: Centralised or Decentralised? Information Analysis and Consolidation: who page (Paper presented at the third meeting of UNISIST working Group on Information Analysis and Consolidation. Kaula Lumpur 12-16 September, 1983.
12. Sarcevic, T. and Wood, J.S. Consolidation of Information: A hand book of evaluation restructuring and repackaging of Scientific Technical Information. 1981. UNESCO, Paris.
13. Seetharama, (S). Costing of Information Systems and Services: Some General Considerations (DRTC Annual Seminar 24, 1990. Paper B).
14. Seetharama, S. (ed) Libraries and information Centres as Profit Marking Institutions, New Delhi,Ess Ess Publication, 1998.
15. Seetharama, S. Evaluation measures in Information Retrieval System IASLIC Conference 1992.Chidamboram.
16. Seetharama, S. Guidelines for Planning of Libraries and Information Centeres, Calcutta, IASLIC,1990.
17. Seetharama, S. Information Consolidation and Repackaging. New Delhi, Ess Ess Publications,1997.
18. Seetharama, S. Information Consolidation and Repackaging: Frame work, Methodology, Planning. New Delhi: Ess Ess Publications, 1997.

**MLISC – II (CBCS)
SEMESTER- IV**

**PAPER IV- 14
MODERN LIBRARIES**

Unit I: Modern Libraries

- Electronic Library: Definitions, Concept, development and Services
- Digital Library: Definitions, Concept, Objectives, Scope, Growth, development and Services
- Virtual Libraries: Definitions, Concept, Objectives, Scope, development and Services

Unit II: Organization of Digital Libraries

- Collection Development
- Image formats, Audio formats
- Storage Media Formats
- Digitization ,Tools and Process
- Equipments: Scanners, Digital Camera
- Intellectual Property Rights issues in Digitization: Copyright Infringement, Fair Use of digital information, Open access and Creative Commons

Unit III: Building Digital Libraries

- Hardware and Software, OCR, Image Editing Software
- Open Source Software: Dspace, Eprint, Greenstone, Fedora
- Metadata: Definition, Types, Creation, Standards
- Preservation Technologies
- Internet Security

Unit IV: Digital Library Initiatives

- Digital Libraries initiatives Worldwide
- Digital Libraries initiatives in India
- Institutional Repositories: Concept, Definitions and Importance, Steps in Creation of Institutional Repository, Institutional Repositories in India
- ETD Repositories: Concept, Definitions, Importance in Research, Initiatives in India and Worldwide

Recommended Books for Study

1. Dwivedi, S.C. Digital Library, Vol1 and 2. New Delhi: Shree Publishers, 2005.
2. Gopal, Krishan. Library Online Cataloguing in Digital way. Delhi:Authors Press, 2000.
3. Kaur, Amritpal. Internet: The Global Digital Library. Delhi: Vista International Publishing, 2010.
4. Lihitkar, S.R. Creation of Institutional Repositories: A Step by Step Approach.. Nagpur: Sai Publication, 2015.
5. Mittal Savita. Digital Library Resources. New Delhi: Ess Ess Publication, 2005.
6. Ojha, D.C. Advance in Library and Information Science. Jodhpur: Scientific Publisher, 2000.
7. Singh, G.K. Principles of Digital Library Development. New Delhi:Shree Publishers, 2004.
8. Singh, Ram Shobhit, ed. Encyclopaedia of Digital Libraries, Vol 1-2. New Delhi: Anmol Publication, 2008.
9. Verma, Kusum. Digital Library and Information Developments. Delhi: Vista International Publishing, 2008.

**MLISc- II (CBCS)
SEMESTER- IV**

**Paper IV-15
ELECTIVE- I**

ARCHIVALS, MUSEUMS AND ARCHEOLOGICAL INFORMATION SYSTEM

Unit I: History and Development

- **Archives:**
 - History and Development of Archives in India
 - Objectives and Functions
 - Types of Archival Centers
- **Museums**
 - History and Development of Museums in India
 - Objectives and Functions
 - Types of Museums

Unit II: Collection, Organization and Management

- Collection of Archival and Museum
- Acquisition, Classification, Cataloguing and Indexing of Archival Material
- Source Material on archives, Manuscripts
- Machine Readable and Microfilming of Archival Records
- Databases and Digitization of Archives
- Building Design, Planning and furniture and fittings

Unit III: Preservation of Archives

- Objectives and Purpose
- Causes of Deterioration
- Environmental Pollution: Physical, Chemical and Atmospheric
- Biological Enemies of materials: Moulds, Fungi, Insects and Rodents

Unit IV: Rehabilitation of Documents

- Cleaning, removal of stains
- Fumigation and Deacidification
- Repair and Restoration Techniques
- Lamination
- Standards for Storage condition

Recommended Books for study

1. Chakrabarti, B and Mahapatra, P.K. Library Collection: Selection and preservation, Calcutta: World Press, 1991.
2. Cook, M. The Management of Information from Archives. Hants, UK: Gower, 1986.
3. Hedson, J.H. The Administration of Archives, New York: Pergamon Press, 1972.
4. Henderson, K.L and Henderson, W.T. Eds: Conserving and preserving Library Materials. Illinois, University Graduate School of Library and Information Science, 1983.
5. Kumar, P.S.G. Archival Librarianship MLISc Elective paper: Kumar's Curriculum series in Library & Information Science 12, 2008, x , 368, 23cm, B.R. Publication, New Delhi.
6. Lihitkar, Shalini, R. Libraries and Information centres in Maharashtra. Pimpri Publication . Nagpur, 2012.
7. Peace, Nancy E Ed: Archival Chains: Managing the Historical Records in the Age of abundance. Lexington. Mass. Lexington Books, 1984.
8. Winger, H.W. Deterioration and Preservation of Library materials, Chicago: University of Chicago Press, 1970.

**MLISc- II (CBCS)
SEMESTER- IV**

**Paper IV-15
ELECTIVE- II
BIOTECHNOLOGY INFORMATION SYSTEM**

Unit I: Biotechnology Growth and Development

- Growth and development of Biotechnology Education in India
- Growth and development of Biotechnology Research in India
- Role of Libraries in Biotechnology Research and extension
- Development of Biotechnology Institutes and their libraries in India
- Biotechnology Information Systems and Networks : Biotechnology and allied Information Systems in India – BTIS: Structure and Organization
- Networking and Resource Sharing in Biotechnology Information Systems

Unit II: Information Sources and Services, Products and Centres in Biotechnology

- Information Sources in Biotechnology:
 - Documentary
 - Non-Documentary
 - Electronic Resources
 - Biotechnology Databases
- Biotechnology Services and Products:
 - Information Services rendered to faculty and research scholars
 - Web based Services
 - Advanced Information Services and Products
- Biotechnology Information Centres
 - National
 - International

Unit III: Organisation and Management of Resources

- Biotechnology Information: Collection, Organization, Processing and Dissemination
- Developing Skills of Personnel
- Managing the finance: Funds, Generation of extra financeaa, Programmes and Projects

Unit IV: Information Needs of the Users and Professional Associations

- Special information needs of Biotechnology faculty
- Special information needs of Biotechnology Research workers
- User studies of Local Biotechnology Research Organizations
- Preparing a report on user needs (survey)
- Professional associations and their Role in Biotechnology

Recommended Books for study

1. Allent Kent. Encyclopaedia of Library and Information Science Vo. Mercel, New York.
2. Annual Report of Biotechnology Information System, 1998.
1. Annual Reports. Department of Biotechnology. Govt. of India, New Delhi.
2. Annual Reports of National Environmental Engineering Research Institute, (NEERI) Nagpur.
3. Biotechnology: Research Development and Demonstration: Thrust Areas. Department of Biotechnology Annual Report 1993-94, Ministry of Science and Technology, Government of India. Department of Biotechnology (2001)
4. Chaturvedi, Sachin. Asian Biotechnology Market. Emerging investment trends. Ag. Biotech. Net, CAB International, Vol. 1. March.
5. Chaturvedi, Sachin . Biosafety policy and implicative in India. Biotechnology and Development Monitor No.30 March, 1997.
6. Directory of Biotechnology Equipments in India, DISC, NEERI, Nagpur, 1997.
7. Dubey, R.C. A Text Book of Biotechnology : New Delhi, S.Chand, 2004. P480.
8. Gangreddiwav, A.P. Information consolidation on Biotechnology, MLISc Project Report, RTM Nagpur University. Supervisor: D.Rajyalakshmi, Co-guide: Mangala Hirwade, 2009.
9. Gilbirt, C.R. Biotech laboratories, Experiments, equipments and institutions . Anmol Publications, New Delhi, 2008. P. 245-295.
10. Jeevan, V.J. bioinformatics Resources on Internet, Library Herald Vo.40, N2, 2002, p271-287.
11. Kedar, A, Rajyalakshmi, C.D., and Gupta , Activities of Distributed Information sub centres of BTIS: An Overview. Proceedings of Environmental Biotechnology Symposium. 28-29 March, 1994, DISC, NEERI, Nagpur.
12. Lihitkar, S. Information Systems and Networks in India Today and Tomorrow Pub. New Delhi, 2012.
13. Lihitkar, Shalini, R. Libraries and Information centres in Maharashtra. Pimplapure Publication . Nagpur, 2012.
14. McGraw Hill Encyclopaedia of Science & Technology.
15. Padole, K. Directory of Biotechnology Educational and Research Institutions in India. MLISc project report, RTM Nagpur University, Supervisor: D.Rajyalakshmi. (2005)
16. Pental, Deepak . Plant molecular biology and biotechnology in India. Plant molecular biology reporter Vol.16, p.93-97.
17. Rajyalakshmi, D, Kedar, A and Gupta, A. Biotechnology Databases and their Access facilities in India. In International Conference BIOCHEM'97. Dean 26-28, Dept. of Biotechnology, Nagpur University, (DISC, NEERI, Nagpur).
18. Sharma, K.H. A study of biotechnology related research institution libraries in Nagpur city. MLISc project report. RTM Nagpur University. Supervisor: Nikose, S.M. (2005).
19. Shewale, J.G. Biotechnology in Healthcare (No.6) National Institute of Science Communication CSRR, Govt. of India. Dissemination of biotechnology of information DBT. 2000 p. 33-37.
20. Sugdev, S.S. Study of Distributed Information sub centres of BTIS. MLISc project report RTM Nagpur University. Supervisor D.G. Kapde.(2005).

**MLISc- II (CBCS)
SEMESTER- IV**

Paper IV-15

ELECTIVE- III

ENGINEERING AND TECHNOLOGICAL LIBRARY AND INFORMATION SYSTEM

Unit I: Engineering and Technological Education and Research

- Growth and development of engineering and technology education and research in India.
- Development of Engineering and Technology Libraries in India
- Role of Engineering and Technology Libraries in India
- Role of Agencies in growth and development of Engineering and Technology Libraries in India

Unit II: Engineering and Technological Sources, Services and Product

- Information Sources : Engineering and Technology
- Documentary and Non-documentary Sources
- Electronic resources : Open Access and Commercial
- Databases : offline and online
- Web based Services
- Information services rendered to faculty and research scholars
- Resource sharing, networks and consortia

Unit III: Organization and Management of Resources

- Organisational Structure
- Collection, Processing and Dissemination
- Managing the finance, sources of finance, budget
- Programmes and Projects
- Developing skills and competency of personnel, responsibility and duties

Unit IV: Information needs of users and Professional Associations

- Information needs of faculty members and students
- User studies of engineering and technology libraries (one report)
- Preparing a report of one engineering and technology libraries
- Professional associations
- Engineering and technological centers
- Information Literacy Programme
- Norms and Standards

Note: Reading list to be provided by the concerned teacher.

MLISC-II (CBCS)
SEMESTER- IV
FOUNDATION COURSE-PART II

Paper IV-16
FUNDAMENTALS OF INFORMATION SCIENCE

Unit I:

Information: Nature, Characteristics and Communication

- Changing role of libraries – From libraries to Information Centers
- Data, Information and Knowledge
- Characteristics, Nature, Value and use of information
- Information as a commodity, Economics of information
- Communication of Information : Channels and Barriers

Unit II:

Information Science

- Library Science, Documentation, Information Science
- Concepts and Scope of Information Science
- Relationship of Information Science with other subjects
- Information Industry

Unit III:

Knowledge Organization, Information Processing and Information Service

- Classification
- Cataloguing

Information Service

- Information Sources – Documentary -Nondocumentary
Primary, Secondary, Tertiary, Electronic Sources
- Reference Service – Nature and kinds
- Information Service – Need, Nature in different types of libraries

Unit IV:

Impact of Information Technology on Library and Information Services

- Impact on House Keeping Operation
- Impact on Information Retrieval – Online, CD Rom Databases
- Use of Internet for Reference and Information Service
- Digital Library
- Virtual Library
- Globalization of Information (Global Village)

Recommended Books for Study

1. Hirwade Anil. Patent Information Sources on Internet, Himalaya Publishing House: Mumbai, 2009.
2. Hirwade M.A. and Anil W. Hirwade. Fundamentals of Intellectual Property Rights. Mumbai, Himalaya Publishing House. 2007. P 92.
3. Kumar P.S.G. Fundamentals of Information Science, New Delhi: S.Chand & Co. 1998.
4. Kumar, P.S.G. Information and Communication. Vol.8: Paper 9 of UGC Model Curriculum, B.R. Publication, New Delhi.2004.
5. Lihitkar, Shalini, R. Information Systems and Networks in India. Today Tomorrow, Printer & Publishers, New Delhi, 2012.
6. Lihitkar, Shalini, R. Libraries and Information centres in Maharashtra. Pimplapure Publication Nagpur, 2012.
7. McGarry, K.J. The Changing Context of Information: An Introductory Analysis, London: Clive Bingley, 1981.
8. Narayana, G.J. Knowledge and Information Perspective and Prospects. Ess Ess Publication, New Delhi.2010.
9. Nikose, S.M. Resource Sharing Through Networking of University Libraries, Pradnya Prakashan, Chandrapur. 2006.
10. Toffer, Alvin. The Power shift: Knowledge wealth and violence at the Edge of the 21st Century, New York: Bantam House, 1991.
11. Vickery, B.c. & Vickery, A. Information Science in Theory and Practice. London: Butterworth, 1987.

SEMISTER –IV

PRACTICE

IV P13 Information Technology Applications (Part II)

Marks – 100

- **Internet Searching from Websites – E-Books, E-Reference Sources, OCLC Database, WebOPAC, DOAJ, DOAR, DLIST, E-Print**
- **Social Networking Sites**
- **Evaluation of Library Webpages**
- **Creation of Weblogs**
- **Hands on Experience on any Digital Library Software**
- **Uploading of data in disciplinary archives**
- **Scanning and digitizing documents**

IV P14 Project Work Report

Marks – 100

VIVA VOCE

Marks – 50
