UNIVERSITY OF KERALA

BACHELOR OF EDUCATION (B.Ed.) DEGREE COURSE

CREDIT AND SEMESTER SYSTEM WITH GRADING

CURRICULUM

(WITH EFFECT FROM THE ACADEMIC YEAR 2013- '14)

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PREFACE

Due to the advent of technological revolution, educational practices have undergone tremendous changes throughout the world. In recent years the pace of change has become very rapid in certain areas and our education system has struggled to implement the changes to keep in pace with the situation. Today, for meeting the challenges in our society a skilled populace with educational excellence is inevitable. Therefore educating a teacher for the global learner must be the main focus of teacher education.

There was growing concern in the University that the teacher education curriculum needs to be reconsidered and redesigned by keeping in mind the 21st century priorities. On such a scenario the BOS took up the task to revise the curriculum to equip the prospective teachers. The senior faculty members in the field of teacher education, members of Faculty of Education and Board of Studies, teacher educators from various institutions and other stakeholders jointly began an attempt to reify the curriculum. The process involved extensive consultation, thoughtful decision making and detailed planning. It provided an opportunity to establish a vibrant vision for teacher preparation. In 21st Century Learning Environment Teachers must be able to support learning communities that enable their students to collaborate, share best practices, and integrate skills into the classroom practices. Teachers should also be able to provide access to quality learning tools, technologies and resources, expanding the learning environment to community and international settings, both face-to-face as well as online. The directions proposed herein envisage a curriculum focused on the competencies which will be necessitated by the 21st century teachers.

The curriculum retains the best practices proposed in the existing curriculum and it incorporates the current educational thinking and latest developments in pedagogical practices. In continuation of the spirit of Problem Based Practicum and Reflective Practices incorporated by the previous revision of the B.Ed. curriculum, the present revision introduces a credit based semester approach in the Teacher Education curriculum at the Under-Graduate level. A significant step in the present edition of the curriculum is the thrust given for Evidence Based Continuous Assessment as per Competency Based Performance Indicators. The performance indicators are to be fixed based on the mental processes that the prospective teacher undergo during the implementation of the curriculum and hence thrust is given for process based classroom procedures in the Teacher Education Colleges. The Grid format of presentation of the syllabus may help the curriculum practitioners in this direction. The curriculum revision exercise took a bold step in the Teacher Education scenario of Kerala through the Introduction of Pedagogic Content Knowledge Analysis (PCKA) in a Techno-Pedagogic Era in lieu of the traditional Pedagogic Analysis.

The present revision represents a process that is both evolutionary and developmental. It is designed to prepare teachers who are capable to cater to the needs of children in the modern world. The introduction of Techno-Pedagogy in the revised curriculum is an exciting opportunity for restoration in the field of teacher education in equipping the next cohort of teachers to meet the challenges of the techno-savvy era. The revised curriculum also incorporates new content and embraces new approaches and methodologies.

It is a fact that a workable curriculum can be successfully transacted only through the co-operation and continued assistance of all the stake holders of the educational institutions. We would like to take this opportunity to thank one and all who were involved directly or indirectly in the process of development of the curriculum, especially to those who guided and monitored the process.

Chairman
Thiruvananthapuram   **Board of Studies in Education (UG)**
27-07-2013   **University of Kerala.**

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1.   **Introduction**

"Teaching is the profession on which all other professions depend. Indeed, everybody who is anybody was enabled to become somebody by a teacher." – Prof. Linda Darling – Hammond.

'The destiny of the country is being shaped in her classrooms' is not rhetoric. This focuses on the crucial role the teaching community is expected to play in making education qualitative. The quality of education is largely determined by the quality of its teachers. Hence considerable thought and attention have been given to teacher education by all societies throughout the world.   Decades ago, developing subject matter competency and pruning teaching skills in a specific subject was the prime objective of teacher training programmes. But with the advent of the technological revolution, educational practices have undergone tremendous   changes in many countries. The teacher of today is not just one who can teach a specific subject, but one who is capable of employing technological tools to transact the content, and teaching not just a local student but even a student residing in the remotest corner of the world with widely varying interests and abilities. In short, educating a teacher for the global learner is a trend that is fast catching on. To ensure quality in a changing scenario, a revision of the current B.Ed. curriculum became imperative. The prime objective was to reify the Curriculum to equip the prospective teachers with the knowledge, skills, attitude, competence and commitment to face the challenges of the 21st century.

2.   **Guiding Principles**

It is a fact that the current B.Ed. curriculum introduced in 2004 had ushered in several changes. The introduction of reflective practices and the semester system are some of its unique contributions. Yet over the years, there had been a growing demand from several quarters for a reification of the curriculum. The meetings of practicing teacher educators and subject specialists, the Conceptualization workshop and the Core Committee meetings have all pointed out several limitations in existing practices. They include, the need to alleviate the burden of an over loaded curriculum, the lack of sufficient practical orientation, the wide gap between theory and practice, the inclusion of obsolete content, a failure to be in touch with the realities existing in schools and failure to meet the requirements of the community. Quite significantly, all these had been addressed and taken into consideration prior to the Creative Workshop for the B.Ed. curriculum design. In fact, this curriculum revision is unprecedented in one respect - the   attempt at bringing together the expertise of several practicing teachers at different stages, in identifying appropriate content and also in choosing popular instructional strategies to transact the curriculum. The National Council for Teacher Education has specified the nature of the B.Ed. curriculum. In addition, several committees at the Regional, State and National levels have made several recommendations to be incorporated. All share the view that the learning environment for the student of 21st century should be one that enables students to collaborate, share best practices, and integrate 21st century skills into classroom practices. The future teachers should be capable of providing access to quality learning tools, technologies and resources leading to an expansion of the learning environment to the community and to an international setting, both face-to-face as well as online.

3.   **Curriculum Vision**

Empowerment of prospective teachers with a value embedded and competency-based teacher education curriculum, to equip them to be professionally competent, adaptable and socially committed to meet the challenges in a knowledge society.

4.   Vision Highlights

The curriculum gives emphasis for:

- Meeting the challenges of education in a knowledge society
- Development of Teacher Competencies
- Development of Professionalism
- Moulding techno-pedagogically competent teachers
- Entrepreneurship in education
- Teacher as a Relationship Manager
- Teacher as a HRD manager
- Evidence based performance assessment
- Health and fitness for future life styles

5.   General Objectives of the B. Ed. course

The curriculum is redesigned to enable the student-teacher to:

1.   Identify and resolve the major social and environmental issues / challenges faced by our pluralistic society and make use of the knowledge in nurturing / equipping the classroom learner to face those challenges.
2.   Acquire various teacher competencies and develop a proper commitment through qualitative multi level strategies and practices.
3.   Develop a proper value system based on the cultural, social, political and moral bases of Indian society.
4.   Develop a teacher-identity required of a professional through theoretical discourses, school / community- based experiences, and reflective practices that continually evaluate the effects of his / her choices and actions.
5.   Understand the central concepts, tools of inquiry, and structures of individual disciplines and develop the ability to provide meaningful learning experiences.
6.   Imbibe knowledge and develop understanding of the various psychological, sociological and philosophical principles and practices in respect of learners of different stages / multi level and develop the ability to facilitate effective learning.
7.   Use knowledge of effective verbal, non-verbal and media-based information and communication technologies in all facets of learning to foster active inquiry, collaboration, and supportive interaction in the classroom.
8.   Conceptualize various formal and informal evidence based performance assessment strategies and develop an ability to evaluate contextually the continuous intellectual, social and physical development of the learner.
9.   Internalize appropriate theoretical and practical inputs in order to render an integrated and holistic understanding about physical fitness, to develop positive attitudes, values, skills and behaviour related to health and physical education and to promote health and fitness for current and future lifestyles among student teachers.

6.   Regulations for the B.Ed. Degree Course

1.   The B. Ed. programme proposed is based on Credit and Semester System with Grading. The curriculum will be introduced in all the Colleges of Teacher Education affiliated to University of Kerala and the Kerala University Colleges of Teacher Education directly run by the University with effect from 2013-2014 admissions.

2.   The course is of one year duration. Semester system is followed in the course. There will be two semesters, Semester I   with 90 working days spread over in 20 weeks and semester II with 110 working days spread over in 22 weeks excluding admissions, University examination and preparatory holidays.

3.   Medium of instruction for the course is English. However, candidates may write the examination in Malayalam also. The Optional papers for 'Languages' shall be written in the language specified in the Question paper.

4.   Admission to the course will be on the basis of the eligibility requirements, rules and regulations for B.Ed. admissions fixed by the Government of Kerala and approved by the University from time to time.

5.   A candidate will be considered to have satisfactory attendance if she / he earns not less than 75% attendance for theory classes and attends fully the practice teaching days. Seven point grade system is followed in rating attendance. Attendance will be noted in letter grades in the mark list. The attendance range and respective grades are as follows: **Gr: A+ (95-100%), Gr: A (90-94%), Gr: B+ (85-89%), Gr: B (80-84%), Gr: C+ (75-79%), Gr: C (70-74%), Gr: D (below 70%).** (For calculating percentage of attendance decimals will be rounded to the nearest whole number)

- Condonation of shortage of attendance shall be as per existing University rules. Candidates with shortage of attendance beyond condonable limit will not be eligible to register for the end semester University examination. In such cases the candidate has to repeat the course by taking re-admission from the University.

-Only candidates who secure the required minimum attendance in the first semester and registered for the First End Semester University Examination is eligible to continue studies in the second semester.

6.   Readmission: - Those candidates who discontinue the course can be given the provision of readmission if otherwise eligible as long as the same scheme exists. If there is a change in the scheme any time later, candidates will have to join the course as a fresh entrant, if otherwise eligible.

7.   Transitory regulations: - Whenever a Course / Scheme of instruction is changed in a particular year, two more examinations immediately following thereafter shall be conducted according to the old syllabus / scheme. Failed candidates or candidates who could not appear for these examinations have to attend classes for the new course, according to the changed Syllabus/regulations.

8.   There shall be a basic unit of 100 students divided into two batches of 50 each for Core Papers and not more than 25 students per teacher educator for Optional papers and other Practical courses of the programme to facilitate participatory teaching and learning (NCTE norms). Hence theoretical discourses of Core papers have to be arranged in classes with a strength of student-teachers not exceeding 50. For Optional and other Practical areas, the class

strength should not exceed 25. This has to be strictly followed for the smooth transaction of the curriculum. All Colleges of Education should follow strictly the academic calendar issued by the University. Proportional weightage has to be given in the Time Table to various components in the programme specified in the curriculum and a copy of the Time Table has to be forwarded to the Registrar at the beginning of the course.

9.   All the programmes/courses carrying credits/grades should be compulsorily attended by all the candidates for the successful completion of the course. Only such candidates are permitted to register for the End Semester University examination.

(i)   Candidates who have completed the requirements of practical work related to theory (CE) and other practical courses of Semester I and registered for the End Semester University examination alone will be allowed entry to Semester II.

(ii)   Practical work related to Core and Optional papers (CE) & other Practical courses (college, school and community based) have to be compulsorily completed by all the student-teachers to be eligible for appearing for the Practical Examinations of Semester II. Candidates who have attended /eligible for presentation to the Practical Examination of the External Practical Board, alone will be permitted to register for Theory Examination.

(iii)   The total number of lessons practiced by each student-teacher during the course is 70, which include Discussion, Demonstration, Criticism lessons, Observation of Video Lessons, ICT enabled lessons, Observation of peer lessons, Video Lessons, lessons prepared during the initial phase of the school visit (i.e. Initiatory School experiences) and Practice Teaching.

(iv)   Redressal of Grievances regarding internal assessment-in order to address the grievance of students, a three member Grievance Redressal Cell have to be constituted at college level with the principal as Chairman, Co-ordinator, a teacher nominated by the college council as member. The college shall nominate a teacher as co-ordinator of internal evaluation.

10.   For a pass in the examination, a candidate should secure a minimum of 50% marks (C+ Grade) in aggregate with a minimum of 40% (C Grade) in each Theory Paper in the External Examination of the University and 50% (C+ Grade) for Practice Teaching in the Second Semester. There is no minimum for CE and other practical courses in both the semesters. Marks/grades for CE and Practical courses have to be given to various categories on the basis of proper guidelines and criteria. Detailed records have to be maintained by institutions in each case.

11.   In case a candidate gets minimum for all papers but fails to get semester minimum, she/he has to re-appear for all papers to secure a pass in that semester.

12.   If a passed candidate wants to improve his/her grade he/she can appear for the theory examination and improve the grades within two years of completion of the course, if the same scheme exists.

13.   A candidate cannot appear for two semesters in two different schemes. In case such a situation arises, the candidate has to cancel the First semester already appeared or studied and has to take re-admission to the First semester in the revised scheme.

14.   For course betterment, candidates have to appear for both the semesters in one go, ie., in one session and higher marks of the two ie., marks before betterment and after betterment whichever is higher is considered. Semester-wise betterment is not allowed and marks before betterment of one semester and marks after betterment of other semester cannot be combined.

15. There will be no Supplementary Examination. Failed candidates have to write/appear for the paper/papers/courses for which they have failed. On securing the separate minimum in those paper/courses the candidate will be declared to have passed the examination provided he/she secures an aggregate of 50% (C+ Grade). Three chances will be given for reappearance.

16. Even if a candidate fails to secure the required minimum marks/grades for a pass in Theory during the 1st semester and has completed the Practical Courses he/she shall be allowed entry in Semester II.

17. If under any circumstances, a candidate fails in Teaching Practice, he/she may be permitted to repeat the Teaching Practice after the completion of Semester II with special permission from the University as long as the same scheme exists. It will be considered as a Second appearance in all respects.

18. There is provision for revaluation and re-admission. Re-admission can be granted by granting college transfers also (as per University orders).

7. Definition of Essential Terms

- **Semester system:** The semester system is a proactive system with programme designed to be completed gradually within a period covering multiples of half an academic year. It is a pattern of the course in which the whole programme is divided into different parts and each part is intended for a specified period of time, called semesters. The B.Ed. programme includes two semesters.

- **Credit**: Credit refers to the unit of value awarded for the successful completion of specific courses, intended to indicate the quality of the course instruction in relation to the total requirements for a course. Credit is a unit of input measured in terms of 'Study Hours'. It represents the number of 'Study Hours' in a particular period of time devoted to various aspects of the teaching-learning process such as attending classes, engaging in assignments, projects, community activities and other Practical Courses required for the course. Here, one credit for the B.Ed. programme is considered equivalent to 12 Study Hours and the mark equivalent to one credit is 10. Students can earn and accumulate credits on the basis of the number and types of tasks they have successfully completed. All the tasks that carry credit are compulsory.

- **Grading:** Grading is the process of applying standardized measurements of varying levels of comprehension within a subject area. Assigning letters for indicating the performance of students in each paper / area by giving due weightage according to the scale adopted. Here Seven Point Scale is suggested for the grading purpose and Indirect Grading shall be used. In Indirect Grading the students are assessed using conventional marking mode and the marks awarded are converted into letter grades as per the weightage assigned. Marks will be converted to respective Grades for whole programmes and courses only and not to each and every component. (e.g. EDU 0I – total marks earned for Theory can be converted to Grade, total marks for CE can be converted to grade etc)

- **Grade Point Average (GPA)**: The means of grades obtained on a number of subjects/tasks for a specified period is the GPA. GPA is calculated by dividing *the sum of the weighted grade points obtained by a student in various subjects in a semester* by *the total number of credits taken by him/her in the semester*. The value shall be rounded off to two decimal places.

- **Cumulative Grade Point Average (CGPA):** CGPA is the value obtained by dividing *the sum of the Credit X GPA for both the semesters* by *the total credits for the entire course*. The value shall be rounded off to two decimal places. CGPA will be converted to letter grades for final results.
- **Core courses:** Indicates the subjects of study under theoretical discourses which are compulsory for all the students undergoing the course (EDU 1 to 3 & 6 to 8)
- **Optional subject**: Indicates the subject which the student-teacher specializes in the course (EDU 04, 05, 09 & 10).
- **CE**: Continuous Evaluation indicates the process of assessing the practical work related to Core and Optional papers prescribed in the curriculum continuously to award marks/grades on the basis of an assessment criteria. The total marks of CE for each paper should be the sum of marks for various tasks specified in the paper.
- **Reflective Journal:** A student-teacher generated locally standardized daily log book maintained under the supervision of the mentors is visualized as a Reflective Journal (RJ). The RJ can act as a document that carries an analytical account of the daily experiences of Student-Teachers during practice-Teaching. The major purpose of the Reflective Journal is Reflection on-Action. During Practice-Teaching the RJ depicts how different aspects of teaching are interconnected. Analysis and comments on the theory-practical integration, the nature and extend of support-system utilization, process analysis of success and failure management, inference and projection of future course of correction and developmental actions etc. can function as elements in the design of the Reflective Journal.

8. Course Framework

Semester	Working days	Working Hours/Credits	Marks			Total Marks
			Theory	Practical	Total	
I	90	540/ 45	350	100	450	1100
II	110	660/55+10*=65	350	300	650	

*additional credits for practical work during extra hours

9. Structure of B.Ed. Course

A. Theoretical Discourses			B. Practical Courses		
Subjects	Codes-Sem. I	Codes-Sem. II	Practical	Codes-Sem. I	Codes-Sem. II
Core Subjects	EDU 01 EDU 02 EDU 03	EDU 06 EDU 07 EDU 08	1. College based 2. School based 3. Community based	EDU 101 EDU 102 EDU 103	EDU 201 EDU 202 EDU 203
Optional Subjects	EDU 04 EDU 05	EDU 0 9 EDU 10			

10.   Course Pattern

Semester	Code	Papers	Credits		Total Credits
			Theory	**CE**	
Sem. I	**EDU 01**	Core paper I	5 credits	2 credits	7 credits
	EDU 02	Core paper II	5 credits	2 credits	7 credits
	EDU 03	Core paper III	5 credits	2 credits	7 credits
	EDU 04.1-04.13	Optional I	5 credits	2 credits	7 credits
	EDU 05.1-05.13	Optional II	5 credits	2 credits	7 credits
	Practical Courses	College Based (EDU 101) School Based (EDU 102) Community Based (EDU 103)	7 credits 2 credits 1 credit		10 credits
	Total		**25 credits**	**20 credits**	**45 credits**
Sem. II	**EDU 06**	Core paper IV	5 credits	2 credits	7 credits
	EDU 07	Core paper V	5 credits	2 credits	7 credits
	EDU 08	Core paper VI	5 credits	2 credits	7credits
	EDU 09.1-09.13	Optional I	5 credits	2 credits	7 credits
	EDU10.1-10.13	Optional II	5 credits	2 credits	7credits
	Practical Courses	College Based (EDU201) School Based (EDU202) Community Based (EDU203)	4 credits 23 credits 3 credits		30credits (including10 additional credits)
	Total		25 credits	40 credits	**65 credits**
	Grand total				**110 credits**

11.   A. Details of Theory Courses -- Semester I

Code	Title	Instructional hours/credits	Related Practical work-Hours/credits
EDU 01	Philosophical and Sociological Perspectives of Education	60 hrs/5 credits	24 hrs/2 credits
EDU02	Psychology of Development and Learning	60 hrs/5 credits	24 hrs/2 credits
EDU 03	Technology, Assessment and Evaluation in Education	60 hrs/5 credits	24 hrs/2 credits
EDU 04.1	Theoretical Base of Malayalam Education-I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.2	Theoretical Base of English Education -I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.3	Theoretical Base of Hindi Education-I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.4	Theoretical Base of Sanskrit Education-I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.5	Theoretical Base of Arabic Education -I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.6	Theoretical Base of Tamil Education -I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.7	Theoretical Base of Mathematics Education -I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.8	Theoretical Base of Physical Science Education -I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.9	Theoretical Base of Natural Science Education-I	60 hrs/5 credits	24 hrs/2 credits
EDU04.10	Theoretical Base of Social Science Education - I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.11	Theoretical Base of Geography Education – I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.12	Theoretical Base of Commerce Education – I	60 hrs/5 credits	24 hrs/2 credits
EDU 04.13	Theoretical Base of Home Science Education – I	60 hrs/5 credits	24 hrs/2 credits
EDU 05.1	Pedagogic Content Knowledge Analysis-Malayalam	60 hrs/5 credits	24 hrs/2 credits
EDU 05.2	Pedagogic Content Knowledge Analysis-English	60 hrs/5 credits	24 hrs/2 credits
EDU 05.3	Pedagogic Content Knowledge Analysis-Hindi	60 hrs/5 credits	24 hrs/2 credits
EDU 05.4	Pedagogic Content Knowledge Analysis-Sanskrit	60 hrs/5 credits	24 hrs/2 credits
EDU 05.5	Pedagogic Content Knowledge Analysis-Arabic	60 hrs/5 credits	24 hrs/2 credits
EDU 05.6	Pedagogic Content Knowledge Analysis-Tamil	60 hrs/5 credits	24 hrs/2 credits
EDU 05.7	Pedagogic Content Knowledge Analysis-Mathematics	60 hrs/5 credits	24 hrs/2 credits
EDU 05.8	Pedagogic Content Knowledge Analysis-Physical Science	60 hrs/5 credits	24 hrs/2 credits
EDU 05.9	Pedagogic Content Knowledge Analysis-Natural Science	60 hrs/5 credits	24 hrs/2 credits
EDU 05.10	Pedagogic Content Knowledge Analysis-Social Science	60 hrs/5 credits	24 hrs/2 credits
EDU 05.11	Pedagogic Content Knowledge Analysis-Geography	60 hrs/5 credits	24 hrs/2 credits
EDU 05.12	Pedagogic Content Knowledge Analysis-Commerce	60 hrs/5 credits	24 hrs/2 credits
EDU 05.13	Pedagogic Content Knowledge Analysis-Home Science	60 hrs/5 credits	24 hrs/2 credits

12.   A. Details of Theory Courses - Semester II

Code	Title	Instructional hours/credits	Related Practical work Hours/credits
EDU 06	Education in Indian Society	60 hrs/5 credits	24 hrs/2 credits
EDU 07	Learner in the Educational Perspective	60 hrs/5 credits	24 hrs/2 credits
EDU 08	Management of Education	60 hrs/5 credits	24 hrs/2 credits
EDU 09.1	Theoretical Base of Malayalam Education-II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.2	Theoretical Base of English Education –II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.3	Theoretical Base of Hindi Education-II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.4	Theoretical Base of Sanskrit Education– II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.5	Theoretical Base of Arabic Education – II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.6	Theoretical Base of Tamil Education – II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.7	Theoretical Base of Mathematics Education – II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.8	Theoretical Base of Physical Science Education –II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.9	Theoretical Base of Nat. Science Education-II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.10	Theoretical Base of Social Science Education – II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.11	Theoretical Base of Geography Education – II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.12	Theoretical Base of Commerce Education – II	60 hrs/5 credits	24 hrs/2 credits
EDU 09.13	Theoretical Base of Home Science Education – II	60 hrs/5 credits	24 hrs/2 credits
EDU10.1	Techno-Pedagogic Content Knowledge Analysis-Malayalam	60 hrs/5 credits	24 hrs/2 credits
EDU10.2	Techno-Pedagogic Content Knowledge Analysis-English	60 hrs/5 credits	24 hrs/2 credits
EDU10.3	Techno-Pedagogic Content Knowledge Analysis-Hindi	60 hrs/5 credits	24 hrs/2 credits
EDU10.4	Techno-Pedagogic Content Knowledge Analysis-Sanskrit	60 hrs/5 credits	24 hrs/2 credits
EDU10.5	Techno-Pedagogic Content Knowledge Analysis-Arabic	60 hrs/5 credits	24 hrs/2 credits
EDU10.6	Techno-Pedagogic Content Knowledge Analysis-Tamil	60 hrs/5 credits	24 hrs/2 credits
EDU10.7	Techno-Pedagogic Content Knowledge Analysis-Mathematics	60 hrs/5 credits	24 hrs/2 credits
EDU10.8	Techno-Pedagogic Content Knowledge Analysis-Physical Science	60 hrs/5 credits	24 hrs/2 credits
EDU10.9	Techno-Pedagogic Content Knowledge Analysis-Natural Science	60 hrs/5 credits	24 hrs/2 credits
EDU10.10	Techno-Pedagogic Content Knowledge Analysis-Social Science	60 hrs/5 credits	24 hrs/2 credits
EDU10.11	Techno-Pedagogic Content Knowledge Analysis-Geography	60 hrs/5 credits	24 hrs/2 credits
EDU10.12	Techno-Pedagogic Content Knowledge Analysis-Commerce	60 hrs/5 credits	24 hrs/2 credits
EDU10.13	Techno-Pedagogic Content Knowledge Analysis-Home Science	60 hrs/5 credits	24 hrs/2 credits

13.   Weightage to Subject/Area

Code	Subject/Area	Credits	Marks	Weightage
EDU 01, 02, 03, 06, 07, 08.	Core papers	42	420	38 %
EDU 04, 05, 09, 10, 101, 102, 201, 202.	Optional, related practical works & practice teaching	58	580	53 %
EDU 101, 201, 202	Physical Education & Practical	6	60	5.6%
EDU 103, 203	Community activities	4	40	3.4 %

14.   Course Pattern Semester - I

Total Marks - 450

Total Working Days- 90, (540 working hours = 45 Credits) & (1 credit=12 hours)

A.   THEORY COURSES – Max marks – 350   (Total Credits – 35)

SUB.CODE	TITLE	Theoretical discourses			Related Practical Work (CE)			Total Marks
CODE	CORE PAPERS	Hours	Credits	Marks	Hours	Credit	Marks	
EDU 0 1	Core paper I	60	5	50	24	2	20	70
EDU 02	Core paper II	60	5	50	24	2	20	70
EDU 03	Core paper III	60	5	50	24	2	20	70
	OPTIONALS							
EDU 04.1-4.13	Methodology I	60	5	50	24	2	20	70
EDU 05.1-5.13	Pedagogy I	60	5	50	24	2	20	70
TOTAL		300	25	250	120	10	100	350

Details of Practical Work related to Core & Optional Papers – CE

(Internal evaluation only) - 2 credits each (EDU 01 to 05)

Title	Tasks to be initiated	Time allotted/credits	Marks
Internal Tests @	2 Nos		10 marks
Practicum-Problem based study #	1 No	2 credits 24 hours	5 marks
Seminar/presentation	1 No		5 marks

@ Internal tests-one test with multiple choice items alone.

systematic study of problems from subject areas through collection of information from different sources –one Practicum in each subject - Records/short reports not exceeding 5 to 6 pages have to be maintained.

Note: The total marks/grades for CE in each paper should be the sum of marks awarded to the tasks mentioned above.

B.   Details of Practical Courses - Semester - I   Maximum marks – 100
        EDU 101-College based

a)   Optional Subjects (4 Credits)

Title	Task to be carried out	Marks (Internal evaluation only)	Time allotted
Discussion Lessons	10 lessons out of which 3 based on Models of Teaching	5 marks	
Observation of model Video lessons & reporting	Total 2 (Teacher monitored)	5 marks	
Demonstration Lessons	Total 5	5 marks	
Micro Teaching	One skill to be practiced by each student	5 marks	48 hours
Criticism Lessons (can be practiced with school students/peers)	10 lessons out of which 3 based on Models of Teaching	10 marks	
Computer/ICT enabled lesson preparation	Total 1- As Group work	5 marks	
Development of Script for video lesson & video recording	Total 1 – As Group work	5 marks	

(b)   Health and Physical Education (3 Credits)

Task to be carried out	Marks (Internal evaluation only)	Time allotted
Preparation of Personal Health chart	5 marks	
Preparation of a P E Record	10 marks	
Participation in sports - 5 marks Participation in games - 5 marks Winning of prizes - 5 marks	15 marks	36 hours

EDU 102-School Based Practical (2 Credits)

Title	Task to be carried out	Marks	Time allotted
Initiatory School Experiences (school visit and reporting)	School induction for 4 days with 3 periods Teaching/Shared Practice. (Teaching – 15 marks, Diary – 5 marks)	20 marks	4 days

EDU 103-Community Based Practical (1 Credit)

Title	Task to be initiated	Marks
SUPW	**Service & Products (one each)**	**10 marks**

Guidelines for Practical Courses – Semester I

EDU 101 – (7 Credits)

1. Number of Discussion Lessons required is 10 out of which 3 lessons will be based on Models of teaching. The different categories of lessons included in this section should follow a conceptual sequence so that student teachers are able to write lesson notes on their own, when the discussion session is complete.

2. Two Video Lessons of teacher educators/experts have to be observed by student-teachers individually or in small groups and their observation notes have to be prepared.

3. Five Demonstration Lessons of different categories (guided inquiry, discovery, projects, modules, small group activity, multi-media etc. and Skill specific for Language based Optional) are essential.

4. Under Microteaching, each student-teacher has to practice at least one skill with video recording and lesson notes.

5. All student-teachers should practice one Criticism Lesson each and record 10 Criticism Lessons taken by peers, out of which three should be based on Models of Teaching. Criticism classes can be conveniently arranged with students of lab school/peers.

6. One computer/ICT enabled lesson has to be prepared and video recorded as Group Work (3 to 4 students).

7. Script for one video lesson has to be prepared as a Group Work (3 to 4 students).

8. Health and Physical Education – Student-teachers have to prepare a Health Chart, a Record on Physical Education and participate regularly in sports and games. Teacher educator in charge of Physical Education (PE) should maintain a record of student-teacher participation.

EDU 102 – (2 Credits)

The sole purpose of Initiatory school experience is to provide the student-teacher an opportunity to have primary experiences with the functioning of the school. This school attachment programme is for a period of four continuous working days, giving them an opportunity to acquaint with the school environment and the day-to-day functioning. Observation of lessons of senior teachers individually or in small groups, meeting the students informally to learn their background and their interest in learning, to see the learning facilities in the school, observing the social climate in the school, etc., are some of the activities to be undertaken during this period. Each student-teacher has to engage 3 lessons individually or as Shared Practice. In Shared Practice, student-teachers will be in small groups of three members. The lessons will be divided into three parts and each student teacher will practice one of the parts by rotation in the natural classroom situation. Lesson plans need not be written with the rigidity employed for Practice Teaching lesson. The student-teachers have to maintain a detailed diary as record of the visit.

After the initiatory school experiences, a reflection session should be organized in the college. Assessment of student-teacher performance during this period will be done jointly and conveniently by the General and Optional teachers. Institutions can depute either the Optional teacher or the General teacher for organizing and assessment of school initiatory experiences.

EDU 103 – 1 Credit

The objective of this programme include planning and executing productive work, develop social sensitivity, seek support from the locality, sensitize with dignity of labour, etc. This Community based practical - Socially Useful Productive Work (SUPW) has to be organized by the college at their convenience in the specified time. The task include one service (Participation in social activities, social services, social projects, social work etc) and submission of one product (e.g. - book binding, craft/art work, soap making, agarbathi, paper bag, designing and making electronic devices, candle making, film making, pot making, embroidery, improvisation,…..) Assessment has to be made on the basis of the Performa for assessment designed by the institution.

Note: Practical work related to Core and Optional papers (CE) & other Practical Courses (college, school and community based) have to be compulsorily attended by all the student-teachers to be eligible for appearing for the Semester I University Examination. All the Practicals during Semester- I will be assessed by teacher educators internally. Records/reports/products related to CE and Practical courses have to be prepared and maintained and have to be made available for assessment, if demanded. Marks and respective grades of assessment have to be forwarded to the University before the last working day of the semester.

15.   **Course Pattern Semester - II**

Total Marks – 650

Total Working Days-110, 660 working hours= 65 (55+10*) Credits,
(1 Credit=12 hours)

A.   **THEORY COURSES – Max. marks – 350   (Total credits – 35)**

SUB.CODE	TITLE	Theoretical discourses			Related Practical Work (CE)			Total Marks
CODE	CORE PAPERS	Hours	Credits	Marks	Hours	Credit	Marks	
EDU 06	Core paper IV	60	5	50	24	2	20	70
EDU 07	Core paper V	60	5	50	24	2	20	70
EDU 08	Core paper VI	60	5	50	24	2	20	70
	OPTIONALS							
EDU 09.1-09.13	Methodology II	60	5	50	24	2	20	70
EDU 10.1-10.13	Pedagogy II	60	5	50	24	2	20	70
TOTAL		300	25	250	120	10	100	350

*   **indicates additional credits**

Details of practical work related to Core & Optional papers – CE

2 Credits each (EDU 06 to 10)

Title	Tasks to be initiated	Time allotted /credits	Marks
Internal Tests	Total 1		5 marks
Practicum - Problem based study #	Total 1		5 marks
EDU 06,07 & 08 - Field Work (school based practical)* EDU 09 – Preparation and uploading of teaching manual ** EDU 10 – Preparation and uploading of Power Point slides-***	1each Total 1 Total 1	2 credits 24 hours	10 marks

systematic study of problems from subject areas through collection of information from different sources –one Practicum in each subject-Records/short reports have to be maintained.

* Undertaking a field work/investigation on a topic related to the subject area to be completed during practice-teaching. Records/short reports about 10 pages have to be prepared.

** Each student teacher has to upload in her/his blog a self-designed innovative lesson segment on a single concept in the optional subject concerned.

*** Prepare and upload a Power Point on a single concept with minimum of five slides

B.   PRACTICAL COURSES

EDU 201 College based	**201.1 - Optional**	**2 credits***	**20 marks**
	201.2 - Health Education (1 addl. credit *)	2 credits	20 marks
EDU 202 School based	202.1 – Optional	22 credits	220 marks
	202.2 - Health Education	1 credit	10 marks
EDU 203 Community based	203.1 - Community Living Camp	2 credits	20 marks
	203.2 - Study Tour	1 credit	10 marks
Total		**30 credits**	**300 marks**

Details of Practical Courses - II Semester

EDU 201 - College based-

EDU 201.1 - Optional Subjects (2 * Credits)

Title	Tasks to be carried out	Marks	Time allotted
Online assignments	Submission of online assignment – Total 1	10 marks	24 hours
Innovative work	Presentation of an innovative work in the Optional Subject	10 marks	

EDU 201.2 - Health and Physical Education (2 Credits) (1 + 1*)

Title	Tasks to be carried out	Marks	Time allotted
Health Education	Internal test (total 1)	10 marks	24 hours
	Preparation of Health Education Record	10 marks	

EDU 202 - School Based Practical (23 credits)

	Tasks to be carried out	Marks	Time allotted
EDU 202.1 optional subject	Teaching Practice for Optional Subject – 40 lessons (Marks : Lesson Record-40, Peer Review Record-10, Teaching-130 : (Marks allotted to : Optional Teacher-100& General Teacher-30)	180 (18 credits)	36 working days (216 hours)
	Preparation of Diagnostic Test and Remedial measures	10 (1 credit *)	
	Preparation of Achievement test, statistical analysis and interpretation	20(2 credits *)	
	Reflective Journal	10 (1 credit *)	
EDU 202.2 Physical & Health Education	Teaching of PE & HE classes – Total 2.	10 (1 credit)	

EDU 203 - Community Based Practical (3 Credits)

Title	Tasks to be initiated	Marks
203.1 - Community Living Camp	Four days Residential camp	20 marks (2 credits *)
203.2 - Study Tour	Educational trip to a location of educational/historical importance	10 mark (1 credit *)

Guidelines for Practical Courses – Semester - II

Online assignment: One online assignment has to be submitted in the concerned Optional Subject on a selected topic as per the directions of the teacher educator. The assignment has to be forwarded by e mail of the teacher educator concerned.

One innovative work on a selected theme / teaching aid has to be submitted as a requirement of Optional Subject.

Practical Record has to be maintained for teaching Physical and Health Education during Practice-Teaching. Record of Health Education also has to be maintained.

Practice Teaching: - Practicing the process of teaching and participating in the school activities in a selected lab school under the direct supervision of the teacher educators and subject teachers of the school. Practice Teaching for Semester II may be arranged as a single block programme for a duration of 36 working days. Student-teachers have to complete 40 Practice Lessons spread over in standards VI to XII in the Secondary and Higher Secondary Schools (Kerala State/CBSE/ICSE/ISC scheme) in the concerned Optional Subject and 2 lessons for Health & Physical Education during this period. Graduate students can be assigned standards VI to X and for post graduates from VI to XII. Only those students having Post Graduate degree in the concerned Optional Subject are permitted to undergo Practice Teaching at Higher Secondary School level. Lesson plans/Records have to be maintained by all student-teachers. Preparation of Achievement Test, Reflective Journal, and Field work (school based practical) for Core subjects have to be undertaken during the period of Practice Teaching. The scores of the Achievement test should be analyzed quantitatively and qualitatively employing necessary Statistical measures. All student-teachers have to observe at least 20 lessons of peers and record the observations in the Peer Review Record.

Objectives of Practice Teaching:

To learn to set realistic goals in terms of learning, curricular content, and pedagogic practices.

To choose, design, organize and conduct meaningful classroom activities.

To participate in school activities

To develop and maintain teaching-learning resources

Supervision of Practice Teaching: - The supervision of Practice Teaching is a joint responsibility of the Training Colleges and Practice-Teaching Schools. Continuous observation and briefing is essential for developing the teaching skill of the novice teacher. The subject teachers have to observe all the lessons of student-teachers and enter their suggestions in the supervision diary maintained by the student-teacher. The Teacher Educators have to observe the maximum number of practice lessons of the student-teacher. Observation of five lessons (probably at the beginning, middle and at the end of Practice Teaching) by the Optional teacher and one lesson by the General teacher is mandatory. The Principals of Training Colleges have to visit the practicing schools, observe lessons and monitor Practice Teaching. Assessment of Practice Teaching will be done on the basis of the proforma for assessment of teaching (see appendix). Assessment of Practice Teaching will be done jointly by the General and Optional Teachers. The division of marks for various categories is as follows.

Assessment of Practice Teaching:

Division of marks:

Optional teacher   -   100

General teacher   -   30

Record of Practice-Teaching   -   40

Peer Review Record   -   10

Total Marks   -   180

Lesson Template Format

The prescribed lesson template consists of two columns viz, **Classroom Interaction Procedure** and **Expected Pupil Responses**. Each lesson template should have a composition of items like *Curricular statements, Learning outcomes, Content Analysis, Pre-requisites, Teaching-Learning Resources, Formative Evaluation Procedures including Review and Follow-up activities.*

Community Living Camp: - All the colleges have to organize a four-day residential Community Living Camp/Citizenship Training Camp in a convenient location of their choice. It is a joint camp of Student- Teachers and their Teacher Educators in a convenient location, keeping certain formalities and following a pre/well planned time table. Learning to live together co-operatively, participation in programmes for development of personal and social skills, practicing democratic living, providing chances for division of labour, community work etc., are the major outcomes expected of the programme. A record mentioning all the activities have to be prepared and submitted by each Student-Teacher. Community Living Camp can be organized by the institution at their convenience in a convenient location either during Semester II or during holidays after the Semester I University examinations, but will be credited with Semester II. Assessment of participation in Community Living Camp has to be done on the basis of the **Tentative camp schedule and Assessment Schedule appended.**

Organization of the camp

Select a main theme related to Education, Society, Culture and Environment for each year by each institution for the Community Camp. Objectives should be framed on the basis of the theme and prepare a module for the camp. The common objectives of the camp should:

- To promote social accommodation and broaden the mental abilities of the student-teachers
- To promote the democratic nature and involvement of the student-teacher in planning and implementing educational activities
- To develop critical thinking about the issues related to the policies/approaches in Education
- To inquire in to the cultural, social, scientific, educational and environmental aspects of a community
- To develop an interest to train the body and mind for a well balanced personality

Themes for a CL camp (list inconclusive-decide the theme to suit the location)
- Education and Social Change
- Education-its creative and social aspects
- Nature, Agriculture, Culture and Education
- Education and Development ……..

Programmes suggested for community living camp: Social and educational Surveys, visit to social institutions to study their functioning, undertaking community productive work, campus cleaning/beautification/agriculture, undertaking duties in the camp including preparation/serving of food, attending classes/seminars/etc, participation in games and recreational activities, mock Parliament activities etc.

Study Tour: It is an exposure trip to a place of educational or historical importance. The expected outcome includes providing situations for the student-teachers to learn and get acquainted with the process of organizing /conducting a study tour/field work and understanding the environment around. A Report of tour has to be prepared by all student-teachers. The report should highlight the objectives of the tour, identification of the spot, detailed plan, execution of the plan, benefits derived from the tour, problems faced and suggestions. The Study tour can be organized by the institution at their convenience as a general programme/Optional requirement, for a duration not exceeding 5 working days, and will be counted as an activity of Semester II.

There will be both internal and external assessment of Practical Work related to Theory papers (CE) and other Practical Courses of Semester II.

16.   ASSESSMENT

The academic growth of the student-teacher is assessed using various assessment devices. For the theory courses, the proficiency of the student-teacher is evaluated through continuous evaluation of the candidates' progress and through the end semester examination. To make continuous evaluation transparent, student-teachers should be made aware of the modus operandi of the evaluation process and the assessment criteria. The level of performance of the student-teachers is to be published periodically. The internal marks (CE) of the Theory Courses (both Core and Optional papers) and Practical Courses of Semester I, signed by the candidate shall be submitted to the University before the end of the semester. During Second Semester the same has to be handed over to the Chairman, External Practical Board at the time of Practical examination.

Practical Courses viz., School, College and Community-based Practical will be subjected to internal assessment through continuous evaluation during Semester I and through internal and external assessment during Semester II.

Tools for Assessment:-For assessing student performance, Criteria / Proforma based on rubrics have to be developed for each task by the Teacher Educators to make assessment objective. A *rubric* is an explicit set of criteria used for assessing a particular type of work or performance. A rubric is a guideline for rating student performance. A rubric usually includes levels of potential achievement for each criterion, and sometimes also includes work or performance samples that typify each of those levels. Levels of achievement are often given numerical scores. A summary score for the work being assessed may be produced by adding the scores for each criterion. Rubrics are typically displayed in list or grid form. Within the rubric a series of criteria and traits are listed, usually followed by a Rating Scale.

Modes of Assessment Semester I & II

A.   Theory: (50 marks each)-Theoretical discourses of Core and Optional papers for semester I & II will be assessed externally through end semester examinations of the University.

Practical work related to theory papers (20 marks each) - (EDU-01 to 10) Continuous Evaluation (CE) of Practical Work related to theory papers will be done by the teacher educator concerned internally as per the guidelines in each case. The Practical Work coming under Theoretical Discourses (EDU 01 to 05) will be subjected to internal assessment only during Semester I. But the practical work related to theory of Semester II (EDU 06 to 10) will be subjected to both internal and external evaluation. The criteria of assessment will be the same for internal and external evaluation.

B.   Practical Courses:

Practical Courses for Internal assessment

• Comprehensive assessment of the College, School & Community Based Practical for Semester I (EDU 101, EDU 102, EDU 103) & Semester II (EDU 201, EDU 201, EDU 203) will be done by the teacher educators concerned internally on the basis of the criteria fixed for the purpose.

• The internal examiner will assess the performance of the student-teachers and award marks and respective grades for the maximum marks specified.

• Internal assessment of Initiatory school experiences of Semester I and Practice Teaching in Semester II will be carried out jointly by the General and Optional teachers.

• The marks and respective grades of internal assessment (CE & Practical Courses) during Semester I   have to be forwarded to the University by the institutions before the end of Semester I. There will be no external assessment for the practicals done during Semester I.

• The marks and respective grades of internal assessment (CE & Practical Courses) during Semester II have to be handed over to the Chairman of External Practical Board appointed by the University at the time of Practical Examination.

Practical Courses for External Assessment

Practical work related to theory papers (EDU 06 to 10), Practical Courses and Practice Teaching of Optional Subjects (EDU 201, 202, 203) of Semester II will be subjected to external assessment by an External Examination Board constituted by the University. The external examiner for Physical Education will assess the Records related to Physical and Health Education. There will be no external assessment of Physical and Health Education classes by the external examiner. The present practice of appointing Zonal Boards will be continued. The board members will be appointed by the University on the basis of existing norms.

Scheme of assessment of Practical work related to theory paper (CE) and Practical Courses of Semester II by External Practical Examination Board

External Examiner	Item for assessment			Marks
General Subject	EDU (06 to 08)	1. CE of Related Practicals of Core papers	& Viva voce	3 X 20
	EDU-203.1	2. Report of Community Living Camp		20
	EDU-203.2	3. Report of Study Tour		10
Health Education	EDU 201.2	4. Internal Test		10
		5. Record of Health education	& Viva voce	10
	EDU 202.2	6. Record of Practice teaching		10
Optional Subject	EDU-09 & 10	7. CE of Optional subject		2 x 20
	EDU 201.1	8. Online assignment		10
		9. Innovative work/aid		10
	EDU 202.1	10. Record of Practice Tg		40
		11. Peer review record	& Viva voce	10
		12. Teaching		130
		13. Diagnostic Test		10
		14. Achievement test		20
		15. Reflective Journal		10

Zonal Board : - The Zonal Board will consist of a Chairman, Subject expert for each Optional Paper, one Subject expert for Core Papers, one Subject expert for Physical and Health Education appointed by the university. The subject expert for the Optional Paper will conduct Practical Examination for the concerned Optional. If the number of candidates in an Optional subject is more than 20, an additional examiner can be appointed. The board shall observe and assess the teaching competency (Optional only) and other Practical Work of all student-teachers and conduct a Viva-Voce based on the subject. The members of the external board will assess the performance of the student-teachers in their concerned subject and award marks and respective grades for the maximum marks specified. Each Zonal Board will visit a maximum of 3 to 4 institutions only.

Number of Zonal boards: - The University will constitute the required number of Zonal Boards to complete the Practical Examination in the stipulated time (in a duration of 10-15 days). All qualified teacher educators have to compulsorily take up appointment as External Examiner.

Co-ordinating Chairman: - A Co-coordinating Chairman will be appointed by the University who will co-ordinate the work of four zonal boards. The Coordinating chairman has to randomly check the assessment of Zonal Boards and make corrections, if necessary. The final Mark List of Practical Examination (average of internal and external, internal marks handed over by colleges, and external marks awarded by the board) has to be forwarded to the Controller of Examination.

Duties of Practical Board: The marks and respective grades of internal assessment of CE and Practical Courses of Semester II will be handed over to the Chairman, External Practical Board at the time of Practical Examination by the Colleges concerned. The members of the External Practical Board will assess the Records and performance of all the student-teachers in their concerned subject using the assessment criteria followed in internal assessment and hand over the marks and respective grades to the Chairman of the Board. In case, the total marks awarded by the internal and external examiner for a subject (Core papers, Physical Education, Optional Subject and Practice Teaching) has a difference of more than 20% of the total marks, the Chairman will examine the case and settle the variation. In such cases the decision of the Chairman will be final. The Chairman will check randomly/verify any case, if discrepancies are noted. All the Examiners, appointed by the University including the Chairman have to be present in the college on all the days on which Practical Examination is conducted.

Compilation of marks : The average marks and respective grades of the internal and external assessment has to be computed by the Chairman of the Board and forwarded to the Co-ordinating Chairman along with internal marks handed over by the colleges and external marks assigned by the board.

Timing of Practical Examination: - Practical examination will be scheduled and carried out simultaneously in all the colleges in a period of 10-15 days, and completed at least one month before the end of Semester II to facilitate a smooth completion of academic programmes in the Colleges. The duration of the Practical Examination in an institution will be three days for a strength of 100 students. Additional days will be provided depending on the strength of the institution.

Scheme of Assessment: Theory

Semester I (End Semester Examination)

Code	Paper	Duration	Marks	Internal (related practical work) CE	Total
EDU 01	Philosophical and Sociological Foundations of Education	2 hours	50	20	70
EDU 02	Psychology of Development and Learning	2 hours	50	20	70
EDU 03	Technology and Evaluation in Education	2 hours	50	20	70
EDU 04.1-13	Theoretical base of …..Education – I	2 hours	50	20	70
EDU 05.1-13	Pedagogic Content Knowledge Analysis:	2 hours	50	20	70
Total			**250**	**100**	**350**

04.1-13 & 05.1-13 – Malayalam, English, Hindi, Sanskrit, Arabic, Tamil, Natural Science, Physical Science, Mathematics, Social Science, Geography, Commerce, Home Science.

Semester II (End Semester Examination)

Code	Paper	Duration	Marks	Internal (related practical work) CE	Total
EDU 06	Education in Indian Society	2 hours	50	20	70
EDU 07	Learner in the Psychological Perspective	2 hours	50	20	70
EDU 08	Management in Education	2 hours	50	20	70
EDU 09.1-13	Theoretical Base of……..Education II	2 hours	50	20	70
EDU 10.1-13	Techno-Pedagogic Content Knowledge Analysis:…	2 hours	50	20	70
Total			**250**	**100**	**350**

09.1-13 & 10.1-13 - Malayalam, English, Hindi, Sanskrit, Arabic, Tamil, Natural Science, Physical Science, Mathematics, Social Science, Geography, Commerce, Home Science.

17.   Pattern of Question Papers (Semester I & II)

Type of Question	Number	Marks	Time
Multiple Choice	10	10 (1 mark each)	10 minutes
Very Short Answer	5	10 (2 marks each)	20 minutes
Short Answer	4 out of 6	20 (5 marks each)	60 minutes
Essay	1 out of 2	10 marks	30 minutes
Total	20	50	120 minutes

18.   Grading System (Seven Point Scale)

Grading: Grading is the process of applying standardized measurements of varying levels of comprehension within a subject area. Assigning letters for indicating the performance of students in each paper/area by giving due weightage according to the scale adopted. A seven point scale is suggested here for the grading purpose and Indirect Grading shall be used. In Indirect Grading the students are assessed using conventional marking mode and the marks awarded are converted into letter grades as per the weightages assigned.

Assess the marks for each Theory Course, Related Practical Work (CE), Practical Courses (EDU 101, 102, 103, 201, 202, 203) and convert the marks into letter grades in a seven point scale. Then find the Grade point Average (GPA). The overall performance of the students will also be assessed by finding the Cumulative Grade Point Average (CGPA) and converting this CGPA into letter grades by using a seven point scale. Also assign grades for both the Theory and Practical separately based on the table below:

Intervals of marks in %	Grade	Grade Point	Grade Range
90-100	A+	7	6.01 – 7.00
80 – 89	A	6	5.01 – 6.00
70 – 79	B+	5	4.01 – 5.00
60 – 69	B	4	3.01 – 4.00
50 – 59	C+	3	2.01 – 3.00
40 – 49	C	2	1.01 – 2.00
Below 40	D	1	0.01 – 1.00

Grade Point Average (GPA): GPA is the value obtained by dividing *the sum of the weighted grade points obtained by a student in various subjects in a semester* by *the total number of credits taken by him/her in the semester*. The value shall be rounded off to two decimal places.

Grade Point Average (GPA) - SEMESTER – I

Subject		Score	Score % rounded	Grade	Grade points (GP)	Credit	WGP = Credit X GP
EDU 01	Theory 50					5	
	CE 20					2	
EDU 02	Theory 50					5	
	CE 20					2	
EDU 03	Theory 50					5	
	CE 20					2	
EDU 04	Theory 50					5	
	CE 20					2	
EDU 05	Theory 50					5	
	CE 20					2	
Optional practicals	CE – 60					6	
Health Education	CE – 30					3	
Community activities	CE - 10					1	
Attendance	Grade - A+ to D						
Total						45	∑WGP =

Grade Point Average (GPA) = $\dfrac{\sum \text{WGP}}{\text{Total Credit}}$

Grade Point Average (GPA) - SEMESTER –II

Subject		Score	Score % Rounded	Grade	Grade points (GP)	Credit	WGP = Credit X GP
EDU 06	Theory 50					5	
	CE 20					2	
EDU 07	Theory 50					5	
	CE 20					2	
EDU 08	Theory 50					5	
	CE 20					2	
EDU 09 9.1-9-13	Theory 50					5	
	CE 20					2	
EDU 10 10.1-10.13	Theory 50					5	
	CE 20					2	
Optional practicals EDU-201.1, 202.1	240					24	
Health Education & Physical Education EDU-201.2, 202.2	30					3	
Community activities (Camp & Tour) EDU-203	30					2 1	
Attendance (Gr: A+ to D)							
Total						65	∑WGP =

Grade Point Average (GPA) = $\dfrac{\sum \text{WGP}}{\text{Total Credit}}$

Cumulative Grade Point Average (CGPA): CGPA is the value obtained by dividing *the sum of the Credit X GPA for both the semesters* by *the total credits for the entire course*. The value shall be rounded off to two decimal places.

$$\text{CGPA} = \frac{\text{(Total Credits for Sem.1} \times \text{GPA for Sem.1)} + \text{(Total credits for Sem.II} \times \text{GPA for Sem.II)}}{\text{Total Credit for Sem.1 and Sem. II}}$$

Grading of a Candidate: For a pass in the Semester I examination the candidate should have obtained a minimum of 50% marks (C+ grade) in aggregate with a separate minimum of 40% marks in each Theory Paper. There is no minimum for CE and Practical Courses during Semester I. Similarly for a pass in the Semester II examination, the candidate should have obtained a minimum of 50% marks in aggregate (C+ Grade) with a separate minimum of 40% marks (C Grade) in each Theory Paper and 50% for Practice Teaching. There is no minimum for CE and Practical Courses during Semester II.

The overall grade of the Course will be computed in terms of CGPA and respective grades will be awarded. The minimum grade required for a pass is C+ in aggregate.

Conversion of CGPA into:		
1.	Percentage of marks	= Scored CGPA/Total CGPA X 100
2.	Marks scored	= Scored CGPA / Total CGPA X Total Marks

19.   Curriculum Transaction – Guiding Principles

Strategies to be Adopted

- *The strategies proposed to be adopted in the transaction of the B. Ed. curriculum include Lecture-cum-Discussion/Narration, Co-operative and Collaborative Learning, Focused Reading and Reflection/Intellectual Discourses, Observation-Documentation-Analysis, ICT Enabled Learning/Virtual Tours, Requirement Based Learning / Individualized Learning, Multi Disciplinary Learning, Meaningful Verbal Expression, Seminars, Case Studies, Workshop /Dramatization / Miming, Self Learning, Problem Based Learning, Assignment, Debates etc. With a view to move away from theoretical discourses through lectures alone, the student teachers will be required to be engaged in these various kinds of learning experience/modes of learning engagements. These strategies have to be initiated by the mentor, to guide the student-teachers to go through the processes to achieve the expected outcomes. Many probable instructional strategies have been included with each contents in the curriculum, and the teacher educators have to adopt the most suitable ones to make the instruction effective.*

Mental Process :- the sequence of mental experiences-pedagogical-instructional-experiential contexts felt / received / undergone by the student-teacher during or as a result of various interactions viz. Intellectual dilemma, Cognitive challenge, Controlled listening, Disequilibration and accommodation, Reflective intellectual discourses, Contemplative self expression, Verbal and conflict management, Narrative expression of self experiences, Field based mental imagery formation, Collective expression of consensus point and the like constitute the learning process.

The mental processes involved in the learning of various subjects are presented below in hierarchical order

1.   Retrieves/ recollects/ retells information

2.   Readily makes connections to new information based on past experiences and formulates initial ideas/ concepts

3.   Detects similarities and differences

4. *Classifies/ categorizes/ organizes information appropriately*

5. *Translates/ transfer knowledge or understanding and applies them in new situations*

6. *Establishes cause- effect relationship*

7. *Makes connection/ relates prior knowledge to new information/ applies reasoning and draw inferences*

8. *Communicates knowledge/ understanding through different media*

9. *Imagines/fantasizes/ designs/ predicts based on received information*

10. *Judges / appraises/ evaluates the merits or demerits of an idea/ develops own solutions to a problem*

The list of strategies, learning processes etc., are inconclusive. Teacher Educators have the freedom to adopt various strategies, learning process, assessment techniques in addition to the ones suggested in the Syllabus grid. But each institution/ teacher educator has to ensure that, the activities/ strategies suggested in the syllabus grid are followed during transaction of curriculum.

Academic Calendar

A copy of the Academic Calendar specifying the schedule of activities to be followed during the course is given in appendix. The course should start with an orientation.

* Orientation of the Curriculum (see Academic Calendar Semester I)

The time provided for General Orientation is first one week of the course. The purpose of General Orientation for fresh entrants to the B. Ed. Course is to spell out to the student-teachers the academic and professional aspects, and also the expectations of the institution from them in achieving the quality and standards of the professional course.

Scope of the orientation:- When the student teachers join a teacher education institution, they are anxious to know how to grapple with the problems and situations that are new to them and appear to be challenging. Therefore, the orientation programme should be organized at the beginning and be spread over the whole of the first week, as it will lay the foundation for a successful course. It should cover the following areas:

1. ***General Orientation:***
   a)   About Teaching as a Profession
   b)   About the Institution/college
   c)   About the Faculty

2. ***About the B. Ed. Programme***

   a)   Theoretical Discourses (papers) and Related Practical Work (CE)
   b)   Practice Teaching
   c)   Practical Work / Practicum (College/School/Community Based)
   d)   Evaluation (both Internal and External)
   e)   Curricular and Co-curricular Activities in the Institution. Etc.

Composition of the Curriculum

The curriculum of various subjects included for B.Ed. are presented in the order **EDU 01-05** in Semester I and **EDU 06 – 10** in Semester II, Core Papers followed by Optional Papers. The components of the curriculum have been presented in the following order.

- **Title of the Subject**
- **Objectives of Learning the Subject**
- **Contents included in the subject**
- **Syllabus Grid**

The syllabus Grid contains four columns
1. **Learning Objectives/Outcomes** (what the student-teachers may achieve)
2. **Contents/Concepts and allied matters**
3. **Strategies/Approaches recommended for transaction**
4. **Assessment and Evaluation**

Core Papers

Six papers are included in the core papers covering Philosophical, Sociological, Historical and Psychological Foundations of Education, Educational Technology, Evaluation, Environmental education and Management in education in order to develop a realistic outlook about education and teacher in the Indian society. The objectives of core papers are:

The prospective teacher
- Understands the meaning, significance and prospective of education in the socio-cultural context.
- Understands the history, current issues and challenges of Indian Education and becomes capable of solving various problems of the society.
- Understands the developmental processes and needs of children and adolescents, the role of teacher in facilitating them
- Acquaints with prominent psychological principles, theories of development, learning and allied matters and makes use of them in educational circumstances.

- Understands the assumptions of ICT, evaluation, technology etc., and makes use of them in class room learning.
- Acquires the democratic and social values of an ideal teacher and develops skills and competencies in teaching and classroom management.

Optional Papers

Theoretical Base of the Optional Subject and (Techno) Pedagogic Content Knowledge Analysis in the area concerned are the optional papers suggested for the course. Due consideration has been given to incorporate the latest trends in the learning and pedagogical theories that touches various domains of the concerned subject. Keeping in mind the local- cultural-historical-environmental and educational dimensions of Kerala an earnest effort has been undertaken to incorporate the sprit of the 21st century knowledge based economic circumstances and its divergent demands in the teacher education process through the respective course work of the optional paper. A clear demarcation of the methodology paper and the corresponding pedagogical analysis paper with

respect to the respective optional subjects have been worked out which help for meaningful transaction of the optional curriculum. Revamping the concept of Pedagogical Analysis to Pedagogic Content Knowledge (PCK) and its contemporary version of Techno-Pedagogic Content Knowledge (TPCN) Analysis have been accommodated in this revision process to give a practical face to the curriculum. The following illustration may make things more clear.
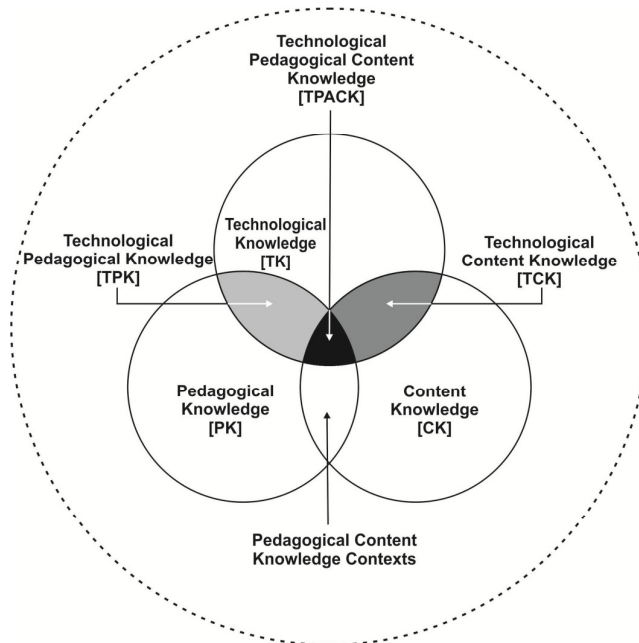
The objectives of optional education include:

- To make the novice Student-Teachers understand the scope and nature of Teaching the subject at different levels of learning.
- To introduce the challenging career of a Teacher with a futuristic perspective, as an agent of social change.
- To develop practical field based skill and experience in resource development and learning experience designing while transacting the curriculum.
- To provide the required research based learning experience so as to undertake a habit of self-development through inquiry and investigation.
- To enrich the vision and capabilities of prospective teachers as reflective practitioners during and after the pre-service education
- To design instructional and learner support mechanism – print, non-print, electronic and digital- appropriate for the learner needs and contextual requirements.
- To get a field based understanding of theories and principles of pupil assessment and evaluation.
- To undertake a self-empowerment initiative in transacting the Curriculum from a Techno-Pedagogical Content Knowledge Perspective.
- To identify the Entrepreneurial opportunities of futuristic significance associated with the subject
- To develop a neo-humanistic attitude among the Student-Teachers in the light of Science-Technology- Society/culture – Environment interaction paradigm.

Semester I

Instructional hours per paper: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Core Subjects

EDU 01   : **Philosophical and Sociological Perspectives of Education**

EDU 02   : **Psychology of Development and Learning**

EDU 03   : **Technology, Assessment and Evaluation in Education**

Optional Subjects

EDU 04. 1-13   : **Theoretical Base of ………….Education I**

EDU 05.1-13   : **Pedagogic Content Knowledge Analysis - …….**

EDU – 01: PHILOSOPHICAL AND SOCIOLOGICAL PERSPECTIVES OF EDUCATION

Objectives

- To recognise broad functions of education and role of teacher as a leader
- To develop personal philosophy of teaching
- To understand the sociological functions of education
- To synthesise the role of teachers as a change agent and nation builder
- To synthesise the role of education in promoting national integration and peaceful coexistence

Contents

Unit I   : **Teacher and Education**

Unit II   : **Philosophical Perspectives of Education**

Unit III   : **Sociological Perspectives of Education**

Unit IV   : **Education and Social Change in Indian Society**

Unit V   : **Education in Contemporary Society**

Unit I: Teacher and Education (12 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop the broad concept of education 2. To understand Meaning, definitions and Aims of education 3. To develop awareness on types and agencies of education 4.To recognize qualities and competencies of a teacher	▪ Meaning and concept of Education ▪ General Aims of education ▪ Definitions of Education ▪ Formal, informal, and non-formal education ▪ Child centered and life centered education ▪ Teacher- Qualities and Competencies ▪ Teaching- An art and Science	Meaningful verbal expression Lecture-discussion ICT Group Discussion	▪ Role Performance Analysis in group Discussion ▪ Involvement in Debates ▪ Seminar Presentations ▪ Assignments ▪ **Class test(objective type)**

References:
▪ Zhijian, L.The multirole of Teacher: Retrived July 10, 2012, fromWuhan university of science and engineering: http://www.seiofbluemoutain.com
▪ Sharma R.A. (1993). Teacher Education: Theory, Practice and Research. Meerut : International Publishing House
▪ Agrawal, J.C. & Agrawal S.P. (1992). Role of UNESCO in Educational, Vikas Publishing House, Delhi.
▪ Anand, C.L. et.al. (1983). Teacher and Education in Emerging in Indian Society, NCERT, New Delhi.
▪ http://www.ncert.nic.in/
▪ http://teaching.about.com
▪ http://www.ncte-india.org.

Unit II: Philosophical Perspectives of Education (24 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop personal philosophy of teaching 2. To develop an awareness and attitude towards eclectic tendencies in education	▪ Relationship between Philosophy and Education • Thoughts on Education – Idealism - Naturalism-Pragmatism - Realism – Humanism- features and educational implications ▪ Thinkers on Education – Plato – Froebel– Montessori-Dewey – ▪ Gandhiji - Tagore –Vivekananda-Jiddu Krishmoorthy ▪ Eclectic tendencies in education	Meaningful verbal expression Lecture-discussion ICT Seminar Debate	▪ Participation and Performance in Quiz Competition ▪ Seminar Presentations ▪ Field visit reports ▪ **Internal Test I (CE)**

References:
▪   Brubacher John. S (1962). Modern Philosophies of Education. New Delhi: Tata McGraw,
▪   Butter J. Donald (1951). Four Philosophies and Their Practice in Education and Religion New York: Harper and Brothers Publishers
▪   Dewey John (1938). Experience and Education. New York: Macmillan.
▪   George Thomas (2004) Introduction to Philosophy, Delhi, Surjeet Publication
▪   R. P. Pathak (2012) Philosophical and Sociological Principles of Education. New Delhi: Pearson Publication.
    http://www.mu.ac.in

Unit III: Sociological Perspectives of Education (8hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the interactive role of education and society 2. To develop an understanding about the role of education with regard to culture	▪ Education and Sociology ▪ Interactive role of education and society ▪ Functions of education with regard to Culture ▪ Acculturation and Enculturation –Cultural lag, cultural inertia, Cultural diffusion ▪ Sanskritisation and cultural changes ▪ A comparative account on Dravidian, Vedic and Buddhist education	ICT enabled group discussion Field trip Lecture-discussion	▪ Document Analysis ▪ Field visit reports ▪ Class test ▪ Role Performance ▪ Analysis in group Discussion ▪ Seminar Presentations

References :
▪ Fifty Years of Teacher Education in India (Post Independence Developments) : G.L Arora & Pranati Panda . NCERT
▪ John, Zeepa Sara. Philosophical and Sociological Foundations of Education. Chennai: Almighty Book Company, 2012
▪ Salamatullah, (1979). Education in Social context, NCERT, New Delhi.
▪ Chaudhary, Meenu. Objectives and Fnctions of Education. Pearson Education, 2012.
▪ Express Learning(authors), Teacher in Emerging Indian Society. Pearson Education, 2012.
▪ http://www.mu.ac.in/
  http://www.yazour.com/

Unit IV: Education and Social Change (26 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To analyze and synthesize the sociological functions of education 2. To develop awareness about the characteristics of Indian society. 3. To synthesize the significance of Education as an agent of social change	▪ Characteristics of Indian Society –class, religion, ethnicity, language. ▪ Social Change – Factors influencing social changes- Role of Education ▪ Modernization and social changes ▪ Major changes occurred in Indian society ▪ Conscientisation - Areas where conscientisation is needed ▪ Role of education to curb Social evils like Corruption, Terrorism, Antinational activities, Violence against women, Drug abuse and Alcoholism etc. ▪ Teacher as a Change agent and Nation builder	Lecture Cooperative Learning Discussion Social Constructivism	▪ Initiation and performance in dramatization ▪ Field visit reports ▪ Role Performance Analysis in group Discussion ▪ Involvement in Debates ▪ Seminar Presentations ▪ **Class test (objective type)-CE** ▪ **CE - Practicum**

References :
- Elder, Joseph W. (2006), "Caste System", Encyclopedia of India (vol. 1) edited by Stanley Wolpert, 223–229, Thomson Gale: ISBN 0-684-31350-
- Freire, P. (1972). Pedagogoy of the Oppressed. Harmondsworth: Penguin
- Saraswathi, B(1998). The cultural dimension of education. New delhi, indira Gandhi national center for the arts
- Raman, S.A. (2006). "Women's Education", Encyclopedia of India (vol. 4), edited by Stanley Wolpert, 235–239, Thomson Gale: ISBN 0-684-31353-7
- http://en.wikipedia.org/wiki/Terrorism_in_India
- http://library.thinkquest.org/
- http://en.wikipedia.org/
- http://en.wikipedia.org/

UNIT V: Education in Contemporary Society (14 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand, apply and synthesis national and global functions of education 2. To analyse views of some Indian thinkers on Nationalism	• Four pillars of education by UNESCO • Democracy and Secularism • Duties and Rights of Indian Citizens • Three visions by Dr. A.P.J. Abdul Kalam • National Integration- International Understanding • Peace Education	e-learning Lecture-discussion Quiz ICT Brainstorming Constructivism	• Participant Observation/Role Performance Analysis in group Discussion • Involvement in activities • Seminar Presentations • Field visit reports • **Internal Test II /Model Examination**

References :
- Chinara. B. (1997) Education and Democracy, New Delhi APH
- Dash, B.N. (2002). Teacher and Education in the Emerging Indian Society. 2 Vols.Hyderabad: Neelkamal Publication.
- UNESCO. (2004) Education for All: The Quality Imperative. EFA Global Monitoring Report. Paris.
- http://www.unesco.org/
- Gandhi M.K. (1937). Basic Education, navajivan publishing house, Ahmedbad
- Prof. B.C Rai(1997), Theory of Education, Prakasan Kendra. Lucknow
- Education in the Emerging Indian Society. 2008. J.C.Agarwal. Shipra Publications
- Mukherji, S.M., (1966). History of Education in India, Acharya Book Depot, Baroda.
- Kumar, Dushyant (2012) Perspectives in Modern Education. Pearson Education
- Pathak, R.P(2012). Philosophical and Sociological Perspectives in Education. Pearson Education,
- Dushyanth Kumar (2012). Perspectives in Modern Education, Pearson Education, New Delhi.
- http://pointerforall.blogspot.in/
- http://en.wikipedia.org/wiki/Fundamental_Rights_in_India

EDU 02: PSYCHOLOGY OF DEVELOPMENT AND LEARNING

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives: To enable the student teacher:

- To develop an understanding of the nature, scope and methods of Educational psychology.
- To familiarise the approaches to the study of Educational Psychology
- To develop an understanding of the concept, principles and theories of Growth and development.
- To understand the developmental characteristics of Childhood and Adolescence.
- To understand the concept, nature and factors influencing learning
- To develop an understanding of the mental process involved in learning through various theoretical perspectives
- To familiarise the cognitive functions of learning
- To understand motivation and its educational significance etc.

Contents

UNIT I   **: Foundations of Educational Psychology**

UNIT II   **: Development of The Learner**

UNIT III   **: Nature, Characteristics and Factors of Learning**

UNIT IV   **: Approaches and Theories of Learning**

UNIT V   **: Cognitive Functions in Learning**

UNIT I: Foundations of Educational Psychology (16 hours (12 T+ 4 P))

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an awareness about the need for educational psychology for a teacher 2. To develop an understanding of the nature, scope and methods of Educational psychology. 3. To understand various approaches to study Psychology. 4. To equip student teachers to undertake action researches 5. To familiarise the various branches of psychology	a. Educational Psychology- Meaning, Scope, Limitations and relevance in classrooms b. Scientific method of studying behavior, Methods of studying Educational Psychology- Introspection, Observation, Experimental, Case Study & Action research	1. Lectures 2. Group discussion on Critical analysis of application of psychology 3. Comparison of different methods of psychology 4. Case study 5. Field survey	▪ Reflective practices ▪ Assignments ▪ Seminar presentation ▪ Test paper ▪ Performance in discussions

References

- Chauhan, S.S (2006) Advanced Educational Psychology New Delhi : Vikas Publishing House.
- Woolfolk, Anita (2004), Educational Psychology (9th ed.) India: Pearson Education
- Mangal, S.K (1997) Advanced Educational Psychology New Delhi Prentice Hall of India

UNIT II: Development of the Learner (20 hours (15 T+ 5 P))

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To develop an understanding of the concept, principles and theories of Growth and development.
 	
2. To familiarise the different aspects of development and developmental tasks and developmental hazards
 	
3. To understand the developmental characteristics of Childhood and Adolescence.
 	
4. To critically evaluate the contributions of various theories of development
 	
5. To conceptualise the role of teacher in facilitating development of the learner
	▪ Growth and Development: Concept and Principles, Developmental tasks and Developmental hazards
	▪ Theories of development- Piaget's theory of intellectual development, Erickson's theory of psycho social development and Kohlberg's theory of moral development
	▪ Modern theories of development- Socio cultural and Ecological (Vygotsky Bronfenbrenner))
	▪ Developmental characteristics with special reference to childhood and adolescence
	   i. Physical development
	   ii. Cognitive development
	   iii. Language development(Noam Chomsky, Vygotsky)
	   iv. Emotional development
	   v. Moral& social development-
	▪ Role of teacher.
		1. Group discussion to compare the characteristics of childhood and adolescence
		
		2. Practicum/Seminars on the highlights of various theories
		
		3. Lecturing
		
		4. Child study
		
		5. Action research for identifying adolescent problems
		
		6. Assignments etc.
			• Reflective practices
			• Performance in group discussions
			• Assignments
			• Seminar presentation
			• Test paper
			• Child study reports
			• Practicum etc.
			• **Internal Test – 1 (CE)**

References

- Hurlock, B. Elizabeth(2003)., Developmental Psychology New Delhi: Mcgraw-Hill
- Berk, L.E (2012) Child Development (6th Ed .)New Delhi: Prentice Hall of India, Witting A F,(2001) Developmental Psychology, A life span Approach, New Delhi: Mc. Graw Hill
- Penuington, D, et.al (2010) Advanced Psychology: Child Development, Perspectives and Methods, London: Hodder &Stoughton

UNIT III: Nature, Characteristics and Factors of Learning (18 hours (13 T+ 5 P))

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept, nature and factors influencing learning. 1. To develop an understanding of the process of learning 2. To understand the factors affecting learning 3. To familiarise the concept of memory and forgetting 4. To conceptualise the role of motivation in learning 5. To familiarise the concept of achievement motivation	▪ Meaning, Definition & Characteristics, Factors affecting learning - learner, Method and Task variables, Study habits- Concept and methods, Transfer of Learning. ▪ Maturation, Need, Interest, Attention and Motivation- Concept, Types, strategies & educational Implications. Theory of motivation- Abraham Maslow, Achievement motivation	1. Lecturing 2. Group discussion on factors affecting learning 3. Brainstorming on method and task variables of learning 4. Field study on intrinsic and extrinsic motivation	▪ Test paper ▪ Assignments ▪ **Practicum** ▪ Presentation in seminars ▪ Performance based assessment

References

- Gates, A.S and Jersild, A.T (1970) Educational Psychology, New York : Macmillian.
- Aggarwal, J.C (1994) Essentials of Educational Psychology New Delhi :Vikas Publishing House
- Dandapani, S. (2007), A Text Book of Advanced Educational Psychology; New Delhi: Anmol Publications Pvt. Ltd.

UNIT IV: Approaches to Learning (22 hours (15 T+ 7 P))

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the process of learning through various theoretical perspectives 2. To familiarise behaviouristic, constructivist and information processing approaches in learning 3. To compare the different approaches in learning 4. To develop learning strategies based on different perspectives	▪ Behaviourist approach- Pavlov, Thorndike, Skinner. ▪ Cognitive approach- Gestalt, Kurt Lewin, ▪ Information processing approach to learning ▪ Meaningful Verbal learning- Ausubel ▪ Gagne's Cumulative learning approach. ▪ Constructivist approach- Individual and Social- Piaget, Bruner &, Vygotsky.	1. Lectures 2. Critical evaluation of different approaches -Use peer tutoring technique- 3. List suitable learning activities based on constructivist approach 4. Cooperative and Collaborative Learning activities 5. Debate on cognitivism vs constructivism 6. Psychology lab experiments (any two)	▪ Performance in activities ▪ Test paper ▪ Group discussion ▪ Assignments

References

▪ Mathur.S.S(2007) Educational Psychology, Agra-2, Vinod Pustak Mandir
▪ Schunk, D.H (2011); Learning Theories: An Educational Perspective, India: Pearson
▪ Sternberg, R.J.(2006), Cognitive Psychology (4th ed.) U.K.: Thomson Wordsworth

UNIT V: Cognitive Functions in learning (8 hours (5 T+ 3 P))

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
▪ To analyse the different cognitive functions of learner ▪ To familiarise the cognitive skills like thinking, reasoning and problem solving	▪ Sensation and Perception- factors, laws, Concept formation ▪ Cognitive functions -Thinking, Reasoning- Problem solving and Meta cognition ▪ Memory- Concept; Types & Strategies to develop memory, ▪ Forgetting- causes and problems	1. Lectures 2. Preparation of a Concept map 3. Group discussion on strategies for improving Memory, Reasoning and Problem solving 4. Memory test 5. Seminars	▪ Test paper ▪ Performance based assessment ▪ Practical work ▪ **Internal Test II (CE)/Model Exam**

References
▪ Hughes, A.G & Hughes, E.H(2005) Learning and Teaching , New Delhi, Sonali Publications
▪ Skinner .E.C (2003) Educational Psychology, New Delhi, Prentice Hall of India Pvt.Ltd.

Suggested Readings

▪ Berk,Laura E, (2003). Child Development (6th ed). New Delhi : Prentice Hall of India.
▪ Aggarwal, J.C (1994) Essentials of Educational Psychology New Delhi :Vikas Publishing House
▪ Craig J Grace (1983) Human Development Prentice Hall, INC, Eagle Wood Cliffe, New Jersey.
▪ Crow, L.A and Crow A Educational Psychology (1973) New Delhi : Eurasia Publishing House.
▪ Devas, R.P., Jaya N. (1984). A Text Book on Child Development. Bombay :McMillan India Ltd.
▪ Dinkmeyer.C.D(1967) Child Development,. New Delhi, Prentice Hall of India Pvt. Ltd.

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- Duric, L (1990)Educational Psychology New Delhi : Sterling Publishers.
- Elliott, A.J (1981) Child Language Cambridge University Press
- Entwistle,N.J.(1981). Styles of learning and teaching. New York :John Wiley.
- Entwistle,N.J.(1987). Understanding classroom learning. London: Hodder & Straughton.
- Hilgad, E.R. And Bower, G.H., (1977). Theories of Learning. New Delhi :Prentice Hall of India Ltd.
- Hurlock E.B (1995) Development Psychology A Life Span Approach. New Delhi : Tata Mc Grow Hill Publishing Co.
- Jangira, N.K., etal (1991). Functional Assessment Guide. New Delhi : NCERT.
- Musser, P.H, Conger, S and Kagar, P (1964) Child Development and Personality, New York : Harper Row
- Nisha, Maimun (2006); Milestones of Child Development; New Delhi: Kalpaz Publications
- Reilly, P.R & Levis, E (1983) Educational Psychology New York : Macmillian Publishing Co Ltd.
- Schunk, D.H(2011)Learning Theories an Educational Perspective, New Delhi, Pearson Education.
- Skinner .E.C(2003) Educational Psychology, New Delhi, Prentice Hall of India Pvt.Ltd.
- Umadevi, M.R.,(2009) Educational Psychology: Theories and Strategies for Learning and Instruction, Bangalore, Sathkruthi Publications
- Wolman, P.B (Ed) (1982) Hand Book of Developmental Psychology Prentice Hall : Engle Wood Cliffs, New Jersey
- Naima Khatoon (2012)General Psychology, New Delhi, Pearson Education
- Feldman (2011) Discovering The Life Span, New Delhi, Pearson Education
- Robert A Baron(2012) Fundamentals of Social Psychology, New Delhi, Pearson Education
- Samina Bano (2012) Experimental Psychology, New Delhi, Pearson Education
- Pathak (2012) Teaching Skills, New Delhi, Pearson Education
- Anita Woolfolk (2003) Educational Psychology, 9/e New Delhi, Pearson Education
- Anita Woolfolk (2012) Fundamentals of Educational Psychology, 1/e, New Delhi, Pearson Education
- Dale H. Schunk (2008) Learning Theories : An Educational Perspective, 5/e, New Delhi, Pearson Education
- http://www.libraries.psu.edu/
- http://www.teacher.net
- www.moodle.org
- http://teamwork.sg/teamwork/schoolportal.aspx
- http://www.enhancelearning.co.in/SitePages/Index.aspx
- http://www.e-learningforkids.org/courses.html

EDU 03 : TECHNOLOGY, ASSESSMENT & EVALUATION IN EDUCATION

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Contents

A**.**   *Educational Technology (Theory 30 hours+ 18 Practical hours)*
Unit I   : **Concept of Educational Technology**
Unit II   : **Audio- Visual Media**
Unit III   : **Classroom Communication and Interaction**
Unit IV   : **ICT in Classrooms**

B.   *Educational Assessment and evaluation (30 Hours theory + 6 practical hours)*
Unit I   : **Introduction to assessment and evaluation**
Unit II   : **Assessment in Learning**
Unit III   : **Tools and techniques in evaluation**

Objectives

- To create a zinc with man, machine and material with regard to technological resources
- To empower prospective teachers through the blending of technological aspects with pedagogical principles
- To acquaint the prospective teachers with the application and use of e-resources, free and open source software
- To explore the creative avenues in technological advancements for improving the teaching learning process
- To develop an understanding about the concept of assessment and evaluation in education
- To familiarise with the domain based assessment practices
- To acquaint with the new assessment practices and tools and techniques of evaluation
- To develop the skill to compute important statistical estimates and to interpret the test scores

A.   EDUCATIONAL TECHNOLOGY 30 hours theory+18 practical hours)

UNIT I: Concept of Educational Technology (6 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To provide a smooth entry into the field of educational technology 2. To set a perspective on different approaches of technology 3. To understand the new approaches in technology 4. To familiarize with various agencies and services in the field of educational technology	▪ Educational Technology- meaning and definition ▪ Approaches of educational technology – Hardware, Software and Systems approach ▪ Multimedia and multisensory approach – meaning and concept ▪ Resource centres and services in educational technology ▪ SIET ▪ SITE ▪ UGC-CEC ▪ AVRC ▪ C-DIT ▪ EDUSAT ▪ IT@SCHOOL- VICTERS channel ▪ AKSHAYA PROJECT ▪ GYAN DARSAN ▪ INFLIB NET	Narrative session Interactive session Meaningful verbal expression Visual presentation Viewing programmes Class discussion Assignment	▪ Evaluation based on documentation ▪ Evaluating the level of participation ▪ Evaluation based on documentation ▪ Assessing students report ▪ Evaluating the assignments

References

- Chaudhary,Jagdeesh&Pathak, R.P. (2012). Educational Technology. Dorling Kindersly (India) Pvt. Ltd.
- Aggarwal J.C. (2006).Essentials of Educational Technology-Teaching Learning-innovations in Education. New Delhi: Vikas Publishing House.
- Sambath,K.&Paneerselvam A.(2006).Introduction to Educational Technology. New Delhi: Sterling Publishers Pvt. Ltd.
- Krishnamurthy, R.C.(2003). Educational Technology: Expanding Our Vision. New Delhi: Authors press.
- www.slideshare.net/selvabarady/flanders-interaction-analysis
- www.e-learningforkids.org/courses.html
- www.ssa.nic.in
- www.sietkerala.org
- www.cdit.org
- www.web.usm.my/education/publication/8%20See%20(115-128).pdf
- www.ciet.ni.in
- www.itschool.gov.in
- www.scert.kerala.gov.in

UNIT II: Audio- Visual Aids (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Creating awareness provision for effective use of aids in teaching and learning 2. Develops the ability to choose the most suitable learning aid while preparing the teaching lesson 3. To realize the relevance of mass media in education 4. To realize the importance of improvisation 5. To design the ability to improvise materials using locally available recyclable materials 6. To promote creativity 7. To familiarise with teleconferencing and its application in classroom 8. To familiarise with the latest educational technology equipment 9. Develop skill in using interactive white boards 10. To familiarise the concept of cone of experience	▪ Categorisation and classification ▪ Mass media- Meaning and relevance- role of television, radio, newspapers and films in education ▪ Improvised aids-Relevance in teaching-learning process ▪ Teleconferencing ▪ Audio ▪ Video ▪ Interactive white boards ▪ Advantages over normal chalk board ▪ Dale's cone of experience	Group discussion Documentation Group discussion Preparing an assignment Meaningful verbal discourse Group discussion Demonstration using Skype Group discussion Demonstrating Hands on experience Individual practice Power point presentation	▪ Role performance analysis in group discussion ▪ Evaluation of documentation ▪ Role performance assessment in group discussion ▪ Examine the assignment ▪ Class assessment ▪ Role performance assessment ▪ Role performance analysis ▪ Assessing the skill development ▪ **Internal Test I (CE)** ▪ Evaluate the competency to compare and ▪ Contrast

References

- 1.Kopp, Kathleen(2012). Using Interactive Whiteboard in the Classroom. Shell Education
- 2.Chaudhary,Jagdeesh&Pathak, R.P. (2012). Educational Technology. Dorling Kindersly (India) Pvt. Ltd.
- 3.Alexis, Leon & Others (1999). Fundamentals of Information Technology. New Delhi: VikasPubllishing House Pvt. Ltd.

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- Vanaja, M.(2006). Educational Technology. Hyderabad: Neelkamal Publication Pvt.Ltd.
- www.avaudiovisualaids.blogspot.com/2010/10/av-aids-in-teaching.html
- www.slideshare.net/pria87/audio-visual-aids
- www.tecweb.org/eddevel/edtech/teleconf.html

UNIT III: Classroom Communication and Interaction (5 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To introduce the concept of communication 2. To develop the ability to become an effective classroom communicator 3. To identity the hindrances and the facilitators of communication 4. To plan an effective communication process during the classroom teaching 5. Acquaint with the FIACS 6. Develops skill in matrix construction 7. To develop the ability to interpret the matrix and to explain the nature of the classroom interaction	▪ Concept, types, communication cycle ▪ Characteristics and components of effective classroom communication ▪ Barriers and facilitators of communication ▪ Interaction analysis -FIACS ▪ Metric construction ▪ Interpretation of matrix	Verbal expression Group discussion Collaborative interaction Meaningful verbal expression Active learning activities Coding exercises during criticism classes	▪ Evaluation based on documentation ▪ Role performance analysis ▪ Level of participation in group activity ▪ **CE - Practicum** ▪ Assimilating the materials ▪ Evaluating the report

References
- 1.Chaudhary,Jagdeesh&Pathak, R.P. (2012). Educational Technology. Dorling Kindersly (India) Pvt. Ltd.
- Morison, R.Gary&Lowlher,L.Deoborah&DeMeulle Lisa.(1995). Integrating computer Technology in the Classroom. New Jercy: Prentice Hall.

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- www.studygs.net/attmot2.htm
- www.stxaviersbedcollege.org/sim/technology_arock.pdf
- www.slideshare.net/diputr/fiacs-flanders-interaction
- www.anandkab.blogspot.com/2011/03/flanders-interaction-analysis.html

UNIT IV: ICT in Classrooms (28 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarise with the Microsoft office applications 2. Develops skill in using word, power point and excel 3. To familiarise with the operating system 4. To compare the functions of windows and Ubundu 5. Develops skill in using operating system 6. To realise the use of simulation in enhancing the classroom activities 7. To familiarise with the legal and ethical issues 8. To develop a sense of intellectual property right 9. To practice wise use of web resources 10. To familiarise with the web resources	▪ Introduction to MS Office and Open Office-Word, Power point, Excel and Publisher ▪ Operating System -Windows and Ubundu ▪ Computer simulation-concept and uses ▪ Legal and ethical issues- Copyright, Hacking, Netiquette. ▪ web resources – Search engines, academic web resources ▪ Familiarisation of free educational software and tools applicable at school level – G-complex, chemical calculator,K-tech, Stellerium, Molecular viewer,G-compris,	Introductory lecture Techno lab activities Peer tutoring Demonstration Hands on experience e- resource demonstration Group discussion Class discussion Printed media such as newspapers and magazines Home assignment Internet based	▪ Skill development assessment Participation in lab activities Evaluating assignments ▪ Participation in lab activities Participation in lab worksSkill testing ▪ Participation in group discussion Participant observation Skill test Checking online works ▪ Intellectual thinking Skill development Enrolment for e-learning courses Completing e-learning courses ▪ Participation in discussion Involvement in the learning process Skill in creating blogs Locating materials for teaching learning process ▪ Participation in lab activities

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11. To develop the ability to use the web resources 12. To familiarise with the educational tools to enhance classroom teaching 13. To promote the use of educational software's and tools in learning process 14. To develop skill in using educational softwares 15. To explore the use of social networking in classroom 16. Teaching 17. To develop skill in posting and commenting materials in sites 18. To familiarise with the emerging trends in learning 19. To develop an attitude to adopt the e-learning in teaching learning process 20. To practice e learning courses 21. To explore the creative avenues for teaching learning process 22. To develop the ability to integrate ICT in a variety of forms 23. To familiarise the various services in the web 24. To familiarise the learning management system 25. To create an awareness about the educational uses of Moodle 26. To perceive the role of teacher in a digital era	▪ HotPotatoes ▪ Social networking – Facebook Linkdin Twitter its application in classrooms ▪ e-learning concept ▪ Types Offline e-learning (meaning and importance Online e-learning (Synchronous and Asynchronous) meaning and importance ▪ Evolving trends of ICT in classrooms(Educational blogs, educational podcasting, blended learning, You tube, Newsgroups, Virtual classrooms, e-journals, e-reading-implications in classrooms) ▪ Introduction to Moodle- educational uses	activities Individual assignment Direct instruction Individual practice Practice session Online works Meaningful verbal discourse Familiarisation of e learning platform courser Active learning activities Interactive lectures Seminars	Involvement in group work Evaluating the assignments ▪ Role performance analysis ▪ Participation in the class. ▪ Presentation skill ▪ **Internal Test II (CE)/Model Exam**

27. To develop competencies in a techno literate world 28. To visualise teacher as a facilitator of the teaching learning process	▪ Teacher in a digital era- Changing role and competencies		

References

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- www.blendedlearning.in/
- www.dkfoundation.org/our-work/blended-learning

B.   EDUCATIONAL ASSESSMENT AND EVALUATION (30 Hours theory+6 hours process)

UNIT I: Introduction to assessment and evaluation (6 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To make the students understand and differentiate the concepts assessment and evaluation
 	
2. To set a perspective on different classifications of assessment based on purpose, scope, attributes, nature of information gathered, context mode of response and nature of interpretation
 	
3. To familiar with the concept and relevance of CCE and concept and applications of grading system.
	▪ Assessment and evaluation- Meaning, concept
	Classification of assessment based on:
	  a). Purpose, prognostic, diagnostic, formative and summative
	  b) Scope : teacher made and standardized
	  c) Attributes : achievement aptitude and attitude
	  d) Nature of information gathered: qualitative and quantitative
	  e) Mode of response : oral, written and performance test
	  f).Nature of interpretation: NRT and CRT.
	  g) Context: internal and external.
	▪ Current practices in evaluation -CCE-concept , need and relevance, Grading system- concept, types, levels, application, merits and demerits
		Group Discussion
		
		Meaningful verbal expression
		
		Collaborative interaction
		
		Discussion
		
		Debate
			▪ Role performance analysis
			▪ in group discussion
			▪ Participant observation
			▪ Examine the level of student participation
			▪ Engagement in the learning process
			▪ Participation in the discussion
			▪ Role performance analysis

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- www.bapta.com/educational.htm
- www.differencebetween.com/difference-between-assessment-and-vs-evaluation/
- www.springer.com/education+%26+language/journal/11092
- www.researchphilosophy.blogspot.com/
- www.katho3.people.wm.edu/
- www.adprima.com/measurement.htm

UNIT II: Assessment in Learning (9 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint the students with taxonomy of instructional objectives 2. To find relationship between objectives and assessment practices 3. To acquaint with different domains of learning 4. To discriminate between the domains of learning 5. To familiarities with types and levels of cognitive learning and various assessment procedures in assessing the understanding & application level of learners in additional different thinking and problem solving skill.	▪ Brief introduction to Instructional objectives as the basis of scientific evaluation- Bloom's taxonomy of educational objectives ▪ Domains of learning – cognitive, affective and performance ▪ Assessment of cognitive learning – types and levels of cognitive learning, understanding and application. ▪ Thinking skills- convergent, divergent, critical and problem solving-procedures for their assessment	Meaningful verbal discourse Narrative expression in small group. Demonstration Group discussion Demonstration Experimentation	Assessment/ Testing Evaluation based on documentation. Participant observation. Analysing the role in group discussion Evaluation based on documentation Engagement in the learning process Role performance analysis

6. To acquaint with various procedures for assessing the attitude, values and interest under affective domain. 7. To develop a clear perception about the tools and techniques to assess various performance tastes 8. To familiarise with the performance indicators at school level 9. To develop the skill in using performance level indicators 10. To acquaint the students with assessment techniques and devices for assessing performance based activities 11. To develop the ability to select the most appropriate technique and tool when assessment is done	▪ Assessment of affective learning – attitudes, values, interest –procedures for their assessment ▪ Assessment of performance tasks - tools and techniques for assessment of skills-reading, writing, experimental. ▪ Performance based indicators-scholastic and co-scholastic activities(State and CBSE) ▪ Assessment techniques and devices for performance based activities- ▪ Observation, projects, assignments, worksheets, practical work, seminars and reports	Power point presentation Group discussion Preparation and experimentation and applying during the practice teaching session	Evaluating the product and process **Internal Test 1(CE)**

References

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- www.thirteen.org/edonline/concept2class/assessment/index.html
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- www.weac.org/professional_resources/Testing/performance_assessment.aspx
- www.projectappleseed.org/assesment.html

UNIT III: Tools and Techniques in Evaluation (11 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the nature of different techniques of evaluation like interview, self-reporting and testing and their applications in the field of research. 2. To develop the skill in using the different techniques for data collection 3. To familiarize with various tools of evaluation and develops skill in applying in the field of research 4. To develop the ability to construct the tools mentioned 5. To understand the qualities of a good evaluation tool 6. To realize the relevance of online examination in assessment 7. To get acquainted with planning and development of portfolio in assessment 8. To develop skill designing and using portfolio 9. To familiarise with the rubric evaluation 10. To develop skills and competencies in constructing and using rubrics	▪ Techniques – Interview, Self reporting, testing- nature, merits, demerits- relevance in the field of research ▪ Tools- test, checklist, rating scale cumulative record, questionnaire, inventory, schedule, anecdotal record- concept, merits, demerits - relevance in the field of research ▪ Qualities of a good evaluation tool- validity , reliability, objectivity and practicability ▪ Online examination/Computer based examination- Concept and uses ▪ Portfolio assessment- planning and development ▪ Evaluation based on Rubrics – construction	Demonstration Practical session Construction and experimentation Active classroom learning Group Discussion Powerpoint presentation Development Collaborative interaction Powerpoint presentation Working on online resources Construction	▪ Evaluating the process and reports ▪ Evaluating the product and process ▪ **CE - Seminar** ▪ Participation in the learning process ▪ Role performance analysis ▪ in group discussion ▪ Participant observation ▪ Evaluating the product and process ▪ Assessing using rubrics

References

- Stevens, Dannelle.D & Levi, Antonia J. (2005).Virginia: Introduction To Rubrics: An Assessment Tool To Save Grading Time, Convey Effective Feedback and promote student learning. StylusPublishing.LLC.
- Quinlan, Audrey M. A Complete Guide to Rubrics: Assessment Made Easy for Teachers, KDCollege(2012).USA:Rowman Littlefield Education.
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- www.cmu.edu/teaching/designteach/teach/rubrics.html
- www.uwstout.edu/soe/profdev/rubrics.cfm
- www.eric.ed.gov/ERICWebPortal/custom/portlets/recordDetails/detailmini.jsp?_nfpb=true&_&ERICExtSearch_SearchValue_0=ED424257&ERICExtSearch_SearchType_0=no&accno=ED424257
- www.rubricbuilder.on.ca/links.html

UNIT IV: Basic Statistics in Evaluation (11 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the need and importance of statistics in educational evaluation 2. To familiarize with the need and purpose of classifying and tabulating data 3. To develop the skill in classifying and tabulating data 4. To understand the need for the frequency distribution of data	▪ Need and importance of statistics in educational evaluation ▪ Classification and tabulation of data- need and purpose ▪ Frequency distribution of data	Advance organizer approach Narrative expression in small group Group Discussion Meaningful verbal expression	▪ Evaluation based on documentation. ▪ Role performance analysis ▪ in group discussion ▪ Participant observation

5. To familiarise with the various graphical representation of data 6. To develop skill in preparing various graphical representation of data by giving special practice in MS Excel 7. To apply different measures of central tendency 8. To select the most appropriate measures of central tendency for the treatment of data 9. To apply different measures of dispersion 10. To select the most appropriate measures of dispersion for the treatment of data 11. To familiarise with the use of correlation for data analysis 12. To develop skill in calculating correlation using rank difference method	▪ Graphical representation of data- Pie diagram, Histogram, Bar diagram, Frequency polygon. Frequency curve advantages and limitations ▪ Measure of Central tendency – Mean, Median, Mode ▪ Measure of Dispersion – Range, Quartile deviation, Mean deviation, Standard deviation ▪ Correlation- Rank difference method	Active learning process Techno lab activities Computation Mathematical problem solving	▪ Evaluating the product and process ▪ Evaluating the product and process ▪ Evaluating the product and process ▪ Evaluating the product and process ▪ **Internal Test II (CE)/Model Exam**

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- Coolidge, Frederick L.(2013). Statistics- A Gentle Introduction-3rd edition. New Delhi:SAGE Publications Pvt Ltd.
- www.education.gov.uk/researchandstatistics
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EDU 04. 1 : THEORETICAL BASE OF MALAYALAM EDUCATION- I

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

The student teacher:

- Acquaints with the different dimensions of Pedagogic Content Knowledge Analysis.
- Get familiarised with the aims and objectives of teaching Malayalam, Taxonomy of educational objectives etc.
- Analyzes Secondary Malayalam Readers and identifies suitable strategies for transacting content.
- Understand the new concepts regarding teacher, learner, learning environment, learning activities and creativity
- Understand the need and significance of instructional planning
- Get acquainted with the integration of new theories and concepts strategies in accordance with learning styles

Contents

Unit I   **- General Introduction to Teaching and Learning**
Unit II   **- Nature Scope and Development of   Malayalam**
Unit III   **- Methods and Approaches of Curriculum Transaction –Traditional and Modern**
Unit IV   **- Teaching Prose and Poetry**
Unit V   **- Teaching Grammar and Composition**
Unit VI   **- Language Skills**
Unit VII   **- Models of Teaching**

Unit I: General Introduction to the process of teaching & learning (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get familiarised with the functional plane of teaching and learning and the divergent roles expected to be played as a teacher	▪ Inter dependence of teaching and learning- class room, teacher, learner, teaching learning process ▪ Definition of learning from different point of view ▪ Maxims of teaching ▪ Teacher as a professional ▪ Teacher competencies and roles - mentor, facilitator, reflective practitioner, scaffolder, Social Engineer ▪ Language Teacher ▪ Principles of language teaching	Group discussion Assignment Seminar film show of Educational films Appreciation sessions based on educational books like Toto Chan, Divaswapna, Teacher, Parivarthanonmugha Vidhyaabyasam, Vidyabyaasathil Viplavam etc.	▪ Assignment Paper ▪ Seminar presentation ▪ Test

Unit II: Nature Scope and Development of Malayalam (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the importance, nature and functions of Mother tongue	▪ Functions of Language ▪ Impact of language on social/moral/intellectual/cultural/emotional/educational- development	Assignments	▪ Assignments Paper, ▪ Seminar presentation

| 2. To get familiarized with the evolution of Malayalam language
3. To understand the relation between Malayalam and other language.
4. To find out the relation between language and culture. | ▪ Relevance of mother tongue in democratic society
▪ Mother tongue and medium of instruction
▪ Malayalam as an official language
▪ Malayalam and other languages
▪ Malayalam and other subjects
▪ Mother tongue as a tool for preservation, transmission and transformation of culture | Debates

Symposium | ▪ Test
▪ Participation in Debate & Symposium
▪ **CE test N0.1** |

Unit III: Methods and Approaches of Curriculum Transaction –Traditional and Modern (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the Methods, approaches, strategies of teaching Malayalam language and literature	▪ Lecture method ▪ Project method ▪ Play way method ▪ Dramatisation ▪ Dalton Plan ▪ Inductive and deductive methods ▪ Role play and simulation ▪ Cooperative and Collaborative Learning ▪ Problem solving method	Project Short essay Open discussion Comparative note Action research	▪ Project paper ▪ Essay ▪ Participation in discussion ▪ Action research findings ▪ **CE Practicum**

Unit IV: Teaching Prose and Poetry (13 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get acquainted with the aims, approaches, methods and strategies of teaching prose and poetry at different levels of schooling	▪ Aims and approaches of teaching Prose/ Poetry at different Levels with special emphasis to Secondary and Higher Secondary Levels ▪ Methods of teaching Prose/ Poetry Lessons ▪ Qualities of Prose/ Poetry lessons ▪ Principles of selecting Prose/Poetry lessons	Assignment Preparation of appreciations for selected prose and poetry lessons	▪ Assignment Paper ▪ Prepared appreciations

Unit V: Teaching Grammar and Composition (13 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get accustomed with the objectives, approaches, methods and techniques of teaching grammar and composition at HS and HSS levels	▪ The place of grammar in language study; ▪ Scope and goals at each level ▪ Inductive and deductive approaches in teaching ▪ General principles of teaching composition ▪ Different methods of teaching composition ▪ Different forms of composition.	Preparation of grammar work book based on the prose lessons of secondary classes Preparation of Composition work for secondary classes	▪ Relevance of work book ▪ Applicability of work book ▪ **CE Seminar**

Unit VI: Language Skills (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand, practice and master basic language skills, communication skills etc.	- Scope and application of basic language skills (Listening, Speaking, Reading and writing.) in different levels of schooling with special emphasis to Secondary and Higher Secondary levels - Common errors in reading, writing and pronouncing Malayalam. - Errors in sentence construction - The notion of editing instead of correction - Communication Skills - Strategies and activities for mastering language skills in Secondary and Higher Secondary levels	Practicum Preparation of a test for HS/HSS students to find out the common errors in reading and writing Malayalam Familiarisation of books on good Malayalam usage like Thettillatta Malayalam etc. Practice sessions on development of communication skills	- Appropriateness of Practicum - Effectiveness of the test - Participation of students

Unit VII: Models of Teaching

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To understand and practice the concept of models of teaching	▪ Basic elements of Families
	▪ Concept attainment model.
	▪ Synetics Model
	▪ Role Play Model
	▪ Advance Organiser
	▪ Inductive/ Deductive Thinking Model
		Preparation of lesson plans based on models of teaching	▪ Lesson plans
			▪ **CE test N0.2**
			▪ **Practicals on models of teaching**
			  o Discussion -3
			  o Demonstration
			  o Criticism Lessons-3

References : See EDU 09.1

EDU - 04.2 : THEORETICAL BASE OF ENGLISH EDUCATION- I
Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives :
- The student teacher :
- Familiarizes with the nature and purpose of language teaching.
- Grasps problems related to learning a Second Language
- Draws implications of different theories of learning for Second Language instruction.
- Gets an awareness of Approaches, Methods and Instructional Strategies for teaching English.

Contents
Unit I   : **General Introduction to Teaching and Learning**
Unit II   : **Nature and Scope of English Education**
Unit III   : **Language Theories and Psychological Principles**
Unit IV   : **Approaches and Methods**
Unit V   : **Strategies for Developing Language Skills and Communication Skills**

Unit I: General Introduction to Teaching and Learning (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Student teacher familiarizes with functional plane of teaching and learning and the divergent roles expected to be played as Guru	- Language teacher competencies - Teaching, its nature - Learning, its nature - Knowledge worker - Facilitator - Scaffolder - Mentor - Social Engineer - Reflective Practitioner	Makes student recall qualities of teachers whom they admire/ remember Narration, anecdotes of lives of teachers who served as role	- Performance in classroom discussions regarding teacher role - Entry recorded in Reflective journal

	▪ Maxims of Teaching ▪ Classroom types ▪ Face-to-face ▪ Distance mode ▪ Blended learning ▪ Virtual Learning Environment	models Views films related to lives of teachers Reads stories about lives of great teachers Web-based resources	

Unit II : Nature and Scope of English Education (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Gathers knowledge about meaning , nature and characteristics of language 2. Grasps current status of English in India and its importance	▪ Language ▪ Morphology ▪ Phonology ▪ Syntax ▪ Semantics ▪ English as global language ▪ World Englishes ▪ First Language ▪ Second Language • Foreign Language ▪ Utilitarian aim ▪ Objectives of teaching English in India	Brain storming Quiz Discussion	▪ *Examine level of participation ▪ *Role performance analysis ▪ *Evaluation based on documentation **CE Test - I**

Unit III: Language Theories and Psychological Principles (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops the ability to apply the principles of language teaching	- Behaviourism -Imitation -Repetition -Reinforcement - Cognitivism -Schema - Constructivism-ZPD-Scaffolding -Mental Processes - Chomsky -LAD-Universal Grammar - Krashen's Hypotheses	Brain storming Quiz Discussion Assigned readings from the works of theorists Group discussion	*Examine level of participation *Evaluation based on documentation *Examine student report *Address the level of pupil involvement in Group Discussion **CE - Practicum**

Unit IV : Approaches and Methods (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with traditional approaches and methods of language teaching 2. Updates Knowledge of current approaches and methods	- Approach - Method - Technique - Grammar Trans. Meth. - Bilingual Meth. - Direct Meth. - Audio-lingual Meth. - SOS Approach	Demonstration of steps followed in different methods Watching video recordings	- Evaluate the competence to compare and contrast - Monitor the ability to distinguish between similar concepts, phases

		Communicative Approach		

3.	Develops the ability to choose the most suitable method for a given content or group of learners	• Communicative Approach ▪ Humanistic approaches -TPR -Silent Way -CLL -Suggestopaedia ▪ Multiple Intelligence ▪ Neurolinguistic Programming ▪ Task Based Language Teaching	Accessing Online input on the topic Co-relating class room activities	▪ **CE - Seminar**

Unit V: Strategies for Developing Language Skills and Communication Skills (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
(Four Skills) 1. Develops Knowledge of four skills and their sub skills (Comm. Skills) 2. Develops Knowledge related to aspects of communication 3. Familiarizes with different ways of communication	▪ (Four Skills) ▪ Listening ▪ -Discriminate: Word forms, ▪ Sounds in connected speech, Stress, Accent, Intonation ▪ Speaking ▪ -Producing sounds in meaningful chunks ▪ -Stress, rhythm and intonation ▪ -Convey information ▪ -Formulate response ▪ Reading ▪ -Recognize word/letter, meanings of words ▪ -Chunking in sense groups ▪ -Interpreting discourse ▪ Writing ▪ -Punctuation	(Four Skills) Tasks -Individual -Pair -Group Presentation of good models	(Four Skills) • Use of Checklist to monitor, rate performance in each skill ▪ *Use of Assessment Rubrics ▪ (Comm. Skills) ▪ *Monitoring performance of communicative tasks ▪ *Performance Rubrics ▪ **CE – Test II**

	▪ -Phrase ▪ -Sentence ▪ -Organization ▪ -Linking of Paragraphs ▪ -Different discourses for communication ▪ -Structure and style ▪ Creative writing ▪ Academic writing ▪ (Comm. Skills) ▪ Communication Cycle ▪ Barriers to Comm.: ▪ -Linguistic ▪ -Psychological -Physical Verbal Com. Oral: Dialogue, Conversation, Phone call, Interview -Written: Letter, Memo, Reports Non-verbal Com.-Body language: eye contact, facial exp., gesture, posture, space	Use of multimedia resources Language Lab activities Online resources Commercially available resources (Comm. Skills) Introductory lecture Observation of video clips Communication tasks: Oral and written Print versions of texts focusing on communication Handout on components of specific skills	

Suggested References

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- The causes of High and Low Reading Achievement Ronald P. Carver, LEA, New Jersey, 2000
- Teaching Language Arts Carole Cox, Allyn & Bacon, Boston, 2002
- BBC World Service: Learning English
  http://www.bbc.co.uk/worldservice/learningenglish/index.shtml
- Dave Sperling's ESL Café
  http://www.eslcafe.com/
- FRET (Free Resources for English Teaching)
  http://www.english-teaching.co.uk/
- Web English Teacher
  http://www.webenglishteacher.com/

EDU - 04.3: THEORETICAL BASE OF HINDI EDUCATION – I

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

The student teachers:

1. Understand the significance of aims of teaching Hindi
2. Attain the ability to enhance language skills and communicative skill in Hindi
3. Familiarize with the qualities, competencies and duties of teacher
4. Update knowledge about modern trends and methods of teaching Hindi
5. Familiarize with various instructional organizers for transaction
6. Acquire knowledge on Psychological theories and their classroom implications

Contents

Unit I	**: General Introduction to the Process of Teaching – Learning**
Unit II	**: Nature, Scope and Development of Hindi Language**
Unit III	**: Aims, Approaches and Taxonomy of Teaching Hindi**
Unit IV	**: Methods and Teaching Strategies of Language Learning**
Unit V	**: Models of Teaching**
Unit VI	**: Psychological Theories Associated With Language Learning**

Unit I : General Introduction to the Process of Teaching – Learning   (13 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Acquire knowledge about the importance of language and concept of Universal Grammar 2. Sort out the concept and process of teaching-learning 3. Provide the Teacher-profession aspirants a smooth entry into knowledge/ functional plane of teaching and learning 4. Adapt the changing structure of the concept of classroom instruction 5. Familiarize the qualities, competencies and duties of teachers and to study the problems faced by teachers in handling Hindi	▪ Language---Its importance---Definition---Noam Chomskian theory of Language; Universal Grammar**---** Importance of Hindi Language instruction ▪ Teaching-learning process; Tri polar process; Role of Learner, Role of Teacher as scaffolder, mentor, facilitator, social engineer and reflective practitioner ▪ Interdependence of teaching and learning— ▪ Basic Teaching Model of Glazer, concepts and definitions of "Learner, Learning, and Teacher" from different point of views, ▪ Maxims of Teaching for the promotion of learning and learner autonomy ▪ Changing concepts of classroom environment-classroom climate, classroom as a social laboratory, classroom without walls (CWW), Blending of synchronous and asynchronous mode of learning, Virtual Learning Environment (VLE) ▪ Characteristics and qualities of teacher - Special and General qualities, Duties and responsibilities, ▪ Problems and difficulties faced by Hindi teachers in handling Hindi	Group Discussion Library work Assignments Dictionary and Online referencing Introducing different roles of teacher Discussion Demonstration Inductive method Virtual learning Peer instruction Debates Small group discussions Projects Seminars	• Analysis in Group discussion • Role performance • Assessment of expressing ideas through suitable examples • Participant Observation • **CE-1 (SEMINAR-1)** • Assessment of way of expressing ideas &thoughts **Practicals** ▪ Observation of model video lessons ▪ Assessment of projects, seminars

Unit II: Nature, Scope and Development of Hindi Language   (17 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Grasp the scope and importance of learning Hindi 2. Identify the Problems of teaching Hindi as second language in Kerala 3. Acquire the ability to develop language skills and communicative skill in Hindi	▪ Importance of Hindi language- characteristics of Devanagiri script ▪ Multilingualism in India; place of Hindi - Hindi as a national language; official language / link language ▪ Place of Hindi in non-Hindi speaking areas with special reference to the Kerala State ▪ Changes and development of Hindi in Kerala in the past 15 years ▪ Three language formula :- ▪ Commissions and Reports ▪ Principles of teaching Hindi language, ▪ Problems of teaching Hindi as second language in Kerala ***Enhancing Language Proficiency in Hindi*** (i) Listening Comprehension skill: - Listening and reporting taped stories, speeches, and news,reports,commentaries in Hindi on channels (ii) Speaking skill : - Conversation, discussion in groups, dramatisation, questioning and answering in Hindi, role playing, dialogue practice; conducting drills for pronunciation,conducting debates,seminars and brainstorming, etc. for the development of speaking skill (iii) Reading skill: -Different methods of reading – chunking,skimming,scanning, individual and group work -Silent and loud	Group Discussion Library work, Project Assignments Critical study, Research Books, Journals & Online referencing Research work, Project Exercises and drills for enhancing Language skills Arranging class library, reading corner Writing copy book,charts for practicing MANAKLIPI,	▪ Analysis of group discussion ▪ Assessment of online sources and other references used ▪ **CE-2 (PRACTICUM-1)** ▪ Language skill assessment ▪ Assessment of MANAKLIPI ▪ Monitoring communicative tasks ▪ Evaluating the ▪ quality and applicability of materials prepared

	reading, intensive and extensive reading, Body language,gestures,Eye contact,speed,postures (iv) Writing skill: - Methods of writing, writing standardized form of script, punctuations, characteristics of good handwriting - legibility, beauty, proportion and speed - Handwriting scales - spelling and -causes of mistakes - transcription and dictation, Resume Writing ,Note Taking, Report Writing, Writing Minutes of Meeting (v) Presentation skill:- Speaking with Confidence, Situational Conversation, Extempore, Paper Presentation, Integrating relevant technology for effective presentations, Telephonic Conversation, Seminar, Group Discussions, Debating Conferences, Symposia, Panel Discussion. (vi) Vocabulary Acquisition :- Significance and analysis of Vocabulary acquisition through various activities,Methods for teaching New words and its meanings (vii) Communicative Hindi :- Techniques to develop skill in communicative Hindi; use of Hindi language in different situations,Public speaking,and Use of technical words	Creative writing, Literary competitions, Preparation of Dictionary, Thesaurus, Encyclopedia, Communicative Approach, Report on visit to central government offices, Language Institutes, Preparation of mini book consisting of technical words in Hindi	

Unit III: Aims, Approaches and Taxonomy of teaching Hindi   (14 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Gather 2. information about the aims of Teaching Hindi 3. Familiarize various instructional organizers for transaction	Aims of Teaching Hindi ▪ Linguistic aim - Acquisition of language skills, Function and development of vocabulary in day to day life. ▪ Literary and cultural aim – Mental and childhood development; developing creative efficiency ▪ Integration aim - Hindi for national integration; Unity in diversity. ▪ Concept of objective-based teaching; Taxonomy of educational objectives-Bloom's taxonomy – revised form (Anderson & Krathwohl) with special reference to 'Create' objective -Technology integrated taxonomy – Collins et al.- Higher Order Skills---Analysis, Synthesis, Evaluation and its applications ▪ Role of Information and Communication Technology (ICT) in Hindi learning , ▪ Preliminary concepts of Constructivism,Social Constructivism,Problem Based Instruction, Critical pedagogy -,Eight Major Issues adopted on the basis of Issue Based Instruction at secondary school level in Kerala State Syllabus, Co-operative learning, Collaborative learning , and their relevance to language teaching	Group Discussion Library work Assignment Scaffolding Peer instruction Brainstorming Computer assisted instruction Preparation of learning materials for computer assisted instruction Brain storming, Identification of problems Problem-solving	▪ Analysis in group discussion ▪ Assessment of assignments ▪ Assessment of CAI materials ▪ Evaluating suitability & practicability of computer assisted learning materials ▪ **CE-3** **Internal Test-1** **(UNIT 1,11& 111)**

Unit IV: Methods and Teaching Strategies of Language Learning (16 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To become conversant with modern trends and methods of teaching and how they are employed in Hindi instruction 2. Familiarize with various forms of discourses for language learning 3. Update knowledge about modern trends and methods of teaching Hindi	▪ Teaching tactics, teaching methods, teaching techniques ▪ Phases of teaching - Pre-active phase, Interactive phase, Post-active phase ▪ Different methods and approaches – Direct method, Indirect method (grammar - translation), Structural method, Inductive-deductive method, Play way method, Activity method, Project method, Heuristic method, Montessori method, Kindergarten method, Basic Education, Daltan plan,Integrated Approach, Interactive approach - a critical study of these methods for the teaching of Hindi. ▪ Discourse oriented learning Discourse oriented learning--- Importance to various Discourses viz., prose,poetry,diary writing,poster,news,report writing,letter writing-formal and informal letters Aims of teaching various discourses ▪ Teaching of prose – (a) Language aspect - skills,vocabulary, grammar (b) Social aspect - language for interaction, cultural development, intellectual growth. ▪ Teaching of poetry - appreciation of rhythm, sound ,ideas, emotions, etc., development of creativity.	Constructivist approach of knowledge generation Plan preparation Demonstration Comparative & critical study on various methods and approaches Demonstration Learning through various discourses Transfer of discourses Assignments & Library work Narrative Expression Sessions in small or medium groups Dramatization and miming.	▪ Pee & tutor assessment ▪ Discourse analysis ▪ Identifying the grammatical errors and remedial measures ▪ Evaluation of story writing, ▪ Composition, ▪ Evaluation of activities for creative writing ▪ Assessment of writing different forms of Letters,Posters, ▪ Diaries,Notices, ▪ Brouchers ▪ Evaluation of Power Point presentation ▪ Assessment using online resources like Moodle etc

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	▪ Teaching of grammar – Need and significance of teaching grammar - formal and functional grammar - different methods of teaching grammar-Inductive and Deductive method,GroupInvestigation, Communicative Approach ▪ Creative Writing **:-** Developing creativity through various activities-aims of story writing,different methods, aims of writing composition- different methods-guided and free composition ▪ Letter writing**-**Structure &Body of letter, practicing letter writing for various contexts ▪ Preparation of Posters, Notices, Broachers ▪ Modern trends and methods of teaching Hindi Language games, computer-assisted instruction, sheltered instruction, programmed instruction, instructional module, simulated teaching, audio-video lessons, use of audio-visual aids, ,Edusat, video conferencing, online resources, Importance of Language lab in Hindi Instruction – Practice in using language lab- familiarization of various functions of the instructor console-familiarization of various functions of the student console	Activities for the development of Aesthetic & creative emotions. Application of grammar in appropriate situations. Discriminatory analysis, Activities & competitions for Creative writing, Practicing Formal and Informal Letter , Preparation of modules, learning packages & Power point presentation, Online chatting and interaction with native speakers of Hindi. Listen, Speak, Read, Write, Repeat, Record	

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Unit V: Models of Teaching (12 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarize with different types of models in effective language teaching	▪ Models of Teaching – Concept and definition, Dimensions of a model, Classification of models, types, families, Designing of important Models that can be effectively used in language learning – Concept Attainment Model, Advance Organizer Model, Role-Play Model, , Inductive –Deductive Thinking Model, Synectics Model – theory and classroom practices, preparation of lesson templates for each model	Meaningful Verbal Learning Group Discussion Brain Storming Interactive Sessions	**Practicals** ▪ Preparation of discussions lessons based on models of teaching ▪ Demonstration lessons on models of teaching Assessment of lesson plans using different models of teaching

Unit VI: Psychological Theories Associated with Language Learning (12 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Provides knowledge on Psychological theories and their classroom implications	▪ Theories- concepts and implications of Bruner, Piaget, Gardner, and Vygotsky- Importance of Mental Process, Multiple Intelligence, Emotional Intelligence, Holistic Approach, Motivation in learning- Significance of these theories in present education system ▪ Brain Based Learning---Principles, Strategies	Comparative study Discussion Seminar	▪ Analysis of implications of theories and concepts ▪ Assessment of Seminar ▪ **CE-4 - Internal Test-2 (UNIT 1V,V& V1)**

Suggested References

- Acharya Chatursen,Hindi Sahitya Ka Parichay
- Acharya Nandu Dulare BajPeyi,Hindi Sahitya Ka Samshiptha Ithihas
- Acharya Sitharan Chaturvedi,Bhasha Ki Shiksha
- Dr.G.C.Bhattacharya,Adhyapak Shiksha,Vinod Pustak Mandir,Agra
- Dr.Bholanath Tiwari,Hindi Bhasha Shikshan
- Dr.Satyanarayan Dube,Shikshan Vidhiyam Aadharbhhoth Thatv
- Dr.ShailendraBhooshan,Shikshan Adhigam Ke
- Bhai Yogendrajith, Hindi Bhasha Shikshan, Agrawal Publications,Agra
- Dhirendra Varma,Hindi Bhasha Aur Lipi
- Dinesh Chandra Bharadwaj,Basic Shiksha Manovigyan, Agrawal Publications,Agra
- Durgesh Nandini,Hindi Shikshan,Sumith Enterprises
- Prof.Ganesh Prases Sidha,Bhasha Shikshan Nidhi
- Kamatha Prasad Guru, Hindi Vyakaran
- Dr.K.P.Pandey,Shiksha mem Kriyatmak Anusandhan
- Dr.S.S.Mathur,Shikshan Kala Eevam Naveen Padhathiyam, Agrawal Publications,Agra
- Dr.S.N.Mukherji,Rashtra Bhasha Ki Shiksha
- Dr.Naresh sharma,Shikshan Ki Avasthayem.Vigyan Bharathi,Gaziabad
- Dr.Ramshakl Pandey, Hindi Bhasha Shikshan
- Dr.Sreedharananda Mukherji,Rashtra Bhasha Ki Shiksha
- Dr.Sitaram Jaiswal,MahendraPal Sharma,Shiksha Ke Thatwik Sidhanth
- P.D.Patak,Shiksha Manovigyan, Agrawal Publications,Agra
- P.G.Kamath,Anya Bhasha Shikshan Eak Bhasha Vaigyanik Drishti
- Raveendranath Sreevastav,Bhasha Shikshan,Vani Prakashan,New Delhi
- K.M.Siva Ram Sharma,Hindi Shikshan Kala
- Sadde,Rashtra Bhasha Ka Adhyapan
- B.L.Vats, Hindi Shikshan, Agrawal Publications,Agra
- Devanagari Lipi Tadha Hindi Varthani,Kendriya Hindi Nideshalay,Hindi
- Rashtra Bhasha Bharathi (Patrika),Griha Mantralay,Bharat Sarkar

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- Marsha Weil, Joyce Bruce.Models of Teaching.New Delhi:Prentice Hall of India.Ltd.
- Hand Books in Hindi,s Kerala State Syllabus,SCERT
- Text Books in Hindi,Kerala State Syllabus,SCERT
- National Curriculum Framework,NCERT (2005),NewDelhi
- Kerala Curriculum Framework,SCERT,Thiruvananthapuram
- Report of Education Commission (Kothari Commission).Govt.of India
- Report of the Official Language Commission
- http://ask.metafilter.com/149992/What-are-the-best-resources-for-learning-Hindi
- www.wikipedia.com
- http://www.transparent.com/learn-hindi/
- http://learnelearning.com
- http://www.uni.edu/becker/hindi.html

EDU - 04.4 : THEORETICAL BASE OF SANSKRIT EDUCATION – I

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

- To acquaint with the knowledge of teaching and learning of Sanskrit
- To acquaint with the nature and scope of Sanskrit
- To familiarise with the psychological theories and its application of Teaching Sanskrit
- To understand different methods and strategies of teaching Sanskrit and to understand the theoretical bases of major approaches
- To understand different types of models of teaching
- To understand the theory of skill acquisition

Contents

Unit I	: **General introduction of teaching and learning Sanskrit**
Unit II	: **Nature scope and significance**
Unit III	: **Aims, objectives and taxonomy of learning Sanskrit**
Unit IV	: **Methods and strategies of Sanskrit**
Unit V	: **Models of teaching in Sanskrit instruction**
Unit VI	: **Teaching skill - application of relevant psychological theories**

Unit I - General Introduction of Teaching and Learning Sanskrit (9 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the knowledge of teaching and learning of Sanskrit	Teaching learning process – teacher as a professional-teacher competencies and roles knowledge workers facilitator, scaffoilder mentor- social engineer and reflective practitioner- knowledge about Sanskrit as a classical language- literature	Meaningful verbal expression - Narrative expressions Presentation –	-Discussion - -Analyse the performances- -Participant - Observation –

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	▪ Learner ▪ Definitions of learning -Maxims of learning – changing concepts of class room environment – Teacher cantered to Student cantered.	- Makes trainee recall qualitites of teachers whom they admire- - Dramatization and Mining-	▪ -Debating- ▪ -Entry recorded in reflective journal-

Unit II- Nature Scope and Significance (9 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the nature and scope of Sanskrit	▪ Learning Sanskrit – its significance – historical background, world language- cultural language- link with other languages modern and classical comparison with each contribution to other languages and literatures – Its importance in modern society contribution of Sanskrit to various subjects	-Meaningful verbal expression - -Group discussion - -Narrative expression- -Collection of literature-	▪ -Role performance - ▪ -Analysis of group discussion- ▪ -Individual assessment- ▪ References- ▪ **Seminar (CE)**

Unit III - Aims, Objectives and Taxonomy of Learning Sanskrit (19 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise with the psychological theories and its application of Teaching Sanskrit	• Aims, objectives (learning out comes)- Bloom's taxonomy (revised) concept of objective based instruction and evaluation- -instructional objectives and specification of Sanskrit- • -Behaviorism (skinner- pavlov – thorndike) • Coginitivism (bruner - piaget) • Constructivism (Vygoski, Gardner) • Issued based instruction- eight major issues stated in issue based instruction-	-Discussion- -Collaborative learning- -Participant observation- -Analyse and peer instruction- -Narrative expression and self experience- -Critical thinking- -brain storming- -document analysis- -peer instruction-	• -Analysis and group discussion- • -Participant observation- • -Optional level focused group discussion- • **TEST – I (CE)**

Unit IV- Methods and Strategies of Sanskrit (19 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand different methods and strategies of teaching Sanskrit and to understand the theoretical bases of major approaches	• General principles and methods of languages	-Meaningful verbal expression-	• -Role performance- • -Analysis in group discussion – • -Participant observation –

| | Learning with special reference to Sanskrit – psychology of language learning – functions of language learning maxims of language learning – theories of language learning – teaching of prose poetry, grammar and composition, methods of teaching

• Sanskrit – ancients methods (Gurukula medieval – Bhandarkar- text book -- direct method etc) New methods (play way, project, heuristic etc)

• Issue based and critical pedagogi | -Group discussion-

-Narrative expression session in small or medium groups –

Dramatization-

Presentation-

Play way method- | • -Optional level focused group discussion-
• Roll performance-
• **Practicum (CE)** |

Unit V - Models of Teaching (14 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand different types of models teaching	• Concept Attainment model • Inquiry Training model • Advance Organizer model • Inductive and Deductive model	-Group discussion- -- narrative expression - -Presentation – - meaningful verbal expression-	• Role performance –-analysis in group --discussion participant observation – • Role performance-

Unit VI - Teaching Skill - Application of Relevant Psychological Theories (14 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the theory of skill acquisition	• Language skills acquisition–listening and reading skills, techniques to attain these skills, different kinds of reading, methods of teaching- importance of pronunciation sounds- organization of speech – training for correct pronunciation etc • Productive skills –speaking and writing skills, their importance, peculiarities causes of bad spelling training for spelling correction. Application of relevant psychological theories in Sanskrit teaching. Importance of motivation- re-enforcement- readiness exercise- learning related concepts.	-Narrative expression- -Group discussion – -Personal assessment- -Roll play-	• -Participant observation - • -Performance • Analysis – • -Individual assessment- • -Assessment of optional note book entries- • Recording- • Role performance- • **TEST – II (CE)**

References
- Teaching and Learning English a source book for Teaching and Teacher Training, Orient Long man, Hyderabad
- An introduction to Language and communication, Publisher prentice hall
- Active listening building skills, Marc Helgesen and steven Brown Cambridge
- Linguistics- An introduction to Language and communication, Advian Adkmajian and Others New Delhi
- The teaching of language a practical approach, B.N. Safaya
- The principle and methods of teaching, Bhatia and Bhatia
- Technology of Teaching, R.A. Sharma
- Models of Teaching, Bruce Joyce- Marsha Wein
- Introduction of Educational Technology, K. Sampath, a paneer Selvam, S- Santhanam
- Modern trends in teaching technology, Romesh Varma, Suresh sarma.

- Allen, D& Ryan.K (1969) Microteaching, London, Adison Wesley
- Mathrubhasha bodanamPravanathakalum reethikalum, Bindhu. C
- Taxonomy of Educational Objectives, Bloom. B.S
- Reflections on Language, Chom sky. N (1975)
- Audio- Visual methods in teaching, Dale 1961
- National curriculam frame work, NCERT(2005) New Delhi
- Kerala Curriculam Framework, SCERT Trivandrum
- Practical Sanskrit Grammer, PRD Sarma
- Tarkasamgrah, Annambhatta
- First book of Sanskrit and Second Book of Sanskrit, Bhandarkar
- A Sanskrit Grammer for Students, A macdoval
- Kuvalayanandam, Appayadikshita
- Vrtarathnakaram, Kedarabhatta
- Sidhanta Kaumudi, Bhattogi Dhikshidar
- Laghusidhanta Kaumudi, Varadaraja Panditan
- Rasa and Dhvani, Dr. A. Sankaran
- Kavya Pradasa, Mammatan
- History of Sanskrit Literature, Keith
- Sahithya dharpanam, Visvanatha
- Teaching Sanskirt with New Techniques, Prof. Chalana Sarma and Dr. Fathesingh (1996) (2008)
- Sanskrit Nirukta, N.K. Rajagopal
- The teaching of Sanskrit, Prof. K. Rama Varmaraja
- The teaching of Sanskrit, Prof. G. Sahadevan
- Lakhu samskritam, Dr. K.G. Poulose
- A Work book for Sanskrit Learners :   DPI 2012 General Education
- Abhyasamanjari   CD by DPA
- Vakyamritham   14 DVD by DPI
- Prayogaparichayam   2 CD –DPI

EDU 04. 5. - THEORETICAL BASES OF ARABIC LANGUAGE EDUCATION - I

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:
- To familiarize the student teacher with the functional aspects of teaching and learning and the divergent roles expected to be an Ideal Teacher
- To acquaint the student teacher with the   meaning , nature and characteristics of language
- The student teacher grasps knowledge about the nature and scope Arabic Language and its status in the present day world.
- Develops the ability to apply theories related to Language teaching
- Develops knowledge of acquisition of basic language skills
- Familiarizes with techniques of teaching language skills
- Familiarizes with traditional approaches and modern methods of language teaching
- Updates knowledge of current approaches and methods
- Develops the ability to choose the most suitable method
- Familiarizes with the modern strategies of language teaching and learning
- Updates knowledge of the current approaches as well as methods

Contents

UNIT 1	**: General Introduction to the Process of Teaching and Learning**
UNIT II	**: Arabic Language: Nature and Scope**
UNIT III	**: Theories Related to Arabic Language Teaching & Learning**
UNIT IV	**: Language Acquisition**
UNIT V	**: Methods & Approaches**
UNIT VI	**: Strategies of Teaching Arabic Language**

Unit I - General Introduction to the Process Teaching and Learning (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. The student-teacher familiarizes with the functional aspect of teaching and learning and the divergent roles expected to be an ideal teacher	• Teaching Profession • Professional traits and Competencies • Language teacher competencies • Arabic language Teacher: varying roles, his qualities-Knowledge worker, helper, scaffolder, mentor, social engineer, reflective practitioner • Teaching and Learning : its nature • Learner, Teacher, Classroom learning environment; CWW (classrooms without walls), VLE (Virtual Learning Environment) • Maxims of Teaching • Competency Based Language Teaching (CBLT)	Makes student review the qualities of teachers whom they admire, remember Narration, anecdotes of lives of teachers who served as role models Views films related to lives of teachers. Reads stories about lives of great teachers Web-based resources	▪ TE ▪ CE (assignment) ▪ (citing of examples, listing of teacher competencies and , identifying competencies, visiting and reporting various classes and reporting, assignments….

References

Al Muwajjah al fanni li mudarrisee al lugha al Arabiyya: Abdul al Aleem Ibrahim; Dar al Maa'rif, al Qaahira
Mushkilat thaa'leem al lugha al Arabiyya; Abbas mahmood, dar al ssaqfa, Qatar.
Tharaiq Thadrees wa statheejiyyathuhu" Dr. Muhammed Mahmood al haila , Dar al kitab al jamie'I,
Al Ain , UAE
"Tha'leem al lugha al arabiyya baina al nadriyya wa thatbeeq" Dr. Hasan Shahata, al dar misriyya al lubnaniyya.
" Al muallim al Najih" : Dr. Abdullah al Amiri, dar usama linnashri wa thaouzee'a
 " Asaleeb wa thuruqu thadrees al hadeesa" : Dr. Muhammed ussam tharbiya, Dar Hammurabi linnashri wa Tahouzee'a., Amman, Al Ardan

Unit II: Arabic Language: Nature And Scope (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. The Student Teacher acquaints with the meaning , nature and characteristics of language 2. Grasps knowledge about the nature and scope Arabic Language and its status in the present day world.	▪ Language : Meaning, definitions, characteristics and functions ▪ Morphology, Phonology, Syntax, semantics. ▪ First Language, Second Language & Foreign language ▪ Arabic as a Second language& foreign Language ▪ Nature and Scope of Arabic Language ▪ Need & Significance of Arabic Language teaching and learning ▪ Position of Arabic Language in the present day world ▪ Arabic in India and Kerala ▪ Aims and objectives of teaching Arabic Language ▪ Problems and difficulties of Arabic Language teaching and learning ▪ Place of Arabic in the state schools of Kerala	Discussion, Meaningful verbal learning Brain storming Group study and discussion Quiz Debate Interactive sessions	▪ Verbal and Written presentations ▪ Individual assessment ▪ TE ▪ **CE(Seminar)**

References

- "Thuruqu thadrees al llugha al arabiyya, fil madarisi al muthawassi ta wa ssanawiyya" : hasan Mulla Uthman, Dar Alam al kutub lithibaa' wa nnashrwathouzeea' , Riyadh, KSA
- "Tha'leem al lugathul araiyya ligairi nnathiqeena biha" , maktaab al tharbiya al arabi liduwali al khaleej, Riyadh, KSA
- Kitab al Mudarris lissafi thasia', Idarath tharbiya wa tha'aleem, 2010, Govt of Kerala.
- Al muallim al Najih" : Dr. Abdullah al Amiri, dar usama linnashri wa thaouzee'a

Unit Iii: Theories related to Arabic Language Teaching &Learning (9theory 10 + Ce 4)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop the ability to apply theories related to Language teaching	▪ Behaviorism ▪ Cognitivism ▪ Constructivism ▪ Social constructivism ▪ Chomskyan Concept : LAD & Universal Grammar ▪ Krashen's Theory	Discussion Seminar Brain storming Quiz Assigned readings from the works of the great Thinkers Group discussion	▪ Individual assessment ▪ Verbal and written presentations ▪ Participation in Group discussion ▪ TE ▪ **CE – Test -1**

References

▪ "Tha'leem al lugha al arabiyya baina al nadriyya wa thatbeeq" Dr. Hasan Shahata, al dar misriyya al lubnaniyya
▪ "Thatweeru Adae'l Muallim: Kifayathu tha'aleem wa tha'heel al muthawasil wal ishraf, hashim Uwadha, Dar al ilm lil malayeen, labnan
▪ Kitab al Muallim, lissaffil ashir, Govt. of Kerala, (2004)

Unit IV: Language Acquisition (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops Knowledge of acquisition of basic language skills 2. Familiarizes with techniques of teaching language skills	Language Acquisition ▪ Language Skills: LSRW ▪ Receptive skills& Productive skills ▪ Listening skill Significance of listening Teaching of listening skill ▪ Speaking: Importance of speaking Pronunciation Organs of speech Techniques of developing speaking skill Causes of bad pronunciation Techniques for teaching good pronunciation ▪ Reading skill: Importance of reading skill Types of reading : Loud Reading, Silent Reading; advantages Intensive reading, Extensive reading; advantages Techniques of teaching reading ▪ Writing Skill Importance of writing skill Types of writing Characteristics of good handwriting Techniques of teaching writing Dictation Creative writing Editing Process ▪ Reference & Study Skills Importance of reference and study skills	Introductory lecture Tasks: Individual/Group Presentation of good models Practice of Skills Use of multimedia resources Language Lab activities Online resources Commercially available resources Introductory lecture Observation of video clips Communication tasks: Oral and written Print versions of texts focusing on	▪ TE ▪ CE workshop ▪ Assignment work ▪ Presentation of Skills ▪ Assessment of presentation styles ▪ Originality of ideas and practices ▪ **CE- Practicum** ▪ Project work

	Use of dictionaries & encyclopedias Online references Note taking, Note making Summarizing	communication Handout on components of specific skills Language lab activities	

References

- "Tha'leem al lugha al arabiyya baina al nadriyya wa thatbeeq" Dr. Hasan Shahata, al dar misriyya al lubnaniyya
- Al Muwajjah al fanni li mudarrisee al lugha al Arabiyya: Abdul al Aleem Ibrahim; Dar al Maa'rif, al Qaahira
- " Al muallim al Najih" : Dr. Abdullah al Amiri, dar usama linnashri wa thaouzee'a, Amman Jordan.
- "Asaleeb wa thuruqu thadrees al hadeesa": Dr. Muhammed ussam tharbiya, Dar Hammurabi linnashri wa Tahouzee'a., Amman, Al Ardan
- Kaifa Thulqi darsaka: Manshoorat Dar Mataba al hayath, Bairut, Labanan

Unit V: Methods & Approaches (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with traditional approaches and modern methods of language teaching 2. Updates knowledge of current approaches and methods	▪ Methods, Approaches & Techniques ▪ Methods of Teaching Arabic : ▪ Traditional and Modern Methods ▪ Grammar Translation Method ▪ Bilingual Approach ▪ Direct Method ▪ Structural approach	Introductory lecture Demonstrations of steps followed in different methods Watching video recordings	▪ TE ▪ CE

			Accessing Online	
3.	Develops the ability to choose the most suitable method	▪ Communicative Approach ▪ Play way Method ▪ Project Method ▪ Role play ,Dramatization ▪ Learning by doing	input on the topic Co-relating class room activities Self regulated learning	▪ Discussion Report ▪ **CE - Seminar**

References

▪ Tha'leem al lugha al arabiyya baina al nadriyya wa thatbeeq" Dr. Hasan Shahata, al dar misriyya al lubnaniyya
▪ Al Muwajjah al fanni li mudarrisee al lugha al Arabiyya: Abdul al Aleem Ibrahim; Dar al Maa'rif, al Qaahira
▪ " Tharaiq Thadrees wa statheejiyyathuhu" Dr. Muhammed Mahmood al haila , Dar al kitab al jamie'I, Al Ain, UAE

Unit VI: Strategies of Teaching Arabic Language (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with the modern strategies of language teaching and learning 2. Updates Knowledge of the current approaches as well as methods	▪ Strategies of Teaching ▪ Discourse Based Learning & Teaching of Arabic ▪ Different Discourses in Arabic language: ▪ Dialogue \ Conversation, Poems, Story, Quran and Hadith (Classics) Narration, Speech (Khutuba), Correspondence (Murasalat), Essay(Maqala), Report, Notice, Proverbs, Puzzles & Jokes	Introductory lecture Demonstrations of steps followed Watching video recordings Practice under supervision and guidance	▪ Analysis of individual performance ▪ Presentation of skills ▪ Performance analysis ▪ TE ▪ **CE- Test/Model Exam** ▪ Project work ▪ (performance tasks)

| 3. Develops the ability to choose the most suitable strategies for classroom teaching | ▪ Techniques of Teaching Different Discourses
▪ Narrative Strategies
▪ Task Based Language Teaching
▪ Teaching without Text Books
▪ Strategies for Teaching Language Elements in Arabic:
Grammar:
▪ Formal and functional,
▪ Inductive and Deductive
Vocabulary :
▪ Teaching of Vocabulary: Importance of Vocabulary
▪ Strategies for enhancing Arabic Vocabulary | Accessing Online input on the topic

Co-relating class room activities

Discussion

Assigned readings

Group discussion | |

References

- Tha'leem al lugha al arabiyya baina al nadriyya wa thatbeeq" Dr. Hasan Shahata, al dar misriyya al lubnaniyya
- " Tharaiq Thadrees wa statheejiyyathuhu" Dr. Muhammed Mahmood al haila , Dar al kitab al jamie'I, Al Ain , UAE)
- "Tha'leem al lugha al arabiyya baina al nadriyya wa thatbeeq" Dr. Hasan Shahata, al dar misriyya al lubnaniyya
- Al Muwajjah al fanni li mudarrisee al lugha al Arabiyya: Abdul al Aleem Ibrahim; Dar al Maa'rif, al Qaahira
- Altharbiya wa thuruqu thadrees,Salih Abdul Azeez & Abul aziz Abdul Majeed , Dar al Ma'arif, Al Qahira .

EDU 04.6: THEORETICAL BASE OF TAMIL EDUCATION – I

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:
- To familiarize the student teacher with the functional aspects of teaching and learning and the divergent roles expected to be an Ideal Teacher
- To acquaint the student teacher with the   meaning , nature and characteristics of language
- The student teacher Grasps knowledge about the nature and scope Tamil Language and its status in the present day world.
- Develops the ability to apply theories related to Language teaching
- Familiarizes with techniques of teaching language skills
- Familiarizes with traditional approaches and modern methods of language teaching
- Develops the ability to choose the most suitable method
- Updates knowledge of the current approaches as well as methods

Contents

Unit 1	:	**General Introduction to teaching and learning**
Unit 2	:	**Nature, Scope and Significance**
Unit 3	:	**Objectives and specifications**
Unit 4	:	**Methods and strategies**
Unit 5	:	**Develop Language Skills**
Unit 6	:	**Application of relevant psychological theories in Tamil teaching**

Unit I : General Introduction to teaching and learning (12 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the aims of education 2. To enhance the competency of the language teacher in the concerned subject	▪ Introduction to professional teacher competencies - Education – definitions	Meaningful verbal expression	▪ Performance in classroom discussions regarding teachers role

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
3. To enable the student teacher in teaching learning process 4. To enable the student teachers to change themselves to meet the challenges of the changing environment	▪ Teacher of Tamil as knowledge worker, facilitator with interest in the language, knowledge about literature and grammar ▪ Process of teaching and learning ▪ Knowledge of psychological principles ▪ Classroom environment – teacher centered to student centered.	Makes trainee recall qualities of teachers whom they admire Views films related to lives of teachers Reads stories about lives of great teachers. Dramatization and miming	▪ Analysis in group discussion ▪ Debating and quizzes ▪ Entry recorded in reflective journal

Unit II : Nature, Scope and Significance (12 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the structure of Tamil language 2. To develop the vocabulary 3. Gather knowledge about the characteristics of Tamil language 4. To understand the special features of classical Tamil	▪ Language and its elements – Pronunciation, vocabulary, vocabulary expansion – classroom devices and exercises. ▪ Types of Tamil language – spoken Tamil – Colloquial to accepted forms – written Tamil ▪ Classical language characteristics of classical language Tamil as a classical language	Meaningful verbal expression Narrative self expression Meaningful verbal expression Collection of literary genre	▪ Role Performance ▪ **CE - Seminar** ▪ Individual assessment ▪ Role performance ▪ Assessment of references

Unit III : Objectives and specifications (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept of Bloom's taxonomy 2. To understand the application level of Bloom's taxonomy in classroom 3. To know the special features of higher order skills 4. To understand issue based instruction	▪ Concept of objective based teaching – Instructional objectives ▪ Taxonomy of educational objectives- revised from (Anderson and Krathwoh) Technology ▪ Objective based instruction Taxonomy of instructional objectives, specific objectives, behaviourism, cognitivism, constructivism, role of ICT in Tamil. ▪ Problem based instruction-eight major issues stated in issue based instruction.	Collaborative learning, Scaffolding, Debates, meaningful verbal expression, peer/instruction small group discussion Mental verbal expression Group discussion, conceptualization, sessions in small or medium groups Critical thinking, Brainstorming, Document analysis and peer/instruction	▪ Participant observation ▪ Optional level focused group discussion (e.g) changing classroom environment ▪ Etc (inconclusive) ▪ **CE – Test** ▪ **Practicals** o Development of ICT lessons o Video script

Unit IV : Methods and Strategies (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the teaching methods of prose and poetry 2. To understand the techniques of teaching grammar 3. To develop the communicative skills	▪ Teaching of poetry-objectives-methods-descriptive method-poets perspective-readers response-thematic reading ▪ Teaching of prose-objectives-methods-difference between teaching of prose and poetry ▪ Teaching of grammar-objectives-methods-deductive method-inductive method	Group presentation Play way method Dramatization	▪ Role performance ▪ Role performance ▪ Role performance

Unit V : Develop language skills (9 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept of teaching models 2. To understand the role of teaching models 3. To understand the language models	▪ Role play ▪ Listening – sub-skills of listening-activities-material for developing listening skill ▪ Speaking – sub-skills of speaking-activities-material for developing speaking skill. ▪ Reading – sub-skills of reading-activities-material for developing reading ▪ Writing-sub-skills of writing-activities-material for developing writing	Meaningful verbal expressions Group discussion Group discussion	▪ Role performance ▪ Analyzing group discussion. ▪ Analyzing group discussion. ▪ **CE - Practicum**

Unit VI : Teaching skills and Application of relevant psychological theories (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop teaching skill 2. To understand psychological principles	▪ Psychological principles in Learning and teaching ▪ Application of relevant psychological theories in Tamil teaching. ▪ Importance of motivation- readiness- reinforcement -Law of exercises- Learning related concepts.	Personal assessment Role play	▪ Recording ▪ Role performance ▪ **CE – Test/Model Exam**

References (Semester I & II)

- Rediyar, subbu N, Tamil Karpium Muraikal
- Rajan, Govinda M, Nattamil Karpithalum Muraikalum
- Ponnappan P, Tamil Paadam Cholum Murai (vol I & II)
- Nathan, Meenakshi S, Notes of Teaching Tamil, Manonmaniam sundarnar University Publication
- Parasuraman, S Tamil Kamithalil Paryerchikal
- Gurney P, Teaching of Mother Tongue
- Rylburn, Suggestion of Teaching of Mother Tongue
- Nathen, Meenakshi et al, Tamil Grammar of std VIII & IX (SCERT)
- Tamil Nadu Text Book society Publication, Tamil Grammer for std VIII & X
- Nannool Kaandikai Urai Pavanantham Pilla Commentary
- VisakaperimaiP, Annai llakkanaram. Saiva Sithandam Publication
- Iyengar, Ragava M. Porulathikara Arachichi
- Muthishanmugham, Thekkaiamoyliyiyai,
- Raja Ram, Tamil Phonetic Reader, Central Institute of Languages, Mysore
- Paranthamanar, A. Nalla Tamil Ezhuthu Karuthum
- Veluppillai, Tamil IIakkiyalin Kaalamum Karutum
- Varadarajan M, Tamil lakkiga Varalam, Sakitay Academy Pbulications

- Mandstein CH , Modern Language Teaching
- Rediyyar, Subbu, Tamil Karpikkum Muraikal
- Govinda Rajan, M Nattamil Pariyuttum Nookam Muriyum
- Govinda Rajan, M. Paliluttu Paiurchium, Mozchiaciriyar-Gazhumy
- Govinda Rajan, Mozhi Thiregalghum, Cila cikkalaga-lum
- Billows, The techniques of language teaching, New Delhi: Longmans
- Dalki J, The Language Laboratory and Language Learning. New Delhi: Longmans

EDU - 04.7: THEORETICAL BASE OF MATHEMATICS EDUCATION- I

Instructional Hours: 84 (Theoretical Discourses - 60 & Related Practical Work – 24)

Objectives

By the end of the course, the learner would be able to:

1. Understand the basic concepts in teaching and learning Mathematics.
2. Understand the Meaning, Definition, Nature, Scope, Characteristics and Development of Mathematics.
3. Appreciate the contributions of great mathematicians.
4. Get a clear perspective of values of learning Mathematics and correlation in Mathematics.
5. Develop the ability to write proper instructional objectives with special reference to Blooms taxonomy for teaching Mathematics.
6. Understand the importance of objective based instruction in Mathematics education.
7. Compare various methods, approaches, techniques and gain competence in using modern psychological theories in teaching .
8. Develop skill in preparing lessons for teaching Mathematics using appropriate methods, approaches, techniques and models of teaching
9. Understand the concept of micro-teaching.
10. Acquire knowledge of the basic skills needed for effective teaching.

Contents

UNIT 1	**: Introduction to Teaching and Learning Mathematics for a Novice**
UNIT II	**: Nature, Scope and Development of Mathematics**
UNITIII	**: Aims, Objectives, Chronological Development of Taxonomy, Constructivism and Cognitive Approaches to Learning**
UNIT IV	**: Methods, Approaches, and Techniques of Teaching Mathematics**
UNIT V	**: Models of Teaching**
UNIT VI	**: Teaching Skills and Mathematical Skills**
Unit VII	**: Application of Psychological Theories**

Unit 1: Introduction to Teaching and Learning Mathematics for a Novice (4 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise and develop general and specific competencies 2. To understand the various roles of mathematics teacher 3. To generate a knowledge of phases of teaching 4. To acquaint with classroom without walls 5. To understand the qualities of a good mathematics teachers	Concept of Basic Teaching Model of Glazer on Interdependence of Teaching and Learning ▪ Maxims of Teaching /Learning ▪ Concepts of Teacher as a professional – Teacher Competencies and roles-Knowledge Worker, Facilitator, Scaffolder, Mentor, Social Engineer and Reflective Practitioner ▪ Pre-active, Interactive and Post-active teaching (Phases of teaching), Teacher behaviour and Learning ▪ Concepts of Virtual Learning Environment (Class room without wall) ▪ Qualities of a good mathematics teacher	Meaningful Verbal Explanation Group Discussion Peer tutoring Project Power point presentation Assignments	▪ Performance assessment in group discussion ▪ Tests ▪ Peer evaluation ▪ Evaluation of project report

Unit II: Nature, Scope and Development of Mathematics (8 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To familiarise with various definitions of Mathematics
2. To understand the nature and scope of Mathematics
3. To understand the characteristics of Mathematics
4. To acquaint with development of Mathematics
	▪ Meaning and Definition of Mathematics
	▪ Nature and scope of Mathematics
	▪ Characteristics of Mathematics
	  - Language of Mathematics
	  - Role intuition, induction and reasoning
	• Development of Mathematics
	  - Human needs as the basis of growth of mathematics
		Meaningful Verbal Explanation
		
		Group Discussion
		
		Peer tutoring
		
		Lecture Method
		
		Project Method
			▪ Analysis of students Performance
			▪ Peer Evaluation
			▪ Poster Presentation

	- as science-reasoning, inductive, deductive - Axioms and postulates - Pure and applied ▪ Contributions of great Mathematicians- Euclid, Pythagoras, Rene Descartes, C.F. Gauss, Aryabhatta, Bhaskaracharya, Brahmagupta, and Sreenivasa Ramanujam ▪ Values of learning Mathematics- Utilitarian, Disciplinary, Cultural, Aesthetic, Social, Moral, International etc. ▪ Correlation of Mathematics with – life, other subjects and different branches of mathematics	Evaluation of reflective dairy Collaborative Interaction and Role Play Power point presentation Assignments Discussion Brain storming	
5. To inquire in to the contributions of great Mathematicians 6. To understand the values of learning Mathematics 7. To identify different types of correlation of Mathematics			

References

▪ Kumar,S.& Ratnalikar,D.N.(2003). *Teaching of Mathematics*. New Delhi: Anmol Publications Pvt. Ltd.

▪ Soman, K. *Ganitha sasthra bodhanam*.Thiruvananthapuram: Kerala Bhasha Institute

Unit III: Aims, Objectives, Chronological Development of Taxonomy, Constructivism and Cognitive Approaches to Learning (17 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To introduce the Blooms taxonomy of educational objectives under three domains 2. To familiarise with the revised version of Bloom's taxonomy of educational objectives 3. To compare and contrast the objectives of teaching mathematics listed in NCF and KCF	▪ Meaning of objectives. ▪ Instructional objectives and Specification-Definition and Meaning ▪ Concept of Objective based instruction ▪ Blooms taxonomy of educational objectives-Cognitive domain, Affective domain, and Psychomotor domain ▪ A conceptual overview of revised Bloom's taxonomy of objectives of teaching/ learning mathematics	Group discussions Seminars Meaningful verbal presentation point presentations Illustrations Seminars Group discussions Seminars	▪ Performance analysis in group discussions ▪ Observation ▪ Participation in the Seminar sessions ▪ Examples cited in their lecture note **CE - Seminar** ▪ Questioning ▪ Performance analysis in group discussions

	▪ Objectives of teaching mathematics as enumerated by NCF and KCF	Meaningful verbal presentation Power point presentations Illustrations Group discussions Seminars Role play Meaningful verbal presentation Collaborative and Cooperative learning strategies Powerpoint presentations Illustrations	▪ Observation ▪ Written test ▪ Participation in the Seminar sessions ▪ Examples cited in their lecture note ▪ Summative evaluation ▪ Performance analysis in group discussions ▪ Observation ▪ Participation in the Seminar sessions ▪ Examples cited in their lecture note ▪ dramatisation

References

- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications,Pvt Ltd.
- James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd.
- Mangal, S.K. *Teaching of Mathematics.* Ludhiana: Prakash Brothers Educational Publishers.
- Kumar,S.& Ratnalikar,D.N.(2003). *Teaching of Mathematics*. New Delhi: Anmol Publications Pvt. Ltd.
- Soman, K. *Ganitha sasthra bodhanam*.Thiruvananthapuram: Kerala Bhasha Institute.

Unit IV: Methods, Approaches and Techniques Of Learning Mathematics (22 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand various methods and approaches, useful for effective transaction of mathematics 2. To familiarise with various techniques useful for individualising Mathematics instruction	• Methods and approaches • Procedure, merits & demerits of: - Lecture method - Deductive methods - Analytic -Synthetic methods - Laboratory method - Project method - Heuristic approach - Problem solving method • Concept of Questioning • Features of good questions and good questioning • **Techniques for individualising instruction** - Assignments - Homogeneous grouping - Supervised study - Drill work - Dalton plan - Programmed instruction (Linear and Branched Programmimg) - Modular instruction - Computer Assisted Instruction (CAI)	Group discussions Role play Meaningful verbal presentation Collaborative and Cooperative learning strategies Power point presentations Group discussions Role play Meaningful verbal presentation Collaborative and Cooperative learning strategies	• Participant observation • Performance assessment in • Individual work and in • Group work. **(CE)- Test** Assessment of ICT & video scripts • Participant observation • Performance assessment in • Individual work and in Group Group **Practicals** • Preparation of computer/ICT enabled lesson • Preparation of video scripts and recording

References

▪ James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd.

▪ Mustafa,M.(2005). *Teaching of Mathematics.* New Delhi: Deep and Deep Publications Pvt. Ltd.

▪ Aggarwal, J.C. (2001). *Principles, Methods & Techniques of Teaching (2nd ed.).* New Delhi: Vikas Publishing House Pvt. Ltd.

▪ Mangal, S.K. *Teaching of Mathematics*. Ludhiana: Prakash Brothers Educational Publishers.

▪ Kumar,S.& Ratnalikar,D.N.(2003). *Teaching of Mathematics*. New Delhi: Anmol Publications Pvt. Ltd.

Unit V : Models of Teaching (15hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the concept and components of models of teaching with special emphasis to CAM, ITM	▪ - Concept of a model of teaching ▪ - Components of a teaching model ▪ - Families of teaching models ▪ -Detailed study and practice on Concept Attainment Model , Inquiry Training Model, Mastery Learning Model, Discovery Learning Model, Inductive Learning Model	Group discussions Role play Meaningful verbal presentation Collaborative and Cooperative learning strategies Powerpoint presentations Illustrations	▪ Performance analysis in group discussions ▪ Participation in the Seminar sessions ▪ Examples cited in their lecture note ▪ Assessment of lesson templates. **Practicals** ▪ Preparation of lesson templates using Models of Teaching (Discussion & Demonstration lessons)

References

- Joyce, B., Weil, M. & Calhoun, E. (2009). *Models of Teaching (8th ed.)*.New Delhi: PHI Learning Private Limited.
- Siddiqui, H.S. & Khan, M.S. (2004). *Models of Teaching - Theory and Research.* New Delhi: Ashish Publishing House.
- James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd.
- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications,Pvt Ltd.
-

Unit VI: Teaching Skills and Mathematical Skills (12 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To introduce the concept of Microteaching	▪ Teaching skills ▪ Concept of Micro teaching ▪ Need and importance ▪ Micro teaching cycle	Participatory Approach Group Discussions Meaningful Verbal	▪ Analysing the performance of Student teachers in group discussions and other activities ▪ Verbal or Written presentations

2. To identify the major skills in teaching mathematics 3. To understand various mathematical skills	▪ Major skills in teaching Mathematics like questioning, reinforcement, stimulus variation, using backboard, explanation etc. ▪ Mathematical skills ▪ Computation skill ▪ Geometrical skill ▪ Drawing and interpreting Charts, Graphs etc. ▪ Developing speed and accuracy in mathematics	Expression Brain Storming Session Demonstration Illustrations Assignments for Preparation of Lesson Transcripts Participatory Approach Group Discussions Meaningful Verbal Expression Illustrations Dramatization	on the topics learned ▪ Analysing the performance of Student teachers in group discussions and other activities ▪ Participation in the teaching and learning activities or strategies in the class **Practicum (CE)**

References

▪ James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications, Pvt Ltd.

▪ Aggarwal, J.C. (2001). *Principles, Methods & Techniques of Teaching (2nd ed.).* New Delhi: Vikas Publishing House Pvt. Ltd.

▪ Mustafa,M.(2005). *Teaching of Mathematics.* New Delhi: Deep and Deep Publications Pvt. Ltd.

▪ James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications, Pvt. Ltd.

Unit VII: Application of Psychological Theories (6 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the educational implications of the various psychological theories	▪ Educational implications of the Psychological theories of: - Piaget	Participatory Approach	▪ Analysing the performance of Student teachers in group discussions and other activities

	Group Discussions	Written test/CE
- Bruner - Gagne and - Vygotsky in the teaching of Mathematics	Meaningful Verbal Expression Illustrations Dramatization	▪ Participation in the teaching and learning activities or strategies in the class

References

- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications,Pvt Ltd.

- Aggarwal, J.C. (2001). *Principles, Methods & Techniques of Teaching (2nd ed.).* New Delhi: Vikas Publishing House Pvt. Ltd.

- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications, Pvt Ltd.

Suggested Readings

- Aggarwal, J.C. (2001). *Principles, Methods & Techniques of Teaching (2nd ed.).* New Delhi: Vikas Publishing House Pvt. Ltd.

- Ediger, M. & Rao, D. B. (2000).*Teaching Mathematics Successfully*. New Delhi: Discovery Publishing House.

- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications,Pvt. Ltd.

- James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd.

- Joyce, B., Weil, M. & Calhoun, E. (2009). *Models of Teaching (8th ed.)*.New Delhi: PHI Learning Private Limited.

- Mustafa, M.(2005). *Teaching of Mathematics.* New Delhi: Deep and Deep Publications Pvt. Ltd.

- Orton, A. (2007).*Learning Mathematics.(3rd ed.).* London: Continuum

- Siddiqui, H.S. & Khan, M.S. (2004). *Models of Teaching - Theory and Research.* New Delhi: Ashish Publishing House.

- Siddiqui, M. H. (2007). *Teaching of Mathematics*. New Delhi: APH Publishing Corporation.

- Wadhwa, S. (2000). *Modern Methods of Teaching Mathematics.* New Delhi: Sarup & Sons.

- Rao, D.B. & Pushpalatha, D.(1995). *Achievement in Mathematics.* New Delhi: Discovery Publishing House.

- Mangal, S.K. *Teaching of Mathematics*. Ludhiana: Prakash Brothers Educational Publishers.

- Kumar,S.& Ratnalikar,D.N.(2003). *Teaching of Mathematics*. New Delhi: Anmol Publications Pvt. Ltd.

- Soman, K. *Ganitha sasthra bodhanam*.Thiruvananthapuram: Kerala Bhasha Institute.

EDU - 04.8 : THEORETICAL BASE OF PHYSICAL SCIENCE EDUCATION - I

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

- To make the novice student-teachers understand the scope and nature of Physical Science teaching at different levels of learning
- To introduce the challenging career of Science Teacher with a futuristic perspective, as an agent of social change
- To acquire the fundamentals of theory and practice of principles and procedures of teaching and learning of Physical Science
- To develop an understanding of different methods and techniques possible in teaching and learning of Physical Science.

Contents

Unit 1	:	**General Introduction to the Process of Teaching and Learning**
Unit 2	:	**Nature, Development and Scope of Science**
Unit 3	:	**Aims and Objectives of Teaching Physical Science**
Unit 4	:	**Methods and Techniques of Teaching Physical Science**
Unit 5	:	**Models of Teaching in Physical Science Learning**

Unit I: General introduction to the Process of Teaching and Learning (10+2=12 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint student teachers with the process of teaching learning in the changing scenario. 2. To understand the concept of learning given by behaviourists, cognitivists and constructivists. 3. To familiarize the maxims of teaching 4. To identify competencies required for a teacher to be professional	▪ Teaching and learning- Interdependence, – Definitions of learning-behaviorist, cognitivist and constructivist points of view. Basic teaching model of Glaser – Maxims of teaching. ▪ Science teacher as professional – Teacher competencies – Techno pedagogical competencies, Multiple roles of teacher - Teacher as a leader, knowledge worker, facilitator, supervisor, mentor, scaffolder, social engineer and reflective practitioner .	Meaningful verbal expression Group discussion Narrative expression sessions in small or medium groups Video Streaming	▪ Analysis in group discussion ▪ Daily reflective journal ▪ Debate ▪ Participant observation ▪ Discussion **CE- Seminar**

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
5. To understand the changing roles of teacher in the present scenario. 6. To familiarize with the changing classroom environment	Changing concept of classroom environment.		

Unit II: Nature, Development and Scope of Science (10+2=12 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the nature of science 2. To familiarize the development of science in India and abroad. 3. To appreciate contributions of scientists in India and abroad. 4. To identify and highlight the contributions given by the women scientists in Kerala. 5. To familiarize the evolution of teaching of Science 6. To identify the role of Science for sustainable development.	▪ Nature of Science – Science as product and process. Development of Science – India & Abroad – Contribution of scientists – Einstein, Newton, Lavoisier, Mendeleev, Rutherford, C V Raman, M N Saha, P C Ray, Abdul Kalam, G Madhavan Nair , ECG Sudarshan; Indian Women scientists – Leelavathi, Kalpana Chawla, Sunitha Williams, Tessy Thomas ▪ History of Science Education-evolution of science teaching. Emerging branches of Science– Nanotechnology, Bioinformatics, Information technology, Geo informatics. ▪ Science for sustainable development	Group discussion Seminar Debate Creative blog Personality profile presentation Case Study Discussion	▪ Document analysis ▪ Posters ▪ Online assessment ▪ Quiz programme **Practicum - CE**

Unit III: Aims and Objectives of Teaching Physical Science (10+2= 12 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the values of science and its transactional potentiality.	▪ Science as an important subject – Values of science (Practical, disciplinary, social, moral, intellectual, and recreational values) and transactional potentiality.	Meaningful verbal expression Group discussion	▪ Participant observation ▪ Analysis in group discussion

2. To design different strategies to develop scientific attitude among learners. 3. To understand the importance of thinking skills in learning science. 4. To understand the aims and objectives of teaching Physical Science in secondary schools. 5. To understand different taxonomies	• Scientific attitude – Means for fostering them • Thinking skills – critical, reflective & creative. • Aims and Objectives of teaching Physical science with respect to NCF, KCF. • Taxonomy – origin – Bloom's taxonomy, 1956;Revised Taxonomy (Anderson & Krathwohl)1990; Mc Cormack & Yager's Taxonomy of Science Education,1989 ; Process skills; Technology integrated taxonomy – Peck & Wilson (1999).	Narrative expression sessions in small or medium groups Role Play/Skit Poster making Seminar Digital Presentation Blog Searching	• Debate • Assessment Test • Documentation • Blog Posting **CE - Class Test (01)**

Unit IV: Methods and Techniques of Teaching Physical Science (16+8=24 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand methods and techniques of teaching Physical Science.	• Teacher centered methods (lecture method, lecture – demonstration method & Historical method) and learner – centered methods (Individual laboratory method, assignment method, heuristic method, Development method, project method, Dalton plan Problem-solving method , Guided discovery, inductive method and deductive method • Scientific method-steps - elements of scientific method-logical aspects , Technical aspects, Mill's canons of induction, transfer of training • Techniques of teaching physical science – Buzz session, brain storming, simulation, role play, discussion.	Meaningful verbal expression Group discussion Small group sessions Peer instruction Brain storming Explicit Teaching	• Analysis in group discussion • Participant observation • Graphic Organiser Designing • MCQ based Discussion

Unit V: Models of Teaching in Physical Science Learning (12+10=22 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To understand the application of major psychological theories.
2. To understand models of teaching
	▪ Psychological theories for learning Science - Piaget, Bruner, Gagne, Vygotsky & Ausubel, Gardner's Multiple Intelligences theory
	▪ Models of teaching - Concept attainment Model, Inquiry Training Model, Advance organizer, Role Play and Constructivist.
		Group discussion
		
		Meaningful verbal expression
		
		Peer Tutoring
		
		Jigsaw reading
		
		Video Analysis
			▪ Analysis in group discussion
			▪ Class Test
			▪ Assignment
			▪ Analytical group discussion
			▪ Lesson Segment Preparation
			▪ **CE – Test/Model Exam**
			
			▪ **Practicals**
			  o Discussion lesson on models of teaching
			  o Criticism on models of teaching

References

- Benjamin Samuel Bloom (1956): Taxonomy of Educational Objectives: The Classification of Educational Goals (Vol.1): Green, Longman.
- Bhattacharya S. P. (1994): Models of Teaching: New Delhi, Regency Publications.
- Bruce R. Joyce, Marsha Weil and Emily Calhoun (2011): Models of Teaching (7th Ed.): USA, Pearson Education
- David Olson & Nancy Torrance(1996): The Handbook of Education and Human Development: Oxford, Blackwell Publishers
- Helaine Selin(1997): Encyclopedia of the History of Science, Technology and Medicine in Non-Western Culture: The Netherlands, Kluwer Academic Publishers.
- Kandi Jaya Sree & Digumarti Bhaskara Rao (2004): Methods of Teaching Science: New Delhi, Discovery Publishing House.
- Krishna Kumar (2005): National Curriculum Framework: New Delhi, NCERT , MHRD, Govt. of India.
- Parthasarathy R. (2000): Paths of Innovators In Science, Engineering and Technology: Chennai, East West Books Pvt. Ltd. Editors, ERNET (2007): The Torch Bearers of Indian Renaissance: Bangalore, Indian Institute of Science.
- Radha Mohan(2007): Innovative Science Teaching: New Delhi, Prentice Hall of India Pvt. Ltd.
- Tony Liversidge, Matt Cochrane, Bernard Kerfoot & Judith Thomas(2009). Teaching Science: New Delhi, Sage Publications India Pvt Ltd.

EDU - 04.9: THEORETICAL BASE OF NATURAL SCIENCE EDUCATION –I
Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

Enable the student teachers to:
- understand the scope and nature of Natural Science teaching at different levels of learning.
- acquire the fundamentals of theory and practice of principles and procedures of Teaching and Learning of Natural Science.
- understand of the concept of teaching- learning process.
- identify roles and competencies essential for a Natural Science teacher.
- understand and skill in selecting appropriate aims and objectives during teaching Natural Science.
- familiarize and apply the instructional management strategies of teaching Natural Science.

Contents

- **General introduction to teaching and learning for novice –**
- **Science –a conceptual analysis -The nature and development of science.**
- **Aims and objectives of teaching Natural Science –**
- **Methods and strategies for teaching Natural Science**
- **Models of teaching.**
- **Application of relevant Psychological theories in teaching Natural Science.**

Unit I: General Introduction to Teaching and Learning for Novice (10 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand classroom as an organization 2. To acquaint student teachers with the process of teaching learning in the changing scenario.	▪ **Classroom as an organization**-Teacher and Learner, Definitions of learning from different point of view (behaviouristic, cognitive and constructivist),Teaching-Learning process. Maxims of teaching. ▪ **Changing concept of classroom**	Meaningful verbal expression. Group discussion. Narrative expression sessions in small or medium groups.	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science diary.

3. To understand the concept of learning according to behaviouristic, cognitive and constructivist theories. 4. To familiarize the maxims of teaching 5. To identify the qualities and competencies required for a science teacher. 6. To understand the changing roles of teacher in the present scenario. 7. To familiarize with the changing classroom environment	**environment-** classroom climate- conducive, learner friendly and inclusive, classroom as a social laboratory, Virtual learning environment (VLE). ▪ **Teacher as a professional**- Teacher qualities, competencies and Role of Teacher as manager, leader, knowledge worker, guide, supervisor, mentor, scaffolder, social engineer, reflective practitioner and in different phases of teaching -Pre active Phase(planning),Interactive Phase (teaching),Post active Phase (evaluating)	Brain storming. Seminar. Reflective practices. Debate. PBL. Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	▪ Daily reflective journal ▪ Participant observation

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Unit II - Science –A Conceptual Analysis - Nature and Development (9-Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the nature of science 2. To familiarize the development of science in India and abroad. 3. To appreciate Contributions of scientists in India and abroad. 4. To familiarize the emerging branches of Science .	▪ **Nature of science**-Science as process(Scientific method ,Process skills) and products(Terms, Facts, Concepts, Principles, Process, Theories , Laws, and Generalizations). Scientific attitude ▪ **Development of science**- Path breaking discoveries and land mark developments of Biological Science in State, National and International level (Three from each). An introduction to Emerging branches of science- Biotechnology, Nanotechnology, Bioinformatics, Geo informatics. .	Group discussion Seminar Personality profile presentation Reflective practices. PBL Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	▪ Posters ▪ Online assessment ▪ Quiz programme. ▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior. ▪ student's portfolio. **CE-Seminar presentation (marks-5)**

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▪ Radha Mohan, (2007). *Innovative Science Teaching for Physical Science Teachers(3rd ed),* PHL learning, New Delhi.

▪ Jessy Mathews, (2008).*Teaching of Natural Science* –Theory, Perspectives and Practices. Methodology of Teaching Life Sciences

▪ R. Bharat Singh (2010). *Science Teaching in Schools*, Saurabh Publishing House, New Delhi.

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Unit III-Aims and Objectives of Teaching Natural Science (24 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the values of science and its transactional potentiality. 2. To design different strategies to develop scientific attitude among learners. 3. To understand the aims and objectives of teaching Natural Science in secondary schools. 4. To understand the aims and objectives of NCF and KCF. 5. To understand about the taxonomy of instructional objectives .	▪ **Broad aims of teaching Natural Science to fulfill the national goals of education** with special reference to developing scientific literacy(Practical, Civic and Cultural),Effecting social changes(promoting health and hygiene, Population control, Eradication of diseases, Better nutrition, Removal of superstitions),Raising the standard of living : bringing science to home and community(longevity of life, decreasing infant mortality rate, health index, better living conditions, role and functioning of community health centers),Self sufficiency in food, Modern agricultural practices-Agricultural management, Modern techniques of cultivation, Conservation of natural resources, Environmental awareness and concept of sustainability. ▪ **Aims and objectives teaching natural science with respect to NCF and KCF** ▪ **Taxonomy of Instructional Objectives**-Origin, Bloom's Taxonomy(1956) , Revised Blooms Taxonomy by Anderson and Krathwohl (2001), Classification by NCERT, Technology Integrated Taxonomy – (Peck & Wilson (1999) Mc Cormack and Yagar's classification,.	Meaningful verbal expression. Group discussion. Narrative expression sessions in small or medium groups. Brain storming. Seminar. Reflective practices. PBL. Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy. ▪ Daily reflective journal ▪ Participant observation. ▪ Student's portfolio **CE-Test No-1** **(including 1ˢᵗ,2ⁿᵈ and 3ʳᵈ chapters)- Marks-5** **CE-Practicum-Marks -5**

References

- Anderson,W.Lorin., and Krathwohl,David.R., A Revision of Bloom's Taxonomy for learning, Teaching and Assessing: A Revision of Bloom's Taxonomy for Educational Objectives Complete(Edn.)

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Unit IV-Methods and Strategies for Teaching Natural Science (24 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand and develop skill in selecting appropriate methods techniques, and strategies, of teaching Natural science.	- **Teacher initiated methods**- Lecture method, Lecture cum Demonstration, Biographical - **Student initiated methods**- Problem solving, Project method, Guided discovery, individual Laboratory and heuristic method - **Approaches-**Inductive-Deductive,Multimedia, Interdisciplinary and Constructivist approaches - **Techniques-** Seminar, Group discussion,	Meaningful verbal expression Group discussion Small group sessions Peer instruction Narrative expression sessions in small or medium groups. Brain storming.	- Participation in group discussion. - Questioning. - On-task behavior in class. - Tests. - Science diary. - Daily reflective journal - Participant - observation.

	Debate, Brain storming, peer tutoring, team teaching, concept mapping, role play ▪ **Self Instructional Strategies**- PI, CAI &Modules	Seminar. Reflective practices. PBL. Modular approach. Multimedia and interdisciplinary approach. Peer tutoring	▪ **Practicals** o Demonstration lesson-3, o Criticism*l*esson7-

References

- Carl simmons,Claire Hawkins,(2009). Teaching ICT-Developing as a Reflective Secondary Teacher , Sage South Asia education, New   Delhi.
- Norman herr *(2007)The Sourcebook for Teaching Science – Strategies, Activities, and Instructional Resources*, ISBN 978-07879-72981 [or 07879-72983] San Franciso,CA John Wiley/Jossey- Bass publishers.
- Sharma.R.C., (1975).ModeSrn Science Teaching, Danapat rai Publishing company limited,New Delhi.
- Jessy Mathews,(2008).Teaching of Natural Science –Theory, Perspectives and Practices, Methodology of teaching life sciences.
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- http://archive.org/stream/modernmethodsand029422mbp/modernmethodsand029422mbp_djvu.txt
- http://**books**.google.com/**books**/about/Modern_**Methods**_and_Mater...
- http://www.amazon.com/**Teaching**-Secondary-School-**Science**-Stra...
- http://www.ncert.nic.in/new_ncert/ncert/rightside/links/pdf/...
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Unit V - V Models of Teaching (Hours-17)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the basic elements in the models of teaching 2. To develop skill in selecting suitable models of teaching for transacting pedagogy. 3. To understand the application of major psychological theories	▪ Introduction, Elements and Families of models teaching-Concept Attainment Model(CAM),Inquiry Training Model(ITM), 5E Model of BSCS, Inductive Thinking Model , Role play model ▪ Application of Relevant Psychological theories in teaching Natural Science.(Piaget, Bruner, Gagne, Vygotsky ,Ausbel & Garner's Multiple intelligence theory .	Meaningful verbal expression Group discussion Small group sessions Peer instruction Narrative expression sessions in small or medium groups. Brain storming. Seminar. PBL. Modular approach. Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy. ▪ Daily reflective journal ▪ Participant ▪ observation. **CE-Test No.2,Marks-5 (including all chapters) Practicals** o Demonstration lesson-2 o Discussion lessons - 3 o Criticism lesson-3

References

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- Bybee, R., Taylor, J. A., Gardner, A., Van Scotter, P., Carlson, J., Westbrook, A., Landes, N. (2006). *The BSCS 5E Instructional Model: Origins and Effectiveness.,* Colorado Springs, CO: BSCS.
- Bybee, R.W., (2010), *The Teaching Science: 21st Century Perspectives,* Arlington V A: NSTA Press.
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- De Boer, G.E., Scientific Literacy : Another Look at its Historical and Contemporary Meanings and its Relationship to Science Education Reforms , Journal of Research in Science Teaching, 37(6), pp.582-601' 2000.
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EDU 04.10 - THEORETICAL BASE OF SOCIAL SCIENCE EDUCATION-1

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

- To develop a thorough understanding of the Nature, Scope and Development of Social Science
- To develop understanding about the aims and objectives of teaching Social Science at secondary level and to generate awareness about the taxonomies and its influence in the process of learning
- To identify relevant psychological theories and its application in the learning of Social Science
- To acquaint with different methods and strategies of teaching Social Science
- To acquaint with the principles of Models of teaching and to familiarize relevant models useful to Social Sciences

Contents

Unit 1	:	**Conceptual background, need and significance of Social Science**
Unit 2	:	**Aims and Objectives of teaching Social Science**
Unit 3	:	**Learning theories and the teaching of Social Science**
Unit 4	:	**Methods and Strategies of teaching Social Science**
Unit 5	:	**Models of teaching in Social Science**

Unit I –Conceptual background, Need and Significance of Social Science (14 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize meaning, definitions and nature of Social Science 2. To develop understanding about integration, correlation and fusion in Social science and its relation	▪ Definitions and meaning of Social science ▪ Social science & Social Studies ▪ Nature, scope, need, significance and values of teaching Social Science ▪ Fusion, Integration & Correlation within Social Science	Meaningful verbal presentation Collect definitions- discuss- generate ideas to differentiate Social Science and	▪ Assessment of learning process and reflections (role of the learner in discussion, collection of information, analysis and presentation)

with other subjects 3. To understand reasons for considering Social Science as a Core subject	▪ Social Science and relation with other subjects- Literature and Science ▪ Correlation of Social Science with life ▪ Meaning of Core subject ▪ Need of Social Science as a core subject in school curriculum	social studies- prepare brief note on nature and scope, need and values Lecture cum discussion- identify examples of fusion, integration and correlation in textbooks- analyse the mutual relationship with other subjects and with life as group task and present Identify the reasons through analyzing content from sources and discussion with teacher educator	

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▪ Kumar, S.P.K & Noushad,P.P.(2009). Social Studies in the Classroom: Trends andMethods.
▪ Kochhar, S.K. (2002). The Teaching of Social Studies.
▪ Aggarwal, J.C. (2003). Teaching of Social Studies: A Practical Approach.
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▪ Dash, B. N.(1998). Content cum Methods of Teaching Social Studies. Ludhiana: KalyaniPublishers.
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Unit II – Aims and Objectives of teaching Social Science (16 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the aims and objectives of teaching Social Science 2. To understand the taxonomy of educational objectives and behaviorist and constructivist approaches in formulating objectives	• Difference in aims & objectives • Individual , social, cultural, national & international considerations in social science • Taxonomy of Educational Objectives (revised) and domains • Instructional objectives and specifications (behaviorist approach) • Formulation of learning objectives based on cognitive/ constructivist approach	Lecture cum discussion- analyse the relevance of aims & objectives in Social Science as group task with material support Meaningful verbal presentation Compare different approaches and objectives in cooperative strategy-presentation-prepare notes	• Assessment of learning process and reflections **Internal test for 2 units** (CE-1)

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- Bining, A.C & Bining, D.H. (1952) Teaching Social Studies in Secondary Schools.New York: McGraw Hill
- Clark, L.H.(1973*). Teaching Social Studies in Secondary Schools.*(2nd Ed.)New York:McMillan.
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Unit III - Learning theories and the Teaching of Social Science (18 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the approaches of teaching Social Science as envisaged in NCF and KCF 2. To analyse the implications of learning theories in Social Science teaching	▪ New perspective of Social Science teaching- approaches & strategies based on NCF &KCF ▪ Skinner- Pavlov-Thorndike- Piaget-Bruner-Vygotsky- Howard Gardner their theories and its influence in curriculum & learning process ▪ Role of teacher, learner, Text book, Evaluation in Behaviourist and constructivist approaches	Lecture Seminar to present approaches of NCF & KCF--Group discussion & prepare notes Compare & prepare chart to differentiate both the approaches Examine the influence of modern learning theories in Social science school curriculum (Assignment)-Present one or two signments in class	▪ **Seminar** (preparation, presentation & Report)- **CE-2** ▪ Assessment of learning process and reflections

References

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Unit IV - Methods and Strategies of teaching Social Science (20 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the methods and strategies of teaching Social science 2. To analyse the suitability of methods and strategies in Social Science	▪ Lecture -Discussion -Problem solving- Project method-source method- debate- supervised study-role play- dramatization ▪ Cooperative & collaborative learning ▪ ICT enabled learning and Multimedia approach	Discussion and prepare notes on the principles, merits & limitations of each method- presentation Utilise ICT and Multimedia effect of teaching social science Prepare report on the suitability of traditional and modern strategies	▪ Assessment of learning process and reflections ▪ **CE-Practicum**

References

- Alexey Semenov, UNESCO, (2005): Information and Communication Technologies inSchools: A Handbook for Teachers.
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Unit V - Models of teaching in Social Science (16 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the models of teaching 2. To identify important models suitable in social science	- Concept and significance of Models of Teaching- Families- essential elements of models of teaching - Jurisprudential inquiry - Advance organizer - Group Investigation - Concept attainment	Meaningful verbal presentation Discuss the learning theories behind the models specified and prepare structure and lesson script of each model	**Practicals** o Discussion lesson-3 o Criticism lesson-3 o Demonstration lesson - 2 **Internal test for 3 units** (CE-3)

References
- Kumar, S.P.K & Noushad,P.P.(2009). Social Studies in the Classroom: Trends andMethods.
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EDU 04.11 THEORETICAL BASE OF GEOGRAPHY EDUCATION-1

Instructional Hours – 84 (Theoretical discourses – 60 & Related Practical work – 24)

Objectives:
- To develop a thorough understanding of the Nature and Scope of Geography
- To develop understanding about the aims and objectives of teaching Geography at secondary level and to generate awareness about the taxonomies and its influence in the process of learning
- To identify relevant psychological theories and its application in the learning of Geography
- To acquaint with different methods and strategies of teaching Geography
- To acquaint with the principles of Models of teaching and to familiarize relevant models useful to Geography

Contents

Unit 1	:	**Conceptual background, need and significance of Geography**
Unit 2	:	**Aims and Objectives of teaching Geography**
Unit 3	:	**Learning theories and the Teaching of Geography**
Unit 4	:	**Methods and Strategies of teaching Geography**
Unit 5	:	**Models of teaching in Geography**

Unit I - Conceptual background, Need and significance of Geography (14 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize meaning, definitions and nature of Geography 2. To develop understanding about integration, correlation and fusion in Geography and its relation with other subjects	Definitions and meaning of Geography ▪ Earlier and modern concepts of Geography ▪ Geography as an environmental science ▪ Nature, scope, need, significance and values of teaching Geography ▪ Fusion, Integration & Correlation of Geography in School Curriculum	Meaningful verbal presentation Collect definitions-discuss- generate ideas -prepare brief note on nature and scope, need and	▪ Assessment of learning process and reflections (role of the learner in discussion, collection of information, analysis and presentation)

	Relationship of Geography with other Social Science subjects	values of Geography Lecture cum discussion- identify examples of fusion, integration and correlation in textbooks- analyse the mutual relationship with other subjects and with life as group task and present	

References

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- Garnett, Olive. (1967) Fundamentals in School Geography, George G., Harrap and
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Unit II - Aims and Objectives of teaching Geography (16 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the aims and objectives of teaching Geography 2. To understand the taxonomy of educational objectives and behaviorist and constructivist approaches in formulating objectives	▪ Difference in aims & objectives ▪ Taxonomy of Educational Objectives (revised) and domains ▪ Instructional objectives and specifications (behaviorist approach) ▪ Formulation of learning objectives based on cognitive/ constructivist approach	Lecture cum discussion- analyse the relevance of aims & objectives in Geography as group task with material support Meaningful verbal presentation Compare different approaches and objectives in cooperative strategy-presentation-prepare notes	▪ Assessment of learning process and reflections ▪ **Internal test for 2 units** (**CE-1**)

References

- Arora, M.L.(1979)Teaching of Geography, Prakash Brothers, Ludhiana.
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Unit III - Learning theories and the Teaching of Geography (18 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the approaches of teaching Geography/ Social science as envisaged in NCF and KCF 2. To analyse the implications of learning theories in Geography teaching	▪ New perspective of Geography/ Social Science teaching- approaches & strategies based on NCF &KCF ▪ Skinner- Pavlov-Thorndike- Piaget-Bruner-Vygotsky- Howard Gardner- their theories and its influence in curriculum & learning process ▪ Dimensions of Daniel Golman's EQ ▪ Role of teacher, learner, Text book, Evaluation in Behaviourist and constructivist approaches	Lecture Seminar to present approaches of NCF & KCF Group discussion & prepare notes Compare & prepare chart to differentiate both the approaches Examine the influence of modern learning theories in Geography school curriculum (Assignment)- Present one or two assignments in class	▪ **Seminar** (preparation, presentation & Report)- **CE-2** ▪ Assessment of learning process and reflections

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Unit IV - Methods and Strategies of teaching Geography (20 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the methods and strategies of teaching Geography 2. To analyse the suitability of methods and strategies in Geography	▪ Lecture -Discussion -Problem solving-Project method-source method- debate-supervised study-role play- dramatization ▪ Techniques for Individualizing instruction- ▪ Cooperative & collaborative learning ▪ ICT enabled learning and Multimedia approach	Discussion and prepare notes on the principles, merits & limitations of each method- presentation Utilise ICT and Multimedia effect of teaching social science Prepare report on the suitability of traditional and modern strategies	▪ Assessment of learning process and reflections **CE- Practicum**

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Unit V - Models of teaching in Geography (16 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the models of teaching 2. To identify important models suitable in Geography	▪ Concept and significance of Models of Teaching- Families- essential elements of models of teaching ▪ Advance organizer ▪ Group Investigation ▪ Concept attainment ▪ Inquiry training	Meaningful verbal presentation Discuss the learning theories behind the models specified and prepare structure and lesson script of each model	**Practicals** ▪ Discussion lessons ▪ Demonstration lessons ▪ Criticism lessons –based on models of teaching **Internal test for 3 units** (**CE-3**)

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▪ Aggarwal, J.C. (2003). Teaching of Social Studies: A Practical Approach.

EDU 4.12 – THEORETICAL BASE OF COMMERCE EDUCATION 1

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

- To familiarize with the conceptualized version of components required to enter in teaching profession
- To mould the prospective teacher educators to uphold the professional spirit in diverse angles
- To equip with varied dimensions of commerce education strands
- To compete with constructs, aims and objectives of teaching commerce
- To gain an outlook of key ideology in behaviorism, constructivism and cognitivism in commerce education
- To analyze the unique features of different instructional methods suited for teaching commerce
- To proficient in select most appropriate teaching methods in varied context and content
- To opt and practice apposite techniques to extract process and product in commerce teaching
- To interlock 'models of teaching' in effective instructional practices of commerce education
- To compete with analyzing various attributes of Psychological theories in commerce education
- To equip them by applying Psychological principles for effectual curriculum transaction in commerce

Contents

Unit: 1	**: Interdependence of Teaching and Learning**
Unit: 2	**: Nature, Scope and Development of Commerce Education**
Unit: 3	**: Aims and objectives of Teaching Commerce**
Unit: 4	**: Instructional Methods and Techniques**
Unit: 5	**: Models of teaching**
Unit: 6	**: Psychological Theories and its application**

Unit I - Interdependence of Teaching and Learning (12 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize with the conceptualized version of components required to enter in teaching profession 2. To mould the prospective teacher educators to uphold the professional spirit in diverse angles	▪ Teaching as a profession, Teacher, Student, Instruction, Factors determine effective instruction, Interactions, Learning, Learning environment, classroom as a social laboratory, Teaching, Maxims of teaching ▪ Teacher as professional, teacher competencies, multifarious roles: knowledge worker, facilitator, scaffolder, mentor, social engineer and reflective practitioner.	Meaningful verbal presentation Brain storming Case analysis of 2/3 famous teachers Buzz session to generate varied roles of an ideal teacher	▪ Report writing and verification ▪ Case analysis presentation **CE-Seminar**

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- Rao, Seema(2005) Teaching of Commerce. New Delhi: Anmol Publications Ltd
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- Singh, V.K (2006). Teaching of Commerce. New Delhi: A.P.H.Publishing corporations.

Unit II - Nature, Scope and Development of Commerce Education (14 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the basic concepts of commerce as a discipline 2. To equip with varied dimensions of commerce education strands.	▪ Introduction to commerce as a discipline, Meaning and scope of commerce, Impact of commerce in the technological era. ▪ Commerce education: Meaning and Nature – both Academic and Vocational. Significance	Meaningful verbal learning Participatory	▪ Preparation of report on teacher Presentation

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		approach	**Internal tests for units 1& 2 (CE-1)**
3. To integrate essential inter disciplinary attributes in commerce education.	and Historical development of Commerce education. ▪ Values of commerce education. ▪ Interdisciplinary approach, Correlation with other subjects – Geography, Mathematics, Economics, and Statistics ▪ Consumer Education ▪ Entrepreneurship Education.	Co- operative learning Discussion	

References

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- Aggarwal, J.C. (1996) A Practical Approach. New Delhi : Vikas Publishing House Pvt. Ltd.
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Unit III - Aims and objectives of Teaching Commerce (12 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To compete with constructs aims and objectives of teaching commerce 2. To endow with the significance of Taxonomy of instructional objectives in commerce education	▪ Aims of Teaching Commerce ▪ General objectives of teaching commerce ▪ Bloom's taxonomy of Instructional objectives (Revised) ▪ Objectives –NCERT	General discussion Analytical study Group investigation Focus group discussion	▪ Comparison chart on Basic concepts of Behaviorism, constructivism and cognitivism and its analysis

3. To gain an outlook of key ideology in behaviorism, construction and cognitivism in commerce education	▪ Curricular objectives ▪ Principles of framing curricular objectives ▪ Basic concepts of Behaviorism, constructivism and cognitivism in commerce discipline		

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Unit IV - Instructional Methods and Techniques (16 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To analyze the unique features of different instructional methods suited for teaching commerce 2. To proficient in select most appropriate teaching methods in varied context and content.	▪ Methods of teaching – criteria for selecting appropriate instructional methods, Lecture Method, Project method, socialized methods, Problem solving method, Case study, Source method, Inductive and Deductive, Analytical and Synthetic method.	Seminar Debate Buzz session Quiz session Problem solving method	▪ Report presentation & verification ▪ **Seminar**(preparation, presentation & Report)- **CE-2**

3. To opt and practice appropriate techniques to extract process and product in commerce teaching	▪ Techniques of Teaching – Drill, Brain storming, Role play, Review, Dramatization, Buzz session, simulation, Quiz session.	Project method	

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Unit V - Models of teaching (18 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To interlock 'models of teaching' in effective instructional practices of commerce education. 2. To categorize, analyzes and applied the varied instructional models in commerce discipline.	▪ Models of teaching Introduction, Operational heart of teaching models, Different families. ▪ Concept attainment model, Advance Organizer Model, Cognitive Apprenticeship model, Group Investigation Model, Inquiry Training Model	Descriptive strategies Inductive approaches Meaningful verbal presentation Demonstration method Inquiry practices	▪ Models of teaching description table preparation and analysis **Practicals** o Discussion lesson-3 o Criticism lesson-3 o Demonstration lessons

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Unit VI - Psychological Theories and its application (12 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To compete with analyzing various attributes of Psychological theories in commerce education. 2. To equip them by applying Psychological principles for effectual curriculum transaction in commerce	▪ Psychological theories and its principles in teaching commerce with special reference to Piaget, Vygotsky, Gardner and Golman ▪ Key aspects of: assimilation, accommodation, equilibration. ▪ Zone of proximal development ▪ Components of multiple intelligence ▪ Dimensions of Daniel Golman's EQ	Experiential learning Collaborative learning. General discussion Scaffolding strategies	▪ Comparison grid ▪ Note preparation ▪ **Internal test for 3 units** (CE-3)

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EDU 04.13 : THEORETICAL BASE OF HOME SCIENCE EDUCATION - I

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives
To enable the student teachers to:
- familiarize the concept of teaching- learning process
- understand the nature and scope of Home Science
- get acquainted with aims and objectives of teaching Home Science
- identify and apply the different instructional strategies for pedagogic transaction of Home science
- understand and apply the different models of teaching in class room teaching
- to apply the relevant psychological theories in learning
-

Contents
UNIT I   : **General Introduction To Teaching And Learning For Novice (12 Hours)**
UNIT II   : **Home Science- A Conceptual Analysis (10 Hours)**
UNIT III   : **Aims and Objectives of Teaching Home Science (18Hours)**
UNIT IV   : **Methods and Strategies For Teaching Home Science (24 Hours**
UNIT V   : **Models of Teaching (12Hours)**
UNIT VI   : **Psychological Base of Teaching Home Science (8 hours)**

Unit I - General Introduction to Teaching and Learning for Novice (12 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To generate a knowledge of terminologies in and the interdependence of teaching and learning. 2. To familiarize and develop general and specific teacher competencies 3. To identify the role of teacher in different dimensions	▪ Concept of teaching and learning- its Interdependence – Classroom as an organisation, Teacher, Learner, Teaching-Learning process. Definitions of learning from different point of view.	Meaningful verbal expression Group discussion Narrative expression sessions in small or medium groups	▪ Performance assessment in group discussion ▪ Assessment of Optional Note Book entries ▪ Questioning and quizzes ▪ Tests ▪ Peer evaluation

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
4. To introduce the changing concept of classroom environment 5. To understand the maxims of teaching	• Changing concept of classroom environment- classroom climate, classroom as a social laboratory, classroom without walls (CWW), Virtual learning environment (VLE) • Teacher as a professional- Teacher competencies and Role of Teacher (general & specific) • Maxims of teaching.	Document analysis and peer instruction Project reports	

Unit II - Home Science – A Conceptual Analysis (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To comprehend the nature and scope of Home Science. 2. To identify concepts in Home Science related to science and arts 3. To familiarize with the different areas of Home Science 4. To develop an understanding of the importance of Home Science	• Meaning, Nature and scope of Home Science. • Home Science- a science as well as an art subject. • Areas of Home Science. • Importance of Home Science in school curriculum	Meaningful verbal expression Group discussion Brain storming Seminar Symposium Assignments Document analysis	• Performance assessment in group discussion • Assessment of the performance in brain storming, presentation in symposium etc. • Questioning • **CE - Tests** • Peer evaluation

Unit III - Aims and Objectives of Teaching Home Science (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To distinguish between aims and objectives 2. To develop an understanding of broad aims of teaching Home Science 3. To get acquainted with the Taxonomies of Instructional objectives 4. To identify the importance of objective based instruction	3.1 Broad aims of teaching Home Science to fulfill national goals of education with special reference to : ▪ Population control ▪ Increase in food production ▪ Eradication of diseases ▪ Better nutrition ▪ Conservation of natural resources ▪ Taxonomy of Instructional Objectives. ▪ Instructional objectives and Specifications ▪ Bloom's Taxonomy (Revised) ▪ NCERT classification ▪ Mac Comack and Yagar classification ▪ Objective based instruction	Lecture cum discussion Meaningful verbal learning Group discussion Document analysis Debate assignment	▪ Performance assessment in group discussion,debate etc. ▪ Assessment of assignments ▪ Questioning and quizes ▪ Tests ▪ Peer evaluation **CE - Practicum**

Unit IV -- Methods and Strategies for Teaching Home Science (24 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize the meaning and definition of Strategies, Methods, Techniques and approaches 2. To distinguish between teacher initiated and student initiated methods of teaching 3. To identify and comprehend the different strategies, methods,approaches and	▪ An introduction- Meaning and Definition of Strategies, Methods, Techniques and approaches ▪ Teacher initiated methods- Lecture method, Lecture cum Demonstration. ▪ Student initiated methods- Problem solving, Project, Discovery, Laboratory ▪ Approaches in learning Home Science- Inductive-Deductive,Constructivist,	Meaningful verbal learning Discussion cum demonstration Debate Brain storming Symposium	▪ Test ▪ Performance assessment in debate,brain storming,symposium etc ▪ Assessment of performance in group discussion ▪ Evaluating the projects ▪

techniques in teaching Home Science	Modular,Multimedia, Interdisciplinary approaches ▪ Techniques in learning Home Science-Seminar, Field trips, Role play, Group work,Peer tutoring,Team teaching,Types of discussion-Group discussion, Panel discussion, Discussion 66, Buzz session, Brain storming, symposium, colloquium, Debate. ▪ Self instruction strategies-Programmed Instruction,CAI,CMI ▪ Co –operative / Collaborative Strategies of Learning for less able , able and More able(Differential Teaching)	Group discussion Small group Projects	**CE- Seminar**

Unit V -   Models of Teaching(12 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the concept of Models of teaching 2. To identify the different Models of teaching used in teaching of Home Science 3. To familiarise the syntax of the different Models of teaching used in teaching of Home Science	▪ Introduction, Definition , Elements and Families of models of teaching: Concept Attainment Model ▪ Inquiry Training Model ▪ Constructivist learning Model ▪ Advance Organiser ▪ Role play model	Lecture cum discussion Meaningful learning Demonstration Group discussion Document analysis	▪ Performance assessment in group discussion ▪ Assessment of Optional Note Book enteries ▪ Questioning and quizes ▪ Tests ▪ Peer evaluation **Practicals** o Discussion lessons -3 o Criticism lessons-3 o Demonstration lesson-1

Unit VI   Psychological Base of Teaching Home Science (8 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To apply the relevant psychological theories in teaching of Home Science	▪ Application of psychological theories in teaching Home Science – ▪ Piaget, Bruner, Gagne, Ausubel, Vygotsky and Gardner	Lecture cum discussion Meaningful learning Seminar Group discussion Assignments	▪ Performance assessment in group discussion ▪ Assessment of assignments ▪ Questioning and quizes ▪ Tests ▪ Peer evaluation

References

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- Models of Teaching- Joyce, Bruce & Marsha, Weil
- Making Multimedia in class room- Lachs,V
- Principle, methods andTechniques of teaching Teaching- J.C.Aggarwal
- Instruction Media and Methods – Brown, & James W
- Taxonomy of educational objectives – Bloom B S
- Teaching of Home Science- Mujibul Hasan Siddique
- Teaching of Home Science- Seema Yadav
- Modern Teaching of Home Science-
- Fahmeeda Beegum
- Science Teaching in Schools- Das R C

EDU-0 5.1 : PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS-MALAYALAM

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

The student teacher:

- Acquaints with the different dimensions of Pedagogic Content Knowledge Analysis.
- Get familiarised with the aims and objectives of teaching Malayalam, Taxonomy of educational objectives etc.
- Analyzes Secondary Malayalam Readers and identifies suitable strategies for transacting content.
- Understand the new concepts regarding teacher, learner, learning environment, learning activities and creativity
- Understand the need and significance of instructional planning
- Get acquainted with the integration of new theories and concepts

Contents
Unit I   : **Pedagogic Content Knowledge Analysis**
Unit II   : **Aims and Objectives of Teaching Malayalam**
Unit III   : **Learning Process**
Unit IV   : **Instructional Planning**
Unit V   : **Micro Teaching**
Unit VI   : **New Educational Theories and Concepts**

Unit 1: Pedagogic Content Knowledge Analysis(10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the meaning and practice pedagogic content knowledge analysis	- Meaning, features, and principles of pedagogic content knowledge analysis - Pedagogic content knowledge analysis of Secondary and Higher Secondary level text books	Preparation of a comparative description on pedagogic content knowledge analysis of secondary/higher secondary level text books	- Student's works

Unit II : Aims and Objectives of Teaching Malayalam(10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get familiarised with the aims and objectives of teaching Malayalam, Taxonomy of educational objectives etc.	▪ Aims and Objectives of teaching Malayalam at different levels of schooling with special emphasis to secondary and Higher secondary levels ▪ Curricular objectives of Secondary and Higher Secondary classes ▪ Taxonomy of Educational objectives – Benjamin Bloom	Debate on recent changes practiced in the state schools Discussion on the relevance of Blooms Taxonomy	▪ The extent of participation in debate/discussion etc. **CE Test No.1**

Unit III: Learning Process (17 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the new concepts regarding teacher, learner, learning environment, learning activities and creativity	Factors Influencing the process of learning *Learner* ▪ Psychological, social and emotional nature of the learner ▪ Significance of learning styles – Teaching strategies in accordance with learning styles ▪ Managing Diverse Learners – Gifted/Slow ▪ Fostering Creativity *Learning Environment* ▪ Principles of creating conducive learning environment ▪ Features of class room democracy ▪ Process skills - Significance, ▪ Role of students /teacher s in language class.	Design and development of learning activities/materials to foster linguistic/literary creativity in school students Practicum	▪ Innovative designs ▪ Applicability of resource book ▪ **CE Practicum**

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Learning Activities	Preparation of a resource book on group activities suitable for teaching HS classes	
▪ Characteristics of learning activities ▪ Group Activities - Importance in learning ▪ Grouping techniques ▪ Small group/Large group /Heterogeneous groups - importance in learning. ▪ Learning Strategies		

Unit IV: Instructional Planning (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the need and significance of instructional planning 2. To get acquainted with the integration of new theories and concepts	▪ Need and significance ▪ Year Plan, Unit Plan, Lesson Plan ▪ Incorporation of new theories (MI theory, Constructivism, Critical pedagogy, Emotional Intelligence etc.) in the preparation of Year Plan/Unit Plan/ Lesson Plan ▪ Absorption of the concept 'Entrepreneurship' in instructional planning	Preparation of year plan/unit plan etc. Workshop on developing entrepreneurship in HS/HSS students through teaching Malayalam	▪ Innovations in planning year plan/unit plan etc. ▪ Originality of ideas/practices ▪ In the workshop **Practicals** o Discussion Lesson

Unit V: Micro Teaching(13)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop teaching skills through micro teaching	▪ Development of teaching skills through micro teaching ▪ Definition and Mechanics ▪ Micro Teaching cycle ▪ Core Skills	Demonstration and practice of core skills	▪ Comprehensiveness in the practice of core skills **Practicals** o Micro teaching **CE-Practicum**

Unit VI: New Educational Theories and Concepts (16 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand and practise modern educational theories and concepts	▪ Cognitive Constructivism – Piaget and Bruner ▪ Social Constructivism – Vygotsky ▪ Multiple Intelligence Theory ▪ Emotional Intelligence Theory ▪ Critical Pedagogy - Paulo Freire ▪ Meta Cognition ▪ Integration of new theories and concepts in teaching Malayalam	Seminar on the significance of new educational theories Assignment Preparation of Comparative notes on new theories with the help of reference books	▪ Seminar paper and performance ▪ Assignment paper ▪ Prepared notes **CE Seminar** **Practicals** o Observaion of Video Lesson o Demonstration Lesson o Micro Teaching o Criticism Lesson

References: See EDU 09.1

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EDU- 05.2 : PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS-ENGLISH

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

The student teacher:

- Familiarizes with the different dimensions of Pedagogic Content Knowledge Analysis.
- Develops an understanding of objectives and specifications for teaching English as a   Second Language.
- Familiarizes the procedure and steps for planning different kinds of lesson.
- Develops an ability to employ different skills for transaction of content in the classroom.
- Analyzes Secondary Course Books and identifies suitable strategies for transacting content.
- Explores ways of designing appropriate learning aids.
- Identifies suitable strategies for assessment and evaluation.

Contents

Unit 1	**: Pedagogic Content Knowledge Analysis(PCKA)**
Unit 2	**: Instructional Objectives**
Unit 3	**: Planning and designing the Teaching Manual/Lesson Plan**
Unit 4	**: Micro Teaching Skills and Psychological Principles**
Unit 5	**: Design and Development of Teaching Aids**
Unit 6	**: Assessment and Evaluation**

Unit I: Pedagogic Content Knowledge Analysis (PCKA) (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops an understanding of pedagogy and its principles 2. Familiarizes with the nature of a Course Book	▪ Pedagogy -Its principles -Its objectives ▪ Pedagogic content knowledge -Scope in teaching and learning ▪ Content Analysis of CB Secondary ▪ -Themes ▪ -Language element ▪ -Literary discourses ▪ -Sequencing of content ▪ -Deficiency in content	Direct instruction Use of Checklist Engaging in Group discussion	▪ Ability to develop suitable Lesson Plan/Teaching Manual for different content ▪ *Phased monitoring

Unit II: Instructional Objectives (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with Taxonomy of Educational Objectives 2. Develops an understanding of types of thinking	▪ Bloom's Taxonomy -Objectives of teaching English -Specifications -Process skills ▪ -Mental Processes -Thinking Skills -Critical thinking -Creative thinking -Problem Solving	Workshop mode to identify Objectives, Specifications and appropriate testing mechanisms Critiquing Syllabus Grids in Course Books Intro. lectures on thinking skills	▪ Performance in Workshop ▪ Checking ability to frame appropriate Objectives and Specifications *CE Test - I*

Unit III: Planning and designing the Teaching Manual/Lesson Plan (24 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. Develops the ability to design the Teaching Manual incorporating the relevant activities
2. Familiarizes with different Models for use in the English class room
	▪ Lesson Plan/Teaching Manual
	▪ Planning-Design
	▪ Relevance, mode of planning
	  Year Plan-Unit Plan - Lesson Templates
	▪ Planning to teach Prose
	  Intensive reading -Extensive reading
	  Skimming-Scanning-Reading aloud
	  Silent reading-Pre-reading- Post-reading
	▪ Strategies for teaching Poetry
	▪ Deviant language of Poetry
	▪ Ways of teaching
	▪ Formal Grammar- Functional Grammar
	▪ Inductive method -Deductive method
	▪ Use of Substitution Tables
	▪ Teaching Communicative functions
	▪ Techniques for teaching Vocabulary
	  Content words-Function words
	  Strategies for enhancing vocabulary
	  Incorporating activities
	  Identifying strategies for Spoken and written discourse
	▪ Individual work-Pair work-Group work
	▪ Syntax of models
	▪ Instructional and nurturant effect
	▪ Direct Instruction Model
	▪ Concept Attainment Model
	▪ Advance Organizer Model
	▪ Synectics Model
	▪ Role Play Mod
		Task-directed discussion and Applied exercises
		
		Demo. by expert
		
		Practice under supervised guidance
		
		Preparation of Group Lesson Plan/Teaching Manual
			▪ Submission of Lesson Plans/ Teaching Manuals fulfilling essential criteria
			
			Practicals
			o Discussion Lessons
			
			CE - Practicum
			▪ Checking effectiveness from learner response following teaching of content using specific Models

Unit IV: Micro Teaching Skills and Psychological Principles (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
(Micro Teaching) 1. Develops knowledge of teaching skills 2. Familiarizes with ways of employing skills for effective teaching **(Psychological Principles)** 3. Familiarizes with strategies that address learner and learning needs	▪ (Micro Teaching) ▪ Core Skills of Teaching ▪ Micro Teaching-What , how 　-Micro Teaching Cycle ▪ Ten main skills 　-Introduction, -Stimulus Variation 　-Explaining-Reinforcement 　-Questioning-Using Blackboard 　-Illustrating with examples 　-Using teaching aids ▪ Promoting pupil participation ▪ Closure ▪ (Psychological Principles) 　Motivation, -Readiness, -Learning by doing 　Reinforcement-Law of exercise 　Group Dynamics	(Micro Teaching) Peer observation using Schedule Videography for reflection Supervised guidance (Psychological Principles) Applies knowledge gained during Criticism Lessons, Peer Observation, Observation of Video Lesson	**Practicals** ○ (Micro Teaching) ▪ Use of Observation schedule ▪ Reflection ▪ write- up submitted following viewing of video recording of own teaching (Psychological Principles**)** ▪ Peer comment ▪ Guided supervision *CE – Seminar* *(Practicals)* ○ Observation of video lessons ○ Demonstration lessons ○ Criticism lessons

Unit V: Design and Development of Teaching Aids(10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Creating awareness and provision for effective use of aids in teaching and learning	▪ Teaching aids ▪ Its design-Its development ▪ Learning support resources ▪ Pictures-Charts-Flash Card-Models-Radio-Tape Recorder-Video Clips-Interactive White Board-LCD Projector-Internet ▪ CALL, Language Lab	Visual presentation and hands-on experience with resources	▪ Effective use of the aids in appropriate situations

Unit VI: Assessment and Evaluation (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops an understanding of testing mechanism and how to use it in classroom	▪ Assessment, Evaluation ▪ Purpose-Different types of testing mechanisms ▪ Criteria of a good test in English ▪ Art of Questioning ▪ Question form-LOT questions ▪ HOT questions ▪ Test types for LSRW ▪ Construction and administration of:-Achievement Test-Diagnostic Test ▪ Remedial Teaching ▪ CCE ▪ Formative and Summative Assessment ▪ Feedback ▪ ICT integrated projects	Meaningful verbal learning Task directed and inquiry centred discussion Presentation of samples	▪ Accuracy in preparation of different types of test ▪ Ability to frame appropriate questions *CE – Test II* *Practicals* o ICT enabled lessons o Script for video lessons

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EDU- 05. 3 : PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS - HINDI

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

The student teachers:

- Achieve the ability to think critically from a pedagogic view point
- Equip to plan the instruction and to design suitable teaching-learning materials
- Attain the ability to develop and practice different teaching skills
- Develop the ability to analyze the self and to improvise accordingly
- Understand the different types of assessment and evaluation techniques

Content:

Unit I	**: Content Analysis and Text Book Analysis**
Unit II	**: Instructional Planning and Designing**
Unit III	**: Theory and Practice of Micro Teaching Skills**
Unit IV	**: Design and Development of Modern Learning Supporting Gadgets**
Unit V	**: Evaluation of Classroom Practices**
Unit VI	**: Assessment and Evaluation**

Unit I: Content Analysis and Text Book Analysis (13 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop the ability to critically analyze the textbooks in Hindi prescribed at Secondary school level	▪ Critical Analysis of Text books and Hand books in Hindi prescribed at Secondary school level from a pedagogic view point---main objective, scope for audio-video aids, nature of learning activities, presentation of issues identified for each unit in the text book, analyzing the characteristics of text book ▪ Content Analysis :- Competency in subject matter, Identifying the additional knowledge required to teach the content	Group Discussion Referring models Critical Analysis on the basis of criteria Meaningful verbal learning	**CE-1 (practicum-1)**

Unit II: Instructional Planning and Designing   (18 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Equip the ability for planning the instruction and designing suitable teaching-learning materials	- Planning and designing different lessons, - Familarizing Year Plan, Unit Plan and Teaching Manual, - Familarizing Theories,principles,different methods and approaches for preparing lesson plans and their implications, - preparation of teaching-learning materials and other resources to be used in classroom practice, - Opportunity for rectifying and modifying teaching skills by healthy criticisms and video recording.	Demonstration of lessons, **Practicals** ○ Discussion Lessons, ○ Criticism Lessons, ○ Shared lessons, Preparation of Teaching Manual Preparation of teaching learning materials & resources,(charts, flash cards,OHP sheet,Still models,Working models,audio-video aids,Power point etc) **Practicals** ○ Creation of blog ○ Preparation of scripts for Video lesson and Video recording	- Evaluation of Demonstration Lessons, - Evaluation of Discussion , Criticism and Shared Lessons, - Evaluation of Teaching Manual - Evaluating the steps adopted for the preparation of lessons, - Assessment of suitability & practicability of learning materials & resources prepared - Assessment of blog materials - Evaluation of scripts for Video lesson and Observation of Video recordings

Unit III: Theory and Practice of Micro Teaching Skill   (17 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Equip to develop and practice different teaching skills	• Micro Teaching- Definitions, Principle and theory, micro teaching cycle,its limitations, developing Classroom management skill, Preparation of lessons to develop micro teaching skills and practicing each skill--- Recording at least 10 skills or classes and assessment of micro teaching practices	Discussion, Demonstration, Participation, Preparation of lessons for practicing teaching skills, Recording,Re teaching	**Practicals** o Assessment of at least 10 skills, • Evaluation of Micro Teaching Lessons • Observation of Re-teaching **CE-2 (seminar-1)**

Unit IV: Design and Development of Modern Learning Supporting Gadgets (11 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To equip student teachers to design and infuse Modern Learning Supporting Gadgets	• Significance of learning aids---Preparation of learning aids---Make use of different types of audio-visual aids---White board,Black board,Interactive Board,Bulletin Board,Map,Models,Chart,Flashcard,OHP, • Epidiascope,Linguaphone,Radio, • Television,Tape recorder,CD player, Use of audio-visual aids for Hindi instruction: Hands-on operational facility of modern learning supporting gadgets--- Tablet,NoteBook,Laptop,Desktop,etc	Developing skills for the effective use of electronic gadgets Meaningful verbal learning Virtual learning Group discussion	• Assessment of skill in using supporting gadgets **Practicals** o Preparation of ICT Lesson plan **CE-3 Internal Test -1(UNIT 1,11,111 & 1V)**

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Unit V: Evaluation of Classroom Practices   (11 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To Provide an opportunity to analyze the self and to improvise accordingly	▪ Opportunity for self reflection---Self Evaluation, Peer Evaluation and Teacher Evaluation of classroom practices,preparation and application of context based data sheets, Identifying the problems and challenges in the classroom and adopting measures to overcome	Self assessment and self evaluation Practice teaching in schools Action Research	▪ Self Evaluation, ▪ Peer Evaluation and Teacher Evaluation ▪ Evaluation of Classroom Practices ▪ Evaluation of Action Research

Unit VI: Assessment and Evaluation   (14 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To study the different types of assessment and evaluation techniques and 2. to design different types of testing mechanisms	▪ Importance of Assessment and Evaluation,Differences, Different methods, Formative and Summative Evaluation, Grading,Scheme of Grading,Grade points,Continuous and Comprehensive Evaluation,Terminal Evaluation,different types of tests---Norm referenced test, Criterion referenced test, place of achievement tests and their Preparation - Design of the test/Blue Print, different types of questions - objective, short-answer and essay - their relative importance in the construction of achievement tests; Diagnostic test, and its uses,Remedial teaching programmes,preparation of assessment tools;-rubrics,checklists,observation schedules,port folios,online	Tutor& Peer Instruction, Comparative study Practical work, Test construction Tool preparation Survey Comparative study, Review of related studies Case study Strategies for Problem solving skill,	**(Practical)** o Evaluation of Achievement Test, o Evaluation of Diagnostic Test ▪ Assessment of methods and steps followed for the preparation of tools ▪ Document Analysis **CE-3** o Internal Test -2 (UNIT V & V1)

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	assessments,presentation of problem based studies,projects and their outputs	Strategies for Promoting	
	▪ Identification of difficulties and Linguistic Errors;Influence of mother tongue in communicating Hindi, Errors in pronunciation,and errors occurred while reading and writing Hindi.	Thinking skill	
	▪ Comparative study of similar letters and words of Hindi and Malayalam languages and identifying the differences in word meanings,and pronunciation---use of similar words in different context, conducting Case Study to identify learning difficulty,learning disability and finding Solutions to overcome,development of problem solving skills,thinking abilities,developing the art of Questioning—LOT and HOT questions		

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EDU - 05.4: PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS - SANSKRIT

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

- To understand the aims and objectives of leaching Sanskrit
- To update on the present practices of learning and instruction practiced in the state schools of Kerala
- To understand and practice the pedagogical analysis of Sanskrit text books 7th to 12th
- To develop the teaching skills for effective teaching
- To understand and familiarise the IT related professional inputs of teaching
- To understand the importance of self evaluation and criticism
- To understand the evaluation techniques and prepare objective based test items

Contents

Unit 1	: **Principles of Pedagogic Content Analysis (PCK) (7th To 12th Std)**
Unit II	: **Planning and Designing of Lesson Templates (Lesson Planning Unit Planning, Year Planning)**
Unit III	: **Micro Teaching Skill Based Lesson – Development and Assessment and Recording**
Unit IV	: **Identifying Designing and Development of Learning Aids with Hands on Operational Facility of Modern Learning Supporting Gadgets**
Unit V	: **Self- Reflection and Peer Evaluation of Classrooms**
Unit VI	: **Assessment and Evaluation**

Unit I: Principles of Pedagogic Content Analysis (PCK) (7th To 12th Std) (8 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the aims and objectives of leaching Sanskrit and	- Principles of pedagogic content knowledge (PKC) - Content analyse on the basis of Blooms Taxonomy - Concept of objective based instruction and evaluation –	Meaningful verbal expression Group discussion	- Role performance - Analysis in group discussion - Participant observation – - Optional level focused group discussion

2. To update on the present practices of learning and instruction practiced in the state schools of Kerala activities and selection of activities 3. Ideas of issue based instruction- issues critical pedagogy	▪ Instructional objectives and specification of Sanskrit – ▪ Analysis of Linguistic content (vocabulary synomymous, Anonymous, gender, Singular, Plural words, ideams and phrases) ▪ Grammer and (Subantha's and Thinganthas) cases- Structure of sentences, comparative study between Hindi and Malayalam sentence structure ▪ The idea of constructivism Format – preparation of activities and selection of activities – ideas of issue based instruction.	Narrative Expression sessions in small or medium groups Document Analysis and peer instruction	▪ Examine student report-

Unit II: Planning and Designing of Lesson Templates (Lesson Planning Unit Planning, Year Planning) (19 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand and practice the pedagogical analysis of Sanskrit text books 7th to 12th	▪ Pedagogic analysis of lesson – meaning and principles of content analysis – subject matter and language learning experiences- Evaluation – Lesson Plan ▪ Unit plan and year plan – importance of planning in education ▪ Different approached in lesson planning ▪ (Herbartian, constructivist, issue based) – model class-	-Meaningful verbal expression- -Group discussion- -Presentation- -Document analysis and peer instruction - - Makes trainee recall the method of teaching-	▪ Analysis in group discussion- ▪ Participation observation - ▪ Optional level focused group discussion – ▪ Examing the level of participation- performance in classroom discussions teaching performance entry recorded- in reflective journal- **Practicals** o Discussion lessons o Demonstration o Observation of video lessons and reporting

Unit III: Micro Teaching Skill Based Lesson – Development and Assessment and Recording (15 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop the teaching skills for effective teaching	Meaning of micro teaching – definition of micro teaching- objectives of micro teaching – skill based practice- 3 skills 1. Stimulus variation 2. Questioning 3. Reinforcement	-Group discussion- -observation- -Presentation- -Narrative expression session in small groups – Makes trainee recall the art of teaching- Use film related teaching skills, web based resources-	-Analysis in group discussion -Participant - Observation - -Optional level focused groups discussion- -entry recorded in reflective journal- **Practicals** o Micro Teaching **Test I (CE)**

Unit IV: Identifying, Designing and Development of Learning Aids with Hands on Operational Facility of Modern Learning Supporting Gadgets (15 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand and familiarise the it related professional inputs of teaching	-The importance of teaching aids in learning process.- -Teacher made aids- Flash cards- pictures – charts- models- black board. Mechanical aids- OHP, Tape recorded, Radio, TV, etc.. - Preparation of computers assisted instruction CD'S VCD'S, power point, Radio Lesson, TV Lessons e-learning resources and e- content preparation. Operational principles of modern electronic gadgets (O.H.P....etc) in class room learning (OHP, Slide P, Film, LCD) - Projected and non –projected aid	Discussion Workshop- Demonstration of learning aids- Preparation of learning aids- Group activities	-Role performance- -Discussion - - Evaluate the competence to use these aids- **Practicals** o Preparation of Computer/ICT enabled lesson o Development of script for video lesson and video recording

Unit V: Self Reflection and Peer Evaluation of Classrooms (15 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the importance of self evaluation and criticism	-Conducting class room instruction- -observation of peer team classes- -criticism of instruction-	-Class- -Debate- -Seminar-	▪ -Presentation- ▪ -Peer instruction/assessment- ▪ -Role performance- **(Practicals)** ○ Criticism lessons

Unit VI: Assessment and Evaluation (12 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the evaluation techniques and prepare objective based test items	▪ Difference between measurement and evaluation – characteristic of a good test – concepts of evaluation – different types of test- achievement- aptitude- proficiency- diagnostic- diagnostic in Sanskrit language- types of achievement test- oral written- construction of a good test-Evaluation of student --achievement tools of evaluation – formative and summative -continuous and comprehensive evaluation – tools and techniques for continuous evaluation- ▪ -Grading system - ▪ -The art of questioning-	-Document analysis- -Peer instruction - -Lecturer method- -Presentation - -Seminar - -Discussion – - Discusses- -Discusses-	▪ -Optional level- -focused group discussion- participant observation and analysis- ▪ -examined student report- **Test II (CE)**

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EDU 05.5 : PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS- ARABIC

Instructional Hours : 84 (**Theoretical Discourses- 60 & Related Practical Work – 24**)

Objectives

- Develops an understanding of pedagogy and its principles
- Familiarizes with the nature of text book and analyses pedagogically
- Familiarizes with Taxonomy of Educational Objectives
- Develops the ability and acquires the teaching skills by practicing complex skills of classroom teaching
- Develops the ability to design lesson plans incorporating the relevant objectives and activities
- Develops knowledge of the importance of planning in teaching
- Familiarizes with ways of employing teaching skills for effective teaching
- Acquire the ability to plan lessons and use in classroom teaching
- Acquire the ability to apply suitable Teaching Aids in classroom teaching

Contents

UNIT I	: **Pedagogic Analysis**
Unit I	: **Teaching Skills**
Unit III	: **Instructional Designs**
Unit IV	: **Instructional Planning**
Unit V	: **Teaching Learning Materials (Tlm):**
Unit VI	: **Assessment and Evaluation:**

Unit I: Pedagogic Analysis (8 T + 2 CE)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. The student teacher develops an understanding of pedagogy and its principles 2. Familiarizes with the nature of	▪ Pedagogic Science ▪ Concept of pedagogy ▪ Pedagogic Analysis Principles of Pedagogic Analysis Objectives of Pedagogic Analysis	Direct instruction Use of Checklist Engaging in Group discussion	● TE ● Document analysis ▪ Verification of lesson templates ▪ CE

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
text book and analyses pedagogically	Steps involved in Pedagogic Analysis ▪ Pedagogic Analysis of Arabic Text Book prescribed for the State Schools of Kerala(secondary level)		▪ Discussion report

Unit II: Teaching Skills (8 T + 6 CE)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with Taxonomy of Educational Objectives 2. Develops the ability and acquire the teaching skills by practicing complex skills of classroom teaching	▪ Pre Teaching skills ▪ Teaching skills ▪ Post teaching skills ▪ Core Skills of Teaching ▪ Practicing Teaching Skills: ▪ Micro Teaching ▪ Definition, principles, microteaching cycle, advantages ▪ Preparation of Micro teaching Lesson Plans	Peer observation Videography for reflection Supervised guidance Applies knowledge gained during Criticism Lessons & Peer Observation	▪ Analysis of video ▪ Peer evaluation ▪ Participant observation ▪ ▪ Monitor participation and performance **Practicals** o Observation of Video Lesson o MT Lesson plan preparation

Unit III: Instructional Designs (8 T + 6 CE)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops the ability to design lesson plans incorporating the relevant objectives and activities	▪ Bloom's Taxonomy ▪ Objective based instruction ▪ Objectives and specifications ▪ Constructivist Design ▪ Mental process ▪ critical thinking, creative thinking	Intro. lectures Workshop mode to identify Objectives, Specifications and appropriate testing mechanisms	▪ Objective specification grids ▪ Product assessment ▪ Student notes ▪ TE ▪ CE ▪ workshop

	▪ Problem solving ▪ Designs based on different Models of Teaching (5 Models)		**Practicals** o Discussion & Demonstration lessons on models of teaching

Unit IV: Instructional Planning 10 T + 5 CE)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops knowledge of the importance of planning in teaching 2. Familiarizes with ways of employing teaching skills for effective teaching 3. Acquires the ability to plan lessons and use in classroom teaching	▪ Planning ▪ Importance of Planning ▪ Objectives of planning ▪ Difft. Levels of Planning ▪ Year Plan - Unit Plan - Lesson Plan Planning & Designing of Lesson Templates ▪ Steps involved in Lesson Planning	Task-directed discussion and Applied exercises Practice under supervised guidance Preparation of Group Lesson Plan/Teaching Manual	▪ Verification of lesson templates/modules ▪ Assessment of book entries **CE** **Practicals** o Discussion Lesson plan preparation and submission

Unit V: Teaching Learning Materials (14 T + 7 CE)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Acquires the ability to apply suitable Teaching Aids in classroom teaching	▪ Psychological Bases of teaching learning Materials (TLM) ▪ Teaching and Learning Aids ▪ Audio aids, Audio visual Aids, Graphic Aids, Improvised Aids, Projected –Non Projected Aids ▪ Modern Animated Aids ▪ Digital Aids ▪ Working Models	Verbal presentation and discussion Demonstration Visual presentation and first- hand experience with resources Organisation of	▪ TE ▪ CE ▪ Workshop ▪ (Monitoring performance by using TLM in classroom) teaching ▪ Competence in using learning aids

| | Language Lab
Reading Corner
Multimedia Aids
Internet, CALL(Computer Assisted Language Learning
Mass Media Aids
Application of TLM in classroom for effective teaching and learning of Arabic Language | workshops

Projects individual/group | Improvisation
Assessment of creativity
Practicals
o Demonstration lessons
o Criticism lessons
o ICT lessons
   o Preparation of video script |

Unit VI: Assessment And Evaluation (6 T + 4 CE)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops an understanding of testing mechanism and its application in teaching learning process	▪ Evaluation of learner achievements ▪ Importance of Evaluation ▪ Objectives of evaluation ▪ Tools of evaluation ▪ Types of Evaluation ▪ Formative, Summative Evaluation ▪ Continuous Evaluation ▪ Comprehensive Evaluation ▪ Continuous & Comprehensive Evaluation (CCE) ▪ Marking System/Grading system ▪ Construction and administration of Tests ▪ Development of Achievement Tests with design of blue print ▪ Development of Diagnostic Tests ▪ Remedial Measures ▪ Preparation of scoring key ▪ Preparation of scoring indicators for CE and CCE	Meaningful verbal learning Focus group discussion Online learning Projects Power point presentation *Task directed and inquiry centered discussion Presentation of samples	▪ Outcome analysis ▪ Tests ▪ TE ▪ CE ▪ (Development of evaluation tools)

EDU 05.6 : PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS – TAMIL.

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

The student teacher:

- Familiarizes with the different dimensions of Pedagogic Content Knowledge Analysis.
- Develops an understanding of objectives and specifications for teaching Tamil Language.
- Familiarizes the procedure and steps for planning different kinds of lesson.
- Develops an ability to employ different skills for transaction of content in the classroom.
- Analyzes Secondary Course Books and identifies suitable strategies for transacting content.
- Explores ways of designing appropriate learning aids.
- Identifies suitable strategies for assessment and evaluation.

Contents

Unit 1	**: Pedagogy content analysis (secondary level)**.
Unit 2	**: Planning and designing**
Unit 3	**: Micro teaching skills based lesson development and its assessment and recording**
Unit 4	**: Identifying- design and development of learning aids with hands on operational facility of modern learning supporting gadgets**.
Unit 5	**: Self-reflection and peer evaluation of classrooms – Preparation and application of context based data sheets**

Unit I: Pedagogic Content Knowledge Analysis (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop the ability to apply the principles of PCK analysis	▪ Principle of PCK content analysis ▪ Importance of content analysis-main components of content analysis ▪ Advantages of content analysis-organization of subject matter-analyzing scope of content for developing basic language skills.	Assigned reading from the works of theories. Group discussion Analysis using check list for content analysis	▪ Examine student report ▪ Address the level of students involvement in group discussion ▪ Delayed Testing

Unit II: Planning and designing (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To mould mid-set suitable for an attitude formation to planning. 2. To develop the ability to designing 3. Trainee familiarizes with method of teaching	▪ Meaning and definition of teaching models-role of teaching models-types of teaching models (5 types)-Meaning of Planning ▪ Advantages of planning ▪ Types of planning-Annual Plan-Unit plan-Lesson plan ▪ Model class	Discussion Demonstrations of steps followed in different methods Makes trainee recall the method of teaching **Practicals** o Discussion lessons o Demonstration lessons	▪ Examine level of participation ▪ Monitor the ability to distinguish between similar concepts. ▪ Performance in classroom discussions regarding teaching performance entry recorded in reflective journal. **CE-Practicum**

Unit III: Micro-teaching based lesson development and its assessment (19 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To provide the teacher professional aspirants a smooth entry into knowledge about micro-teaching 2. To develop the ability to apply the teaching skills	▪ Meaning of micro teaching ▪ Objectives of micro teaching-characteristics of micro teaching.-Steps in micro teaching- ▪ Micro teaching procedure- ▪ Advantages of micro teaching-limitation of micro teaching-Teaching skill (10 skills)	Makes trainee recall the art of teaching Use films related to teaching skill Web based resources	▪ Performance in classroom discussions regarding teacher trainee role. ▪ Entry recorded in reflective journal **Practicals** o Micro teaching o Observation of video lessons **CE - Test**

Unit IV: Identifying, Desing and Development of learning aids with hands on operational facility of modern l earning   supporting gadgets(8 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with traditional approaches and methods of using learning aids 2. Develops the ability to use learning aids	▪ Resources in teaching Tamil ▪ Teacher made aids: Flash cards, pictures, charts, models, Blackboard sketches. ▪ Mechanical aids: ▪ Overhead projector, Tape recorder, Lingua phone records, Radio, Television. ▪ Programmed learning – language laboratory ▪ Computer assisted language learning-PowerPoint presentation and Identifying websites.	Demonstration of learning aids Watching video recording of the same. Assessing online input on the topic.	▪ Evaluate the competence to using learning aids ▪ Monitor the ability to using the different type of learning aids. **CE - Seminar**

Unit V: Self reflection and peer evaluation of classrooms-preparation and application (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop awareness about evaluation 2. Understand the ability to select appropriate methods	▪ Evaluation: objectives of evaluation, principles of evaluation ▪ Principles of evaluation ▪ Self-evaluation ▪ Self-reflection ▪ Techniques of self-evaluation, Find the difficulties and remedies in self-evaluation	Demonstration of steps followed in different method Correlating classroom activities Assessing online inputs on the topic	▪ Performance in classroom activities ▪ Entry recorded in reflective journals **Practicals** o Criticism lessons

Unit VI: Tools of Evaluation (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize the different types of evaluation 2. To understand the techniques of evaluation	▪ Difference between measurement and evaluation ▪ Characteristics of a good test-objectivity-reliability-validity-feasibility ▪ Concept of evaluation-types of evaluation-formative and summative ▪ Different types of tests – achievement tests-aptitude test-proficiency test-diagnostic tests – diagnostic test in Tamil language ▪ Types of achievement tests – Oral test-written test – teacher made test – standardized test ▪ Objective tests-one word answer-fill in the blanks-matching-multiple choice-error recognition ▪ Written test-short answer type paragraph type-essay type ▪ Construction of a good test-preparation of blue print-scoring key-asking scheme	Discussion Assigned readings from the works of theories Group discussion	▪ Examine level of participations ▪ Evaluation based on data ▪ Examine student report **CE – Test/ Model Exam**

References: See EDU 04.6

EDU 05.7: PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS – MATHEMATICS

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

By the end of the course, the learner should:
- Assimilate the concepts and principles of pedagogic analysis
- Analyse the content of secondary school mathematics by applying pedagogical principles
- Understand the need, importance and stages of planning instruction in mathematics
- Develop the ability to plan and design behaviourist and constructivist formats of lesson transcripts
- Develop the ability to plan, design and practice micro teaching lessons
- Understand the need and importance of concretising abstract ideas in mathematics and preparation of different types of learning aids
- Understand the concept of self reflection and peer evaluation and preparation of rubrics for assessment of the same
- Develop clear perception of the role of assessment and evaluation in teaching- learning process
- Develop skill in constructing achievement and diagnostic tests in mathematics and interpreting the test scores.

Contents
UNIT I   : Pedagogic Analysis
UNIT II   : Planning and Designing of Instructions
UNIT III   : Micro Teaching
UNIT IV   : Design and Development of Learning Aids
UNIT V   : Self-Reflection and Peer Evaluation in Classroom
UNIT VI   : Assessment and Evaluation in Mathematics

Unit I: PEDAGOGIC ANALYSIS (7hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To provide knowledge on Pedagogic Analysis 2. To identify the requirement for Pedagogic Analysis 3. To develop ability to analyze the content 4. To locate Objectives, Curricular objectives, pre-requisites, resources, teaching strategies, learning activities and evaluation strategies	▪ Concepts and principles of pedagogic analysis ▪ Content Analysis of Standard 8,9 & 10 text books ▪ -listing of Objectives, Curricular objectives, pre-requisites, resources, teaching strategies, learning activities and evaluation strategies	Meaningful verbal presentation, Collaboration/Co-operative learning session Group discussion Seminars Narrative Expression Assignment	▪ Performance analysis in group discussions ▪ Observation ▪ Participation in the Seminar sessions ▪ Assessment of reflective diary ▪ Assessment of assignment ▪ **CE - Seminar**

Reference

- Text books and Handbooks of Mathematics for standard 8,9 &10 in Kerala syllabus
- Soman, K. *Ganitha sasthra bodhanam*.Thiruvananthapuram: Kerala Bhasha Institute.
- Mangal, S.K. Teaching of Mathematics. Ludhiana: Prakash Brothers Educational Publishers.

Unit II: MICRO TEACHING (20 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquire the basic skills needed for effective teaching	▪ Microteaching skills, Microteaching lessons, Planning and preparation of Microteaching lesson plans ▪ Practicing Microteaching skills	Meaningful verbal presentation Group discussion,	▪ Performance analysis in group discussions ▪ Observation

		Brain storming	▪ Assessment of reflective diary
2. To develop the ability to make use of teaching skills by the practice of microteaching		Illustration of skills Simulation Videoclippings/video lessons	**Practicals** o Practice of skills

Reference

▪ James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications,Pvt Ltd.
▪ Mustafa,M.(2005). *Teaching of Mathematics.* New Delhi: Deep and Deep Publications Pvt. Ltd.
▪ Mangal, S.K. Teaching of Mathematics. Ludhiana: Prakash Brothers Educational Publishers.

Unit III : PLANNING AND DESIGNING OF INSTRUCTIONS (18 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand need, importance and stages of planning instructions in mathematics 2. To develop the ability to plan design year, unit and lesson plan	▪ Planning instructions, Need and Importance of planning, ▪ Stages of planning ▪ -Year plan, Unit plan and Lesson plan ▪ Preparation of lesson plans in Behaviourist and Constructivist formats	Meaningful verbal presentation, Collaboration/Co-operative learning session, Group discussion Reviewing previous lesson plans o Criticism lessons	▪ Questioning ▪ Performance analysis in group discussions ▪ Observation of classes ▪ Tests ▪ Examples cited in their lecture note ▪ Assessment of practical records on Discussion, demonstration, criticism lessons. **Test – I (CE)** **Practicals** o Discussion lessons o Observation of video lessons o Demonstration lessons

References

- Text books and Handbooks of Mathematics for standard 8,9 &10 in Kerala syllabus
- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications,Pvt Ltd.
- Soman, K. *Ganitha sasthra bodhanam*.Thiruvananthapuram: Kerala Bhasha Institute.

Unit IV : DESIGN AND DEVELOPMENT OF LEARNING AIDS (11 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand different methods of concretising abstract ideas 2. To understand the need, importance and different types of learning aids in mathematics 3. To provide hands on experience on modern learning supporting gadgets for each student	▪ Learning aids, Concretisation of abstract ideas in mathematics, ▪ Need and Importance of Learning aids, ▪ Different types of learning aids, modern learning supporting gadgets, Hands on experience of the modern learning supporting gadgets	Meaningful verbal presentation Collaboration/Co-operative learning sessions Group activities (teaching aids), Sessions in small or medium groups Brain storming-Video clippings	▪ Assessment/Evaluation of learning aids ▪ Performance analysis in group discussions/tasks ▪ Questioning ▪ Written test ▪ Practical tests

References

- Mangal, S.K. Teaching of Mathematics. Ludhiana: Prakash Brothers Educational Publishers.
- Kumar,S.& Ratnalikar,D.N. (2003). *Teaching of Mathematics*. New Delhi: Anmol Publications Pvt. Ltd.
- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications,Pvt Ltd.
- Mangal, S.K. Teaching of Mathematics. Ludhiana: Prakash Brothers Educational Publishers

Unit V : SELF-REFLECTION AND PEER EVALUATION IN CLASS ROOM (9 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept of self-reflection and peer evaluation 2. To develop the ability to plan and design rubies for Self-reflection and peer evaluation	▪ Concept of Self-reflection and peer evaluation, ▪ Schedule for self-reflection and peer evaluation, ▪ Planning and Designing rubrics for Self-reflection and peer evaluation	Meaningful verbal presentation Collaboration/Co-operative learning sessions Group discussion Seminars Brain storming E - learning	▪ Questioning ▪ Performance analysis in group discussions ▪ Observation ▪ Written test ▪ Participation in the Seminar sessions ▪ Online evaluation

Reference

- Mustafa,M.(2005). *Teaching of Mathematics.* New Delhi: Deep and Deep Publications Pvt. Ltd.
- Mangal, S.K. Teaching of Mathematics. Ludhiana: Prakash Brothers Educational Publishers

Unit VI : ASSESSMENT AND EVALUATION IN MATHEMATICS (19 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept, meaning, scope and types of evaluation in mathematics 2. To understand the concept,purpose,steps, analysis of results ,identification of difficulty (Diagnostic Chart) and Remedial teaching of diagnostic test in mathematics	▪ Concept of Educational Evaluation, Different types of Evaluation ▪ Concepts of Placement, formative vs summative, product vs process, internal vs external, diagnosis, CCE and Objective-based evaluation, ▪ Concept of Educational Diagnosis ▪ Diagnostic test – Concept, purpose ,steps, analysis of results ,identification of difficulty (Diagnostic Chart) and Remedial teaching	Meaningful verbal presentation Collaboration/Co-operative learning session Group discussion Seminars	▪ Performance analysis in group discussions ▪ **CE - Practicum** ▪ Observation ▪ Participation in the Seminar sessions ▪ Preparation of test items/Diagnostic test(2nd semester) ▪ Evaluation of reflective diary

3. To understand the concept purpose, Construction, Statistical analysis and Interpretation of achievement test in mathematics 4. To differentiate achievement and diagnostic test in mathematics 5. To understand the qualities of good achievement test 6. To develop the ability to prepare a test assessing problem solving abilities/ thinking abilities based on a topic in mathematics	▪ Type of test items – Objective type, short answer type and Essay type ▪ Concept of Achievement Test –, purpose, Construction, Statistical analysis and Interpretation, ▪ Distinction between Teacher made test and standardised test ▪ Distinction between Achievement and Diagnostic Test ▪ Qualities of good Test, Concept of a good test ▪ Preparation of a test assessing problem solving abilities/ thinking abilities based on a topic in mathematics	Brain storming Web based instruction **Practicals** o Preparation of Diagnostic Test (2nd Semester)	▪ Referring various tools ▪ Preparation of achievement test ▪ Assessment of problem solving ability /thinking ability test. ▪ **Test – II (CE)**

Reference

- Mangal, S.K. *Teaching of Mathematics.* Ludhiana: Prakash Brothers Educational Publishers.
- Kumar,S.& Ratnalikar,D.N.(2003). *Teaching of Mathematics*. New Delhi: Anmol Publications Pvt. Ltd.
- Aggarwal, J.C. (2001). Principles, Methods & Techniques of Teaching (2nd ed.). New Delhi: Vikas Publishing House Pvt. Ltd.
- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications,Pvt. Ltd.
- James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd.
- Mustafa,M.(2005). *Teaching of Mathematics.* New Delhi: Deep and Deep Publications Pvt. Ltd.
- Siddiqui, M. H. (2007). *Teaching of Mathematics*. New Delhi: APH Publishing Corporation.
- Wadhwa, S. (2000). Modern *Methods of Teaching Mathematics*. New Delhi: Sarup & Sons.
- Mangal, S.K. Teaching of Mathematics. Ludhiana: Prakash Brothers Educational Publishers.
- Soman, K. *Ganitha sasthra bodhanam.*Thiruvananthapuram: Kerala Bhasha Institute.
- Text books and Handbooks of Mathematics for standard 8, 9 &10 in Kerala syllabus.

EDU 05.8 – PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS – PHYSICAL SCIENCE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives
- To develop practical field based skill and experience in resource development and learning experience designing while transacting the science curriculum
- To infuse an attitude for undertaking the contextual challenges as a Science Education professional.
- To provide the required research based science learning experiences so as to undertake a habit of self-development through inquiry and investigation
- To enrich the vision and capabilities of prospective science teachers as reflective practitioners during and after the pre-service education.

Contents

Unit 1	:	**Introduction to Pedagogic Content Knowledge Analysis**
Unit 2	:	**Planning and Designing of Lesson Templates**
Unit 3	:	**Essential Requirements for Teaching and Learning**
Unit 4	:	**Teaching and Learning Enhancement Tools**
Unit 5	:	**Fundamentals of Assessment and Evaluation in Science Classrooms**
Unit 6	:	**Self Reflection and Peer Evaluation in Classrooms**

Unit I : Introduction to Pedagogic Content Knowledge Analysis (10+4=14 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand pedagogic content knowledge (PCK) and find its scope in teaching and learning	• Pedagogic Content Knowledge (PCK) – its scope in teaching and learning –content analysis – meaning, purpose, steps – Working with PCK (Selecting instructional objectives; objectives that can be realized, learning aids that are to be used, general methods or strategies that can be relied upon, principles of selecting instructional strategies, learning experiences that are to be	Meaningful verbal expression Group discussion Net Surfing Digital Presenta-tion Seminar Debate	• Analysis in group discussion • Assessment of optional notebook entries • MCQ based quiz • Open Forum

2.	To understand and practice pedagogic analysis	provided, evaluation techniques to be adopted) ▪ Principles of student efforts in learning – opportunity for maximum student efforts ▪ Pedagogic Content Knowledge Analysis of Physics and Chemistry content from Std 7 – 10 of Kerala State syllabus.	Turn Around K-W-L charting Document writing	▪ Crossword puzzles ▪ **Practicum - CE**

Unit II : Planning and Designing of Lesson Templates (16+8=24 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with planning of instruction 2. To design lesson templates based on different formats	▪ Planning – Year plan – Unit plan – Resource unit – Lesson plan – purpose – different formats (Herbatian steps, behaviourist format, constructivist format, format based on models of teaching such as CAM, ITM, and Roe Play (any three minimum) , -IT supported lesson(1).	Meaningful verbal expression Group discussion Explicit Teaching Peer Tutoring	▪ Analysis in group discussion ▪ Assessment of optional notebook entries **Practicals** o Discussion Lesson Template Preparation (7) o Demonstration Lessons (05)

Unit III : Essential Requirements for Teaching and Learning (8+4=12 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand microteaching and its relevance in the development of teaching skills 2. To design and develop micro lessons based on select 10 teaching skills. 3. To practice the micro lessons in science classrooms	▪ Prerequisites for learning ▪ Teaching skills: Microteaching–Definition, principle, Steps, Microteaching cycle. Development of teaching skills – selected teaching skills – Set induction, Reinforcement, Explaining, Illustrating with examples, Questioning , Using Chalk Board, Stimulus Variation , Silence and Non-Verbal	Meaningful verbal expression Group discussion Document analysis and peer instruction Video Observa-tion	▪ Analysis in group discussion ▪ Lesson Segment preparation ▪ Observation Schedule Designing ▪ Think, Pair and Share Sessions ▪ **Practicals** o Observation and Analysis of Video of Sample Classes (03) o Criticism Lesson Templates (7)

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	Cues, Achieving Closure. ■ Design and development of 10 micro lessons – practice and documentation. ■ Link practice.	Mind mapping Learning Circles	o Micro teaching ■ **CE –Test – I** ■ **CE - Seminar**

Unit IV : Teaching and Learning Enhancement Tools (6+6=12 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the importance of audio-visual aids in learning Physical Science. 2. To acquire hands-on experience in designing and developing suitable learning aids for classroom instruction 3. To be able to document the development of learning aids	■ Audio-visual aids-importance of AV aids in Science learning ■ Learning aids – designing , developing and documenting graphic aids , projected aids and improvised aids	Narrative expression sessions in small or medium groups Document analysis You Tube Resource tapping Demonstra-tion in Groups Drill and Practice Lab sessions	■ Optional level focused discussion ■ Seminar ■ Improvisation sessions in small groups ■ Graphic organizer Designing ■ Peer Assessment Sessions ■ **Practicals** o -ICT Integrated Lesson Transcript Designing (01) o -Script Development of Video Lesson (01)

Unit V : Fundamentals of Assessment and Evaluation in Science Classrooms (10+4=14 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the construction of achievement test and diagnostic test. 2. To familiarize with continuous comprehensive evaluation and the grading system	■ Forms of questions - Objective, short answer and essay type Tests : Achievement test – construction, Diagnostic test – construction – remedial instruction ■ Continuous comprehensive evaluation – grading system – rubrics for assessment of assignments, projects, debates, seminars,	Meaningful verbal expression Group discussion Preparation of rubrics Buzzer Sessions Seminars	■ Class tests ■ Assessment of rubrics ■ Read Aloud ■ Puzzle Develop-ment ■ Participant Observation ■ MCQ based Quiz ■ Concept paper preparation

	discussion – assessment of thinking skills – critical and creative thinking – assessment of process skill in Physical science. ▪ Reflection and feedback – Assessing student's performance.	Document Analysis Peer Tutoring Scenario Based Learning	
3. To develop rubrics for CCE assessment			

Unit V : Self reflection and peer evaluation in classrooms (6+2=8 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept of self reflection and peer evaluation. 2. To develop and practice rubrics for self reflection and peer evaluation.	▪ Concept of self reflection and peer evaluation – development and practice of rubrics. (To be practiced during teaching practice)	Group discussion Document analysis and peer instruction Log Book/Journal Demonstration-Illustration sessions Net Surfing Online Video Streaming	▪ Analysis in group discussion ▪ Evaluation of daily reflective journals ▪ Think-Share and Pair Observation sessions ▪ **CE – Test/Model Exam**

Reference

- Brown G. (2001): Assessment: A Guide for Lecturers. Assessment Series:, York, LTSN.
- Brown S. & Smith B. (1997): Getting to Grips with Assessment.: , Birmingham, SEDA.
- Germaine L. Taggart (1998): Rubrics: A Handbook for Construction and Use: Virginia, Rowman & Littlefield Education.
- Habeshaw S., Gibbs G. & Habeshaw, T. (1993): 53 Interesting Ways to Assess your Students: Trowbridge, Cromwell Press Ltd.
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- Julie Gess- Newsome & Norman G. Lederman(1999): Examining Pedagogical Content Knowledge: Netherlands, Kluwer Academic Publishers.
- Knight P. (2001): A Briefing on Key Concepts - Assessment Series: York, LTSN.
- Mishra R. C. (2008): Lesson Planning: New Delhi, A P H Publishing Corporation.
- Radha Mohan(2007): Innovative Science Teaching: New Delhi, Prentice Hall of India Pvt. Ltd.
- Y K Singh & Archnesh Sharma(2004): Micro Teaching: New Delhi, A P H Publishing Corporation.

EDU 05.9: PEDAGOGIC CONTENT KNOWLEDGE ANAYSIS - NATURAL SCIENCE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

OBJECTIVES

- Enable the student teachers to:
- Comprehend the dimensions of pedagogical analysis
- Pedagogic content knowledge analysis of Secondary School biology Syllabus.
- Understand and apply the different skills for teaching Natural Science
- Understand and prepare teaching manuals based on different instructional strategies.
- Prepare and use suitable learning aids for Natural Science teaching
- Prepare different types of assessment and evaluation tools in classroom teaching
- Critically analyze the syllabus at secondary level.

CONTENTS

Unit I	:	**Pedagogic content knowledge and pedagogic analysis of teaching Natural Science.**
Unit II	:	**Types of planning instruction, different approaches of designing lesson plans and models of teaching.**
Unit III	:	**Teaching skills and its development.**
Unit IV	:	**Design and development of teaching learning materials for enhancing science learning-visual, projected, non-projected and activity aids.**
Unit V	:	**Preparation and practice of assessment and evaluation tools.**

Unit I : PEDAGOGICAL ANALYSIS OF TEACHING NATURAL SCIENCE   (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To generate a knowledge of terminologies and the interdependence of teaching and learning. 2. To familiarize and develop general and specific teacher competencies in analyzing content.	▪ Pedagogic Content Knowledge (PCK) - Meaning, objectives, scope, principles and dimensions. ▪ Pedagogic content analysis of secondary school syllabus prescribed by SCERT.	Meaningful verbal expression Group discussion Narrative expression sessions in small or medium groups	▪ Performance assessment in group discussion ▪ Assessment of Optional Note Book entries ▪ Questioning and quizzes ▪ Tests ▪ Peer evaluation

		Document analysis and peer instruction	▪ Student's portfolio
3. To familiarize the secondary school biology syllabus. 4. To understand the maxims of teaching. 5. To apply the principles of pedagogic analysis.			**CE-Seminar based on High School biology(marks-5)**

References

- Text books and hand books of High School Biology Syllabus prescribed by SCERT
- Julie Gess- Newsome & Norman G. Lederman(1999): Examining Pedagogical Content Knowledge: Netherlands, Kluwer Academic Publishers.
- Mishra R. C. (2008): Lesson Planning: New Delhi, A P H Publishing Corporation.
- Radha Mohan(2007): Innovative Science Teaching: New Delhi, Prentice Hall of India Pvt. Ltd.
- Mathew,T.K., and Molikutyy, T.M, (2006).Science Education- Theoretical Base of Teaching and Pedagogic Analysis, Rainbow Book Publishers,Kerala.
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Unit II : INSTRUCTIONAL PLANNING FOR TEACHING NATURAL SCIENCE (23hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of different types of planning.	▪ Meaning and importance of planning, Types of planning – Year plan, Unit plan, lesson plan and Resource Unit ▪ Designing lesson plans based on following approaches and Models of teaching-Herbartian Approach, Constructivist Approach, Concept Attainment Model, Inquiry Training Model,5 E Model of BSCS , Inductive Thinking Model, Role play model and IT supported lessons .	Discussions in small or medium groups. Brain storming. Seminar. Reflective practices. Debate. PBL. Multimedia and	▪ Performance assessment in group discussion ▪ Peer evaluation

		interdisciplinary approach.	▪ **Practicals**
2.	To develop skill in designing lesson plans based on different approaches and models of teaching.	Team teaching. Peer tutoring Group discussion. Narrative expressions	○ Discussion lessons -10- ○ Computer/ ICT enabled lesson (One group work.) ▪ **CE-Test No1**

References

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- Krishna Kumar (2005): National Curriculum Framework: New Delhi, NCERT , MHRD, Govt. of India.
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- Jessy Mathews., (2008).Teaching of Natural Science –Theory, Perspectives and Practices. Methodology of teaching life sciences.
- Narendera Vaidhya, (2006).Science Teaching in School for the 21st Century ,deep and deep publications PVT, New Delhi.
- Mathew,T.K., and Molikutyy, T.M, (2006).Science Education- Theoretical Base of Teaching and Pedagogic Analysis, Rainbow Book Publishers, Kerala.
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Unit III : TEACHING SKILLS AND ITS DEVELOPMENT   (18 hours)

Learning Outcome	**Contents / Major concepts**	**Strategies, Approaches**	**Assessment**
1. To understand the different types of teaching skills. 2. To identify the teaching skills relevant to Natural science. 3. To familiarize the different phases of micro teaching. 4. To develop skill in practicising	▪ Teaching skills –Definition, Core teaching skills, Components of teaching skills, Teaching skills specially required for biology teacher. ▪ Micro-teaching: Objectives, Micro-teaching cycle - its relevance in teacher training programmed.	Discussions in small or medium groups. Brain storming. Seminar. Reflective practices. Debate.	▪ Performance assessment in group discussion ▪ Assessment of performance in brain storming, ▪ symposium . ▪ Questioning ▪ Tests

micro lesson.	▪ Design and development of micro lessons- practice and documentation.	PBL. Multimedia and interdisciplinary approach. Team teaching. Peer tutoring Group discussion. Narrative expressions	▪ Peer evaluation
			
			▪ **Practicals**
			  o Observation of Video lesson & reporting
			  o Micro teaching lesson preparation and practice of skill
			  o Video lesson script and recording

References

- Allen,D.W,(1996).Microteaching:A Dessciption, Stanford University,School of Education,California.
- Hayward, Dave(2003). Teaching and Assessing Practice Skills in Science ,Cambridge University Press,UK.
- Mathew,T.K., and Molikutyy, T.M, (2006).Science Education- Theoretical Base of Teaching and Pedagogic Analysis, Rainbow Book Publishers,Kerala.

Unit IV : DESIGN AND DEVELOPMENT OF MATERIALS FOR ENHANCING SCIENCE LEARNING (13 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize the meaning and definition of audio-visual aids 2. To identify and comprehend the different types of audiovisual aids in teaching Natural Science. 3. To develop skill in improvisation . 4. To apply multimedia in teaching Natural Science. 5. To design, prepare and familiarize the teaching learning aid for Natural Science.	▪ Audiovisual aids – Significance in science learning .Designing, developing and documenting minimum of one item for - improvised, Visual and graphic aids -Charts, Models, , Diagrams, Pictures, Posters. Projected and non- projected aids-OHP, LCD, , Bulletin Board, Flannel Board etc ▪ Activity aids -Aquarium, Terrarium, Nature Calendar, collection and preservation of specimens etc.	Discussions in small or medium groups. Brain storming Seminar. Reflective practices. Debate. PBL. Multimedia and interdisciplinary approach. Team teaching. Peer tutoring.	▪ Performance assessment in group discussion, debate etc. ▪ Assessment of assignments ▪ Questioning and quizzes ▪ Tests ▪ Peer evaluation Student's portfolio ▪ **CE-practicum**

Reference

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- Raj kumar singh .,(2011). Audio-Visual Aids for teaching English ,Anmol publications,Delhi.
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Unit V : ASSESMENT AND EVALUATION IN CLASSROOMS (10hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand about different types of Evaluation and Assessment tools. 2. To develop skill in the preparation of different types of Schedules and matrix for assessing performance. 3. To prepare different types of test items. 4. To administer oral and open book examination.	▪ Objective based evaluation. ▪ Preparation and practice of Assessment &Evaluation tools- Tests- Different test items (HOT, LOT Questions) , Achievement and Diagnostic tests, Remedial Teaching. Open book examination. Test for thinking skills. ▪ Continuous comprehensive evaluation- Grading system-Rubrics for assessment of Assignments, Projects, Debates, Seminars, Discussions. ▪ Reflection and feedback- Assessment of student's performance. ▪ Development and practice of rubrics for self reflection and peer evaluation.	▪ Meaningful verbal expression ▪ Group discussion ▪ Narrative expression sessions in small or medium groups ▪ Reflective practices. ▪ Debate. ▪ PBL. ▪ Multimedia and interdisciplinary approach. ▪ Team teaching. ▪ Peer tutoring	▪ Performance assessment in group discussion ▪ Assessment of Optional Note Book entries ▪ Questioning and quizzes ▪ Tests ▪ Peer evaluation ▪ Portfolio assessment ▪ **CE-Test**

References

- Majibul hussan., (2009).Educational Evaluation,A P H Publishing Corporation, New Delhi.
- Sidhu. K.S, (2005). New Approaches to Measurement and Evaluation, Sterling Publishing,Delhi.
- Robert M.Thorndike., (2011).Measurement and Evaluation in Psychology and Education. Sterling Publishing,Delhi.
- Mathew,T.K., and Molikutyy, T.M, (2006).Science Education- Theoretical Base of Teaching and Pedagogic Analysis, Rainbow Book Publishers,Kerala.
- Jessy Mathews., (2008).Teaching of Natural Science –Theory, Perspectives and Practices, Methodology of Teaching life sciences.

EDU 05.10 - PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS OF SOCIAL SCIENCE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:
- To develop understanding about the principles of Pedagogic analysis and to analyse the objectives, contents and process of Social Science textbook and handbooks of secondary level.
- To develop skills for transaction and to practice micro teaching skills for effective teaching of Social Science
- To acquaint with planning of instruction and to familiarize the planning of Year plan, Unit plan and lesson plan.
- To develop understanding and skills about different learning aids and to prepare suitable learning aids for teaching Social Science.
- To understand the meaning and different approaches of evaluation and to prepare test items as per the state pattern in Social Science.

Contents

Unit 1	: **Fundamentals of Pedagogic Analysis**
Unit 2	: **Content Analysis in Social Science**
Unit 3	: **Microteaching in Social Science**
Unit 4	: **Planning for Social Science teaching**
Unit 5	: **Learning aids in Social Science**
Unit 6	: **Evaluation in Social Science**

Unit I: Fundamentals of Pedagogic Analysis (8 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand principles of pedagogic analysis	▪ Meaning and definition of pedagogical analysis ▪ Need, significance and principles of pedagogical analysis	Discussion – Assignment	▪ Assessment of learning process and reflections

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References

- Kumar, S.P.K & Noushad,P.P.(2009). Social Studies in the Classroom: Trends andMethods.
- Kochhar, S.K. (2002). The Teaching of Social Studies. New Delhi: Sterling.
- Dash, B. N.(1998). Content cum Methods of Teaching Social Studies. Ludhiana: Kalyani Publishers.
- Pathak R.P.(2012).Teaching of social studies. Pearson, Delhi
- Edigar, M. & Rao, B. (2003).Teaching Social Studies Successfully. New Delhi: Discovery Pub.House.
- www.moodle.org
- http://teamwork.sg/teamwork/schoolportal.aspx
- http://en.wikipedia.org/wiki/Wiki

Unit II: Content Analysis in Social Science (15 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To analyse the content of Social science text books and hand books	• Relevant content areas of standard 8, 9 & 10-history, geography, political science, economics and sociology areas	Group work-prepare content analysis of one chapter each-listing of learning objectives, facts, concepts and detailing of strategies.	• Internal text for 2 units **(CE-1) Test** Analysis of Mateirls

References

- Social Science text book of standard 8,9 & 10 of Kerala
- Teachers' Hand book in Social Science for standard 8,9 &10
- Varma, O. P. & Vedanayagam, E. G. (1993). Geography Teaching. N. Delhi: Sterling.
- Cornwell, R. D. (1985). World History in the Twentieth Century. England: Longman.
- Joshi, P. S., Gholkar S.V. (1983). History of Modern India. N. Delhi: S.Chand & CompanyLtd.
- Kaur, Dhian & Chandana, R. C. (ed.) (2006). The Earth: Ludhiana: Kalyani Publishers.
- Singh R. L., Singh, Rana, P. B. (2002). Elements of Practical Geography. N. Delhi: Kalyan Publishers.

Unit III: Microteaching in Social Science (17 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept of microteaching 2. To practice important micro teaching skills	▪ Concept of micro teaching & principles ▪ Steps in micro teaching ▪ Important micro teaching skills- components ▪ Link practice in Micro teaching	Lecture- question answer-demonstration – video presentation-practice of skills by student teachers	▪ **Practicals** o Performance in skill presentation (Practical evaluation)

References

- Aggarwal, J.C. (2003). Teaching of Social Studies: A Practical Approach. Mumbai: Vikas Publishing House.
- Kumar, S.P.K & Noushad,P.P.(2009). Social Studies in the Classroom: Trends and Methods.
- Allen,D & Ryan, K (1969). Micro teaching. London: Adison Wesley
- Edigar, M. & Rao, B. (2003).Teaching Social Studies Successfully. New Delhi: Discovery Pub. House.
- Dash, B. N.(1998). Content cum Methods of Teaching Social Studies. Ludhiana: Kalyani Publishers.
- http://en.wikipedia.org/wiki/Wiki

Unit IV: Planning for Social Science teaching (25 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand need and significance of planning for instruction	▪ Need and importance of planning- planning for instruction	Discussion –analyse points to consider for preparing year plan, unit plan& lesson plan and its relative importance Prepare a model year plan and unit plan (As prepared in Schools)	▪ **Practicals** o Discussion lessons(7 Lessons) o Video observation (Record) o Script for video lesson o ICT enabled lesson plan o Demonstration observation (Record) o Criticism lessons

| | 2. | To practice different levels of planning | ▪ Year plan & unit plan- need and significance
▪ Lesson plan- principles, need and significance | Discussion lessons-develop lesson plans.

Video observation-

Develop script for video lesson - Observe Demonstration classes

Criticism lesson practice | |

References

- Aggarwal, J.C. (2003). Teaching of Social Studies: A Practical Approach. Mumbai: Vikas Publishing House.
- Kumar, S.P.K & Noushad,P.P.(2009). Social Studies in the Classroom: Trends and Methods.
- Bining, A.C & Bining, D.H. (1952) Teaching Social Studies in Secondary Schools. New York: McGraw Hill
- Clark, L.H.(1973). Teaching Social Studies in Secondary Schools.(2nd Ed.)New York: McMillan.
- Green, G.H. (1987). Planning the Lesson. London: Longman
- http://en.wikipedia.org/wiki/Wiki

Unit IV: Learning aids in Social Science (12 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the different learning aids and its utilization in Social science	▪ Need and significance of Learning aids - Graphic aids- Charts, Graphs, Pictures, Maps. 3D aids- Models, Realia, and Glob. AV aids- Radio, TV, Tape recorder, Film and Computer Display boards- Chalk board, Bulletin board and interactive board Projected aids- OHP and LCD	Listing of learning aids- analyse its utility with examples from content area and prepare notes Prepare visual learning aids needed to classroom teaching (work shop)	▪ Assessment of learning process and reflections ▪ Observe the utilization of learning aids during practice teaching (part of practical evaluation)

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References

- Aggarwal, J.C. (2003). *Teaching of Social Studies: A Practical Approach.* Mumbai:Vikas Publishing House.
- Kumar, S.P.K & Noushad,P.P.(2009). *Social Studies in the Classroom: Trends andMethods*.
- Pathak R.P.(2012).Teaching of social studies. Pearson, Delhi
- Entwistle, N.J. (1987). Understanding Classroom Learning. London: John Wiley
- Skinner, B. F. (1968).The Technology of Teaching. New Jersey: Prentice Hall.
- Kilpatrick, W. H. (1969). The Project Method. New York: Teachers' College Press
- http://en.wikipedia.org/wiki/Wiki

Unit IV: Evaluation in Social Science (7 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept and techniques of evaluation in Social Science	- Concept and purpose of evaluation- modern evaluation techniques - Need of Continuous & Comprehensive Evaluation and Grading - Diagnostic and Achievement tests	Seminar on evaluation- its prospects and problems Analyse present school evaluation methods with material support (issued by SCERT)- group task Identify indicators of CE items- prepare design & blue print as per the existing school evaluation system Conduct one diagnostic test and one achievement test during practice teaching	- Seminar (Preparation, presentation and report) – **CE-2** - Internal test for 4&5 units –**CE-3/Model exam**

Reference

- Aggarwal, J.C. (2003). Teaching of Social Studies: A Practical Approach. Mumbai: Vikas Publishing House.
- Kumar, S.P.K & Noushad,P.P.(2009). Social Studies in the Classroom: Trends and Methods.
- Pathak R.P.(2012).Teaching of social studies. Pearson, Delhi
- http://www.ncert.nic.in
- http://www.ciet.nic.in/
- http://www.education.nic.in

EDU 05.11: PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS-GEOGRAPHY

Instructional Hours – 84 (Theoretical discourses – 60 & Related Practical work – 24)

Objectives:
- To develop understanding about the principles of Pedagogic analysis and to analyse the objectives, contents and process of Geography textbooks and handbooks of secondary level.
- To develop skills for transaction and to practice micro teaching skills for effective teaching of Geography
- To acquaint with planning of instruction and to familiarize the planning of Year plan, Unit plan and lesson plan.
- To develop understanding and skills about different learning aids and to prepare suitable learning aids for teaching Geography
- To understand the meaning and different approaches of evaluation and to prepare test items as per the state pattern in Geography.

Contents

Unit 1	**: Fundamentals of Pedagogic Analysis**	
Unit 2	**: Content Analysis in Geography**	
Unit 3	**: Microteaching in Geography**	
Unit 4	**: Planning for Geography teaching**	
Unit 5	**: Learning aids in Geography**	
Unit 6	**: Evaluation in Geography**	

Unit I: Fundamentals of Pedagogic Analysis (10 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand principles of pedagogic analysis	▪ Meaning and definition of pedagogical analysis ▪ Need, significance and principles of pedagogical analysis	Discussion – Assignment Meaningful verbal learning Co operative/ collaborative learning Group discussion	▪ Assessment of learning process and reflections

Reference

- Arora, M.L.(1979)Teaching of Geography, Prakash Brothers, Ludhiana.
- Gopill, G.H.(1966) Teaching of Geography, Macmillan, London
- Garnett, Olive. (1967) Fundamentals in School Geography, George G., Harrap and company, London.
- Varma, O.P., and Vedanayagam, E.G.(1987) Teaching of Geography, Sterling Publishers Private Limited, New Delhi.
- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green and Company.
- Barnard. H.C.(1963).Principles and Practices of teaching Geography, Bihar Hindi Grandh Academy,Patna.
- Prasad Jagdish. (1982). Teaching of Geography, Vinod Pustak Mandir, Agra
- Singh. H.W.(1985). Teaching of Geography, Vinod Pustak Mandir, Agra
- www.moodle.org
- http://teamwork.sg/teamwork/schoolportal.aspx
- http://en.wikipedia.org/wiki/Wiki

Unit II: Content Analysis in Geography (15 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To analyse the content of Geography text books and hand books	• Content analysis of standard 8,9 & 10 text books(relevant content areas)-listing of objectives, curricular objectives, pre-requisites, teaching strategies, resources, learning activities and evaluation strategies	Group work-prepare content analysis of one chapter each-listing of learning objectives, facts, concepts and detailing of strategies.	• Internal text for 2 units (CE-1) Analysis of Products

Reference

- Geography text book of standard 8,9 & 10 of Kerala
- Teachers' Hand book in Geography for standard 8,9 &10
- Varma, O. P. & Vedanayagam, E. G. (1993). Geography Teaching. N. Delhi: Sterling.
- Kaur, Dhian & Chandana, R. C. (ed.) (2006). The Earth: Ludhiana: Kalyani Publishers.
- Singh R. L., Singh, Rana, P. B. (2002). Elements of Practical Geography. N. Delhi: Kalyan Publishers.

Unit III: Microteaching in Geography (15 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept of microteaching 2. To practice important micro teaching skills	▪ Concept of micro teaching & principles ▪ Steps in micro teaching ▪ Important micro teaching skills- components ▪ Link practice in Micro teaching	Lecture- question answer demonstration – video presentation- practice of skills by student teachers	▪ **Practicals** o Performance in skill presentation (Micro teaching)

Reference

- Allen,D & Ryan, K (1969). Micro teaching. London: Adison Wesley
- Edigar, M. & Rao, B. (2003).Teaching Social Studies Successfully. New Delhi: Discovery Pub.House.
- Varma, O. P. & Vedanayagam, E. G. (1993). Geography Teaching. N. Delhi: Sterling.
- Dash, B. N.(1998). Content cum Methods of Teaching Social Studies. Ludhiana: Kalyani Publishers.
- http://en.wikipedia.org/wiki/Wiki

Unit IV: Planning for Geography teaching (26 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To understand need and significance of planning for instruction	▪ Need and importance of planning- planning for instruction	Discussion –analyse points to consider for preparing year plan, unit plan& lesson plan and its relative importance
		
		Prepare a model year pan and unit plan (As prepared in Schools)
			▪ **Practicals**
			  o Discussion lessons
			  o Video observation (Record)
			  o Script for video lesson
			  o ICT enabled lesson plan

2. To practice different levels of planning	▪ Year plan & unit plan- need and significance ▪ Lesson plan- principles, need and significance	Discussion lessons- develop lesson plans. Video observation- Develop script for video lesson Observe Demonstration classes Criticism lesson practice	o Demonstration observation (Record) o Criticism lessons

References

- Arora, M.L.(1979)Teaching of Geography, Prakash Brothers, Ludhiana.
- Gopill, G.H.(1966) Teaching of Geography, Macmillan, London
- Garnett, Olive. (1967) Fundamentals in School Geography, George G., Harrap and
- company, London.
- Varma, O.P., and Vedanayagam, E.G.(1987) Teaching of Geography, Sterling Publishers
- Private Limited, New Delhi.
- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green and
- Company.
- Barnard. H.C.(1963).Principles and Practices of teaching Geography, Bihar Hindi Grandh Academy,Patna.
- Prasad Jagdish. (1982). Teaching of Geography, Vinod Pustak Mandir, Agra
- Singh. H.W.(1985). Teaching of Geography, Vinod Pustak Mandir, Agra
- Green, G.H. (1987). Planning the Lesson. London: Longman
- http://en.wikipedia.org/wiki/Wiki

Unit V: Learning aids in Geography (10 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the different learning aids and its utilization in Geography	▪ Need and significance of Learning aids ▪ Graphic aids- Charts, Graphs, Pictures, Maps.	Listing of learning aids- analyse its utility with examples	▪ Assessment of learning process and reflections ▪ CE-Practicum

	▪ 3D aids- Models, Realia, and Glob. ▪ AV aids- Radio, TV, Tape recorder, Film and Computer ▪ Display boards- Chalk board, Bulletin board and interactive board ▪ Projected aids- OHP and LCD	from content area and prepare notes Prepare visual learning aids needed to classroom teaching (work shop)	▪ Observe the utilization of learning aids during practice teaching (part of practical evaluation) ▪ CE-Test/Model exam.

References

- Arora, M.L.(1979)Teaching of Geography, Prakash Brothers, Ludhiana.
- Gopill, G.H.(1966) Teaching of Geography, Macmillan, London
- Garnett, Olive. (1967) Fundamentals in School Geography, George G., Harrap and company, London.
- Varma, O.P., and Vedanayagam, E.G.(1987) Teaching of Geography, Sterling Publishers Private Limited, New Delhi.
- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green and Company.
- Barnard. H.C.(1963).Principles and Practices of teaching Geography, Bihar Hindi Grandh Academy,Patna.
- Prasad Jagdish. (1982). Teaching of Geography, Vinod Pustak Mandir, Agra
- Singh. H.W.(1985). Teaching of Geography, Vinod Pustak Mandir, Agra
- Entwistle, N.J. (1987). Understanding Classroom Learning. London: John Wiley
- Skinner, B. F. (1968).The Technology of Teaching. New Jersey: Prentice Hall.
- Kilpatrick, W. H. (1969). The Project Method. New York: Teachers' College Press
- http://en.wikipedia.org/wiki/Wiki

Unit VI: Evaluation in Geography (8 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept and techniques of evaluation in Geography	▪ Concept and purpose of evaluation- modern evaluation techniques ▪ Need of Continuous & Comprehensive Evaluation and Grading	Seminar on evaluation- its prospects and problems Analyse present school evaluation methods with material support	▪ Seminar (Preparation, presentation and report) – **CE-2** ▪ Internal test for 4&5 units – **CE-3**

	▪ Diagnostic and Achievement tests(concept, purpose, steps, analysis of results, identification of difficulty, remedial teaching, types of tests- distinction between standardized and non standardized test-qualities of test.	(issued by SCERT)- group task Identify indicators of CE items- prepare design & blue print as per the existing school evaluation system Conduct one diagnostic test and one achievement test during practice teaching	

References

- Varma, O.P., and Vedanayagam, E.G.(1987) Teaching of Geography, Sterling Publishers Private Limited, New Delhi.
- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green and Company.
- Barnard. H.C.(1963).Principles and Practices of teaching Geography, Bihar Hindi Grandh Academy,Patna.
- Geography Hand books for secondary classes
- http://www.ncert.nic.in
- http://www.ciet.nic.in/
- http://www.education.nic.in

EDU 5.12: PEDAGOGICAL CONTENT KNOWLEDGE ANALYSIS - COMMERCE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

To understand the key aspects involved in systematic PCK analysis

To develop skill in analyzing the content of higher secondary commerce text book

To justify the importance and phases of instructional planning in commerce discipline

To capacitate systematic planning and to develop skills in designing lesson templates

To equip prospective teacher educands in developing teaching skills through micro teaching practices

To conscientize the inevitable role of various instructional support in effective instructional practices.

To become competent in developing suitable testing mechanisms.

To develop the ability to use rubrics for quality assessment and become equipped for self and peer assessment.

Contents

Unit 1	:	**Nature and Scope of Pedagogical content knowledge analysis**
Unit 2	:	**Instructional Planning**
Unit 3	:	**Teaching Skills**
Unit 4	:	**Instructional Supports**
Unit 5	:	**Assessment and Evaluation**

Unit I: Nature and Scope of Pedagogical content knowledge analysis (14 Hrs +5 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the key aspects involved in systematic PCK analysis 2. To be capable of establishing relationship between pedagogic with content analysis 3. To develop skill in analyzing the	▪ Pedagogical content knowledge analysis (PCK) -Meaning, Scope, Features of PCK analysis, significance of PCK analysis in commerce discipline ▪ Relationship between pedagogic with content analysis Content Analysis – Procedure, facts, concepts, principles, process, rules,	Narrative expression session Text book analysis Collaborative learning	▪ Content analysis presentation ▪ Brief report on higher secondary text book analysis ▪ Internal test for unit 1 **(CE-1)**

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content of higher secondary commerce text book	equations. ▪ Content analysis of higher secondary business studies and accountancy text book.	Discussion Self directed learning	

References

- http://www.csun.edu/science/ref/pedagogy/pck/
- http://en.wikipedia.org/wiki/Technological_Pedagogical
- Aggarwal, J.C. (1996) A Practical Approach. New Delhi : Vikas Publishing House Pvt. Ltd.
- Raj, Rani Bansal (1999). New trends in teaching of Commerce New Delhi: Anmol Publications.
- Rao, Seema(2005) Teaching of Commerce. New Delhi: Anmol Publications Ltd
- Kumar, Mahesh (2004). Modern teaching of commerce. New Delhi: Anmol Publications Ltd
- Singh, V.K (2006). Teaching of Commerce. New Delhi: A.P.H.Publishing corporations.
- Rao, Digumarti Bhaskara(2006) Methods of teaching commerce(2006). New Delhi: Discovery publishing house
- Higher secondary business studies and accountancy text book(Plus 1 & Plus 2)

Unit II: Instructional Planning (20 Hrs + 5Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To justify the importance and phases of instructional planning in commerce discipline
2. To capacitate systematic planning and designs lesson templates
3. To develop skills in preparing lesson plan
	▪ Instructional planning –Importance, Phases Types - Year plan, Unit plan, Lesson plan, Resource unit
	▪ Procedure for the Preparation of year plan, unit plan and lesson plan
	▪
	▪ Lesson plan based on constructivist approach
	▪ ICT enabled lesson plans
	▪ Lesson plan based on Models of Teaching (any 5 models)
		Descriptive method
		
		Group discussion
		
		Demonstration method
		
		Co-operative learning
		
		Meaningful verbal learning
		
		Group discussion
			▪ **Practicals**
			  o Discussion lessons
			  o Video observation
			  o Script for video lesson
			  o ICT enabled lesson plans
			  o Demonstration lessons
			  o Criticism lessons

References

- http://answers.yahoo.com/question/
- http://www.ierg.net/**lesson**plans/**unit**_plans.php
- Green, G.H. (1987). Planning the Lesson. London: Longman

- http://en.wikipedia.org/wiki/Wiki
- Higher secondary business studies and accountancy text book(Plus 1 & Plus 2). SCERT, KERALA
- Teacher's handbook of business studies and accountancy text book(Plus 1 & Plus 2). SCERT, KERALA
- Aggarwal, J.C. (1996) A Practical Approach. New Delhi : Vikas Publishing House Pvt. Ltd.
- Raj, Rani Bansal (1999).Models of teaching and concepts of learning. New Delhi: Anmol Publications.
- Rao, Seema(2005) Teaching of Commerce. New Delhi: Anmol Publications Ltd
- Kumar, Mahesh (2004). Modern teaching of commerce. New Delhi: Anmol Publications Ltd
- Singh, V.K (2006). Teaching of Commerce. New Delhi: A.P.H.Publishing corporations.
- Rao, Digumarti Bhaskara(2006) Methods of teaching commerce(2006). New Delhi: Discovery publishing house

Unit III: Teaching Skills (12 Hrs + 5 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To equip prospective teacher educands in developing teaching skills through micro teaching practices 2. To generate skill orientation among prospective teacher educands through practical experiences	- Teaching skills – key concepts, mastery of skills, TAS formula - Micro teaching - Meaning, Phases, steps. - Link practice - Micro teaching – Lesson designs, Practice and assessment mechanisms.	Experiential learning Demonstration Reflective practices General discussion Demonstration method Analysis of video performance	- Micro teaching lesson notes/plans - **Practicals** o Performance in skill presentation - **CE - Test**

Reference

- http://www.scribd.com/doc/24590843/**Micro-Teaching-Skills**
- Allen,D & Ryan, K (1969). Micro teaching. London: Adison Wesley
- Aggarwal, J.C. (1996) A Practical Approach. New Delhi : Vikas Publishing House Pvt. Ltd.
- Dave, Pushkin (2001) Teacher Training. Californio : ABC CLIO
- Kochhar, S.K. (1985). Methods and Techniques of Teaching. New Delhi : Sterling Publishers Pvt. Ltd., Unit : 3
- Cooper, James M(1990) Classroom teaching skills.US: DC Health & Co

Unit IV: Instructional Supports (7 Hrs + 5 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
3. To conscientize the inevitable role of various instructional support in effective instructional practices. 4. To acquire skills in constructing and using different instructional aids.	▪ Instructional supports: Importance, educational values, classification of learning aids: projected, Non-projected and activity aids. ▪ Hands on experience: Computer, LCD Projector, Interactive white board and multi media	Illustration Demonstration General discussion Workshop Displays Demonstration	▪ Handling of various instructional aids ▪ Seminar (Preparation, presentation and report) – **CE-2**

References

- http://religionmanuals.tpub.com/14229/css/14229_322.htm
- Entwistle, N.J. (1987). Understanding Classroom Learning. London: John Wiley
- Skinner, B. F. (1968).The Technology of Teaching. New Jersey: Prentice Hall.
- Kilpatrick, W. H. (1969). The Project Method. New York: Teachers' College Press
- Raj, Rani Bansal (1999). New trends in teaching of Commerce: Models of teaching and concepts of learning. New Delhi: Anmol Publications.
- Rao, Seema(2005) Teaching of Commerce. New Delhi: Anmol Publications Ltd
- Kumar, Mahesh (2004). Modern teaching of commerce. New Delhi: Anmol Publications Ltd
- Singh, V.K (2006). Teaching of Commerce. New Delhi: A.P.H.Publishing corporations.
- Rao, Digumarti Bhaskara(2006) Methods of teaching commerce(2006). New Delhi: Discovery publishing house

Unit IV: Assessment and Evaluation (7 Hrs + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To become competent in developing suitable testing mechanisms. 2. To develop the ability to use rubrics for quality assessment.	▪ Assessment mechanisms: Quantitative and Qualitative. ▪ Achievement test, Diagnostic test, Performance test,	Meaningful Verbal expression Inductive approach Descriptive analysis	▪ Preparation of achievement test and diagnostic test

| 3. | To become equipped for self and peer assessment. | ▪ Portfolio assessment, Rubrics.
▪ Self & Peer assessment
▪ Art of questioning, LOT, MOT & HOT questions
▪ Deal answers | Focus group discussion

Experiential learning | ▪ Development of draft rubric
▪ Internal test for unit 5 –**CE-3**/Model Exam. |

References

- http://www.rpi.edu/~verwyc/Chap6TM.htm
- http://www.ncert.nic.in
- http://www.ciet.nic.in/
- http://www.education.nic.in
- Dymoke, Sue & Harrison, Jennifer (2008). Reflective teaching and learning. New delhi: SAGE
- Aggarwal, J.C. (1996) A Practical Approach. New Delhi : Vikas Publishing House Pvt. Ltd.
- Raj, Rani Bansal (1999). New trends in teaching of Commerce: Models of teaching and concepts of learning. New Delhi: Anmol Publications.
- Nayak & Rao (2004) Classroom Teaching – Methods and practices. New Delhi: APH Publishing Corporation.

EDU 05.13 : PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS - HOME SCIENCE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

To enable the student teachers to:

comprehend the dimensions of pedagogical analysis

analyze the content of Higher Secondary Home Science Syllabus

Critically analyse the Home Science syllabus at higher secondary level.

identify and develop teaching skills specially required for teaching Home Science

understand and prepare teaching manuals based on different instructional strategies.

Understand and apply the general and subject related skills, qualities and competencies for a Home Science teacher

prepare and use suitable learning aids for Home Science teaching

Contents
Unit I	: **Pedagogical Analysis of Teaching Home Science (13 Hours)**
Unit Ii	: **Teaching Skills and its Development (10 Hours)**
Unit Iii	: **Instructional Planning for Teaching Home Science (25 Hours)**
Unit Iv	: **Design and Development of Learning Aids for Enhancing Home Science Learning (12 Hours)**

Unit I: PEDAGOGICAL ANALYSIS OF TEACHING HOME SCIENCE (18 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the meaning, definition, objectives, scope and dimensions of pedagogic analysis 2. To identify the principles of pedagogic analysis 3. To get acquainted with the content	▪ Meaning, definition, objectives, scope and dimensions of pedagogic analysis ▪ Principles of pedagogic analysis ▪ Content analysis of Higher Secondary Home Science Syllabus prescribed by SCERT. ▪ Critical analysis of Home Science syllabus at higher secondary level.	Meaningful verbal expression Group discussion Workshop Seminar	▪ Performance assessment in group discussion, workshop, seminar ▪ Assessment of Optional Note Book entries ▪ Tests ▪ Peer evaluation

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
analysis of Higher Secondary Home Science Syllabus prescribed by SCERT. 4. To analyse the higher secondary Home Science syllabus critically			

Unit II: TEACHING SKILLS AND ITS DEVELOPMENT (20 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the teaching skills and core teaching skills 2. To familiarise with the components of teaching skills 3. To identify teaching skills specially required for teaching Home Science 4. To get aquainte with micro-teaching and apply the knowledge in practising the skills	▪ Teaching skills –Definition, Core teaching skills, Components of teaching skills. ▪ Identifying Teaching skills specially required for teaching Home Science ▪ Micro-teaching: Meaning, Objectives, Micro elements, Phases, Micro-teaching cycle. ▪ Practice of minimum 10 skills per class (preparation of matrix)	Lecture cum discussion Meaningful learning Demonstration Group discussion Document analysis Workshop	▪ Performance assessment in group discussion ▪ Tests ▪ Peer evaluation ▪ **CE – Test – I** ▪ **Practicals** o Micro teaching skills

Unit III: INSTRUCTIONAL PLANNING FOR TEACHING HOME SCIENCE (30 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the meaning, importance and types of planning 2. To prepare teaching manual based on different approaches and models of teaching	▪ Meaning and importance of planning ▪ Types of planning – Year plan, Unit plan, Teaching manual and Resource Unit ▪ Preparation of teaching manual based on following approaches of teaching ▪ Herbartian Approach	Meaningful verbal expression Group discussion Work shop	▪ Performance assessment in group discussion, workshop, seminar ▪ Assessment of Optional Note Book entries ▪ Tests

		Seminar	▪ Peer evaluation

	▪ Constructivist Approach
	▪ Preparation of teaching manual based on models of teaching.
	▪ Concept Attainment Model
	▪ Inquiry Training Model
	▪ Constructivist Model
	▪ Inductive Thinking Model
	▪ Role play model
			▪ **Practicum-CE**
			▪ **Practicals**
			  o Discussion lessons Demonstration lessons
			  o Observation of video lesson
			  o preparation of ICT enabled lesson
			  o Script for video lesson

Unit IV: DESIGN AND DEVELOPMENT OF LEARNING AIDS FOR ENHANCING HOME SCIENCE LEARNING (16 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise with the different visual ,graphic, projected and non-projected aids 2. To apply the knowledge in improvising learning aids in teaching Home Science 3. To understand the application of multimedia	▪ Visual and graphic aids-Charts, Models, Specimens, Diagrams, Pictures, Posters. ▪ Projected and non- projected aids-OHP, Slide Projector, Film Projector, LCD, Interactive Boards and Proper use of chalk board, Display Boards, Bulletin Board, Flannel Board, Hook Boards. ▪ Improvisation of learning aids ▪ Application of multi media	Lecture cum discussion Meaningful learning Demonstration Group discussion Workshop	▪ Performance assessment in group discussion, workshop etc. ▪ Tests ▪ Peer evaluation ▪ Assessing the innovative and creative ideas ▪ ▪ CE Test-II/Model exam

References

- Extension Education-Dr. A .Adivi Reddy
- Modern Teaching of Home Science-Fahmeeda Beegum
- Teaching of Home Science- Mujibul Hasan Siddique
- Modern Teaching of Home Science-Fahmeeda Beegum
- Teaching of Home Science- Seema Yadav
- Principle, methods andTechniques of teaching Teaching-J.C.Aggarwal
- Science Teaching in Schools- Das R C
- Science Teaching-Dr.K. Sivarajan

EDU 101 - **HEALTH AND PHYSICAL EDUCATION (3 CREDITS- 36 HOURS) TOTAL MARKS - 30**

Objectives

- Get acquaint with the meaning, aim and objectives of Physical Education
- Understand the importance and values of recreational activities in the modern society
- Acquire knowledge about the Track and Field events.
- Become familiar with major and minor games and to develop interest in sports and games
- Understand the ability to organize and in the conduct of sports and games

Unit -1	: **Health and Physical Education (4 Hrs)**
Unit – 2	: **Recreation and recreational activities (6 Hrs)**
Unit – 3	: **Track & Field or Athletic events(7 Hrs)**
Unit – 4	: **Major and minor games (7 Hrs)**
Unit – 5	: **Tournaments (4 Hrs)**
Unit – 6	: **Track and Field marking (6 Hrs)**

Unit I: Curriculum Grid for Health and Physical Education

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Get acquaint with the meaning, aim and objectives of Physical Education	- Definition - Meaning, need and importance - Aims and objectives - Dimensions	Verbal Expression	Written test

Unit II: Recreation and recreational activities

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Understand the importance and values of recreational activities in the modern society	▪ Need and importance ▪ Leisure time management	▪ Narration ▪ Field activity	▪ Role performance analysis

Unit III: Track & Field or Athletic events

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Acquire knowledge about the Track and Field events.	▪ General awareness on Athletics ▪ Rules and regulations of any one event in detail	▪ Oral Presentation ▪ Group activity ▪ Particpation	▪ Group assessment ▪ Vivavoce ▪ Participation

Unit IV: Major and minor games

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Become familiar with major and minor games and to develop interest in sports and games	▪ Understanding Major and minor games ▪ Rules and regulations of any one major game in detail	▪ Theoritical orientation ▪ Virtual learning Platforms	▪ Group assessment ▪ Individual evaluation

Unit V: Tournaments

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Understand the ability to organize and in the conduct of sports and games	• Knock out, League and combination tournaments • Methods of drawing fixtures under Knock out and League tournaments	• Meaningful verbal expression • Group activity sessions in small or medium groups	• Group assessment • Test

Unit VI: Track and Field marking

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize the ways and measures to draw a standard athletic track.	• Standard 400 mts./200 mts. Track marking • Field marking	• Verbal Presentation • Group activity • Field work	• Field analysis through • Group performance

Guidelines for Practical Work

- Prepare a personal health chart which contain height, weight, waist - hip ratio, BMI, heart rate.   (5 marks)
- Physical Education Record (10 -15 pages)   (10 marks)
- Participation in Sports and Games   (5 marks)
- Winning prizes in Sports and Games   (5 marks)
- Initiative and effort in organizing sports and games   (5 marks)

Core Subjects

EDU – 06	:	**Education in Indian Society**
EDU – 07	:	**Learner in the Educational Perspective**
EDU – 08	:	**Management in Education**

Optional Subjects

EDU – 09.1-13	:	**Theoretical Base of …….. Education – II**
EDU – 10.1-13	:	**Techno-Pedagogic Content Knowledge Analysis-……**
Instructional Hours per paper	:	**84**
		(Theoretical Discourses- 60 & Related Practical Work – 24)

EDU 06: EDUCATION IN INDIAN SOCIETY

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

- To develop an understanding of the evolution of education in Indian society
- To identify the role of education in economic development
- To analyse the challenges in Indian education and the role of teacher in the changing scenario
- To familiarise with the emerging trends of education
- To imbibe values in the changing social scenario

Contents

UNIT 1	:	**Milestones in Indian Education**
UNIT II	:	**Education for Economic and National Development**
UNIT III	:	**Challenges in Indian Education**
UNIT IV	:	**Emerging Trends in Education**
UNIT V	:	**Value Education**

Unit I: Milestones in Indian Education (14 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the evolution of education in Indian society 2. To acquaint with existing educational policies and commissions in India 3. To understand changes of education system in Kerala 4. To familiarize with the functions of state and central Apex bodies of education	▪ A brief account on history of Indian education during British period ▪ Education in post independent India: o Radhakrishnan Commission(1948) o Kothari Commission report(1964-66) o New Education Policy 1986 o Right to Education Act 2009 o Programmes and Schemes - DPEP,SSA,RMSA, RUSA o Apex bodies- CABE,NCERT,SCERT, DIET, UGC, NCTE, NAAC, NUEPA ▪ Evolution of education in Kerala	Historical method Lecture-discussion e- learning Document analysis Historical method and document analysis	▪ Role Performance Analysis in group Discussion ▪ Involvement in Debates ▪ Seminar Presentations ▪ Assignments ▪ Objective type test

References -
- Report of Secondary Education Commission. Kothari D.S. (1965). New Delhi: Ministry of Education.
- Govt. of India (1986). National Policy on Education, Min. of HRD, New Delhi.
- Govt. of India (1992). Programme of Action (NPE). Min of HRD.
- National Curricular Framework-2005 , 2009
- Right to Education Act -2009
- Knowledge Commission reports 2006, 2007, 2009
- UNESCO reports on Teacher education
- Sripati, V. and Thiruvengadam, A.K. (2004), "India: Constitutional Amendment Making The Right to Education a Fundamental Right", *International Journal of Constitutional Law*, 2 (1): 148–158, Oxford University Press.
- Naik, J.P. (1998). The Education Commission and After. New Delhi: Publishing Corporation.
- *Learning without Burden,* Report of the National Advisory Committee. Education Act. Ministry
- *Express Learning Series (authors) (2012) Development of Educational System in India, Pearson Education, New Delhi.*
- of HRD, Department of Education, October, 2004.
- http://www.gktoday.in/rashtriya-ucchatar-shiksha-abhiyan

Unit II: Education for Economic and National Development (12 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the relationship between education and economy Education as an Investment 2. To understand the role of education for national development	▪ Social Indices of National Development ▪ Education as an investment- Share of GDP to Education ▪ 'Educated unemployment'- Causes and Remedies ▪ Role of NKC ▪ Education in 12th five year plan(overview) ▪ Education an instrument for intellectual property and inventions and discoveries for the welfare of the society- (IPR)- Industrial property rights- copy rights and related rights	Meaningful verbal expression Panel Discussion Debates Seminar	▪ Role Performance Analysis in group Discussion ▪ **CE - Practicum**

References

- Humayun Kabir (1951). Education in New India. London: George Allen and Unwin Ltd.
- Jagannath Mohanty (1998). Modern Trends in Indian Education. New Delhi: Deep and Deep publications.
- Dr. Subash Chandra Roy.(2009) Lecture on Intellectual property law. Chandighar National university, Patna
- Amirish Kumar Ahuja. (2007).Economics of education. Authors Press
- R.A. Sharma.(2007). Economics of education. Surya Publication
- Meenu Chaudhary (2012). Objectives and Functions of Education, Pearson Education, New Delhi.
- R P Pathak (2012), Development and Problems of Indian Education, Pearson Education, New Delhi.
- R P Pathak (2012) Principles and Trends in Education , Pearson Education, New Delhi.
- http://knowledgecommission.gov.in/

Unit III: Challenges in Indian Education (18 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To analyze the challenges of Indian Education	▪ Current Problems of Indian education – Primary- secondary- higher education	Debates	▪ Performance in debates ▪ **Internal Test (CE)**

		Lecture discussion	**CE – Field Study-**
2. To familiarise certain articles pertaining to education	▪ Constitutional Goals - Articles of Indian Constitution Pertaining to Education – Preamble, Article 21 A, Article 38, Article44, Article 45, Article 46,Article 47,Article 48A, Article 49	Documentation and discussion	▪ **CE – Field Study- school/community based (during practice teaching)**

References

- Entwistle, N.(1990). Hand book of educational ideas and practices. London: Roputledge
- Kohli, V.K. (1987). Indian Education and Its Problems. Haryana: Vivek Publishers.
- NCERT (1986). School Education in India – Present Status and Future Needs, New Delhi.
- Mukopadhyaya et.al.(2008). Globalization and challenges for education. NIEPA. Shipra Publication
- R. P. Pathak (2012). Development and Problems of Indian Education, Pearson Education, New Delhi.
- Express Learning (authors) Teacher in Emerging Indian society (2012), Pearson, New Delhi.
- Dushyant Kumar (2012). Perspectives in Modern Education, Pearson, New Delhi.

Unit IV: Emerging Trends in Education (22 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize 2. trends of 3. education	▪ Gender equity- Women empowerment- Gandhiyan views on women empowerment ▪ Inclusive Education – Meaning, Relevance and Practices ▪ Population Education – Need, Trends in Demography, Population explosion and adverse effects ▪ Meaning and significance of Human Rights education ▪ Relevance of environmental education ▪ Health education and prevention of life style diseases- ▪ Futurology of education	Group Discussion Brainstorming ICT Field visit (Special school) Census Analysis Analysis of mass media	▪ Analysis of responses ▪ Analysing and presentation

References

- Chandra S.S., Rajendra K Sharma (2007). Sociology of Education. Atlantic Publishers and Distributers (P)Ltd.
- Saxena, Swaroop N.R. (2008). Education in Emerging Society. Meerut: R. Hall book depot.
- Chakraborthi, Mohit. (2004) Teacher Education- Modern Trends. New Delhi: Kanishka Publishers and Distributers.
- Pachauri, Girish. (2009). Education in Emerging India. Meerut: Viny Rakhija.
- Ramachandra, Vimala (2006). Gender and Social Equity in Primary Education. New Delhi: Sage Publication.
- Kumar, Asok (2007). Current Trends in Indian Education. New Delhi: S.B. Nangia APH Publication.
- Jaganath Mohanthy.(2005). Modern Trends in education. Deep and deep publication. New delhi
- http://www.create-rpc.org.

Unit V: Value Education (18 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand and inculcate values in the changing social scenario	- Concept of Purusharthas - Human Values- Social Values - National values - Universal values - Strategies for inculcating values - Professional ethics of Teachers	Lecture discussion Workshop Debates	- Response analysis **Model Exam (CE)**

References

- J.C.Agarwal.(2006). Education for values, Environment and Human Rights. Shipra publications . New Delhi
- Yogendra Singh.(2007). Modernisation of Indian tradition. Rawat publication. New Delhi
- D. Dyakara Redd & Rau.(2007). Value education. Discovery publishing House. New delhi
- Dr.Dhananjaya Joshi.(2006). Value education in global perspectives, Lotus Press

EDU 07 - LEARNER IN THE EDUCATIONAL PERSPECTIVE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives: To enable the student teacher :

- To develop an understanding of the concept, areas and factoirs of Individual difference.
- To develop an understanding of the concept and types of 'exceptional children'.
- To develop an understanding of the concept and types of Learning Disability
- To develop skills to handle students with special needs.
- To develop an understanding of the concept, nature and various theories of intelligence
- To understand the meaning, nature, process of creativity development and the strategies for fostering creativity.
- To develop an understanding of the concept and theories of Personality.
- To understand the concept of Mental health, Adjustment, Maladjustment and the causes of mal-adjustment.
- To develop an understanding of the meaning, need, scope and methods of Guidance and Counselling.
- To acquaint the learner with the concept, process and importance of Group Dynamics.
- To create awareness of the problems and issues of adolescence and to suggest remedies.
- To familiarise strategies for empowering student teachers for meeting classroom challenges

Contents

UNIT I	**: Individual Difference of learners (concept and areas)**
Unit II	**: Learner Differences in Intelligence and Creativity**
Unit III	**: Personality and Adjustment of Learner**
Unit IV	**: Learning in Groups**
Unit V	**: Guidance and Counselling**

Unit I: Individual Difference of Learners - 18 Hours (14 Theory+ 4 related practical work)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the concept and areas of Individual difference. 2. To equip the teacher for understanding the learner in the context of their socio cultural and	▪ Concept of Individual Differences- ▪ Areas of individual Differences - Interest, Attitude and Aptitude ▪ Understanding Exceptional learners - Gifted and Slow Learners, Mentally Retarded, Learning Disability- Educational provisions	Lectures Field visits Institutional survey Identification of exceptional	▪ Test paper ▪ Assignments ▪ Practicum ▪ Field visit reports ▪ Performance assessment

		categories	
3. To familiarize the specific factors leading to individual difference. 4. To develop skills to handle students with special needs. 5. To familiarise inclusive education	for learner differences ▪ Inclusive education- National Policy and Acts RCI(1992),PWD (1995), NTA (1999).	Design of learning strategies for exceptional categories Seminars/ Discussions	

References

- Ker. C (1998) Exceptional Children, New Delhi, Sterling Publishers.
- Rao KS, Rao DB (2005) Gifted and Talented Education, Sonali, New Delhi
- Sharma P.L (1988), A Teachers Hand Book on IED Helping Children with Special Needs NCERT, New Delhi.
- Balsara, Maitreya (2011) Inclusive Education for Special Children: New Delhi: Kanishka Publishers and distributors

Unit II : Learner Differences in Intelligence and Creativity - 20 hours (14 T+ 6 related practical work)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To conceptualise the individual difference among the learners on the basis of intelligence and creativity 2. To develop an understanding of the concept, nature and various theories of intelligence 3. To understand the meaning, nature, process of creativity development and the strategies for fostering creativity. 4. To familiarise the measurement of intelligence and creativity	▪ Meaning and nature of intelligence ▪ Theories of Intelligence – two factor, group factor, multi factor, Guilford's structure of intellect model - Multiple intelligence etc. ▪ Measurement of Intelligence –verbal, nonverbal and performance tests ▪ Emotional intelligence ▪ Creativity- meaning and nature - Identification of Creative Learner - Process of Creativity, measurement of creativity, Teacher's role in fostering Creativity.	Lectures Group discussion Administer any one intelligence test and familiarize the procedure. Prepare activities based on the multiple intelligence theory Prepare sample items for verbal creativity tests (minimum 4 items) - Develop an activity to foster creativity	▪ Practical work ▪ Assignments ▪ Seminar presentation ▪ Test paper ▪ Performance based assessment **CE Practicum**

References

- Dwyer, D. & Scampion, J (1995): Psychology A- Level: Great Britian: Mcmillan.
- Barochisky, G.B Poeytes Book (1984)Intelligence Procedures in Psychology, Philadelphia
- Gates, A.S and Jersild, A.T (1970) Educational Psychology, New York : Macmillian
- Teele, Sue (2000), Rainbow of Intelligence: Exploring how students Learn, California: Corwin Press Inc.

Unit III : Personality and Adjustment of Learner - 20 hours (14Theory+ 6 related practical work)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. 1. To conceptualise the individual difference among the learners on the basis of Personality 2. To develop an understanding of the concept of adjustment 2. 3. To understand the factors causing maladjustment 3. 4. To familiarise the personality tests 4. 5. To conceptualise mental health and mental hygiene	• a. Concept of Personality- role of heredity and environment, • b. Approaches to study personality - Psycho analytic(Freud) - Trait(Allport and Cattel) – • Characteristics of mature personality. • d. Assessment of personality- techniques and methods- projective techniques • e. Adjustment and maladjustment, Adjustment mechanisms. • f. Mental Health: Concept and Importance, mental hygiene- role of teacher.	Lectures Case study of unique personalities Group discussion to identify the characteristics of mature personality Administer any one personality test and familiarize the procedure Conduct a discussion on teacher's role in identifying and managing maladjusted learner Discussion on mental health programmes Action research on adjustment patterns	• Reflective practices • Assignments • Seminar presentation • Test paper • Practical works • Practicum • **Internal Test (CE)** **CE – Field Study School/Community based (during practice teaching)**

References

- Allport, G.W (1937) Personality: A Psychological Interpretation Hentry Holt & Co. New York.
- Cattel , R.B (1959) Personality and Motivation : Structure and Measurement, M.B. Graw Book Company, New York
- Guilford JP (2007) Personality, : New Delhi: Surjeet
- Dash , M. & Dash, N. (2006) Fundamental of Educational Psychology: New Delhi: Atlantic Publishers and Distributors

Unit IV : Learning in Groups - 12 Hours (8Theory+4 related practical work)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the process of learning in groups 2. To familiarise group dynamics and sociometric technique 3. To provide training in life skills 4. To develop social skills through group dynamics	▪ Meaning & Characteristics of a Social Group, classroom as a social group ▪ Sociometry: - Use and Importance. Group dynamics ▪ Leadership- nature, types, skills etc. ▪ Life skills- self awareness, communication skills, interpersonal relationship, decision making & problem solving.	Lectures Construction of sociogram Leadership practices Life skills training Seminars Role play Practicum	▪ Participation in programmes ▪ Leadership qualities ▪ Life skills

References

- Dandapani S., (2007) AText Book on   Advanced Educational Psychology: New Delhi: Anmol Publications,
- Chand, T (1993) Modern Child Psychology, New Delhi : Anmol Publications

Unit V : Guidance and Counselling - 14 hours (10 T+4P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the meaning, need, scope and methods of Guidance and Counselling. 2. To create awareness of the	**Guidance and counselling** – Meaning – Need, types and scope, organisation of guidance cell **Counselling skills**- adolescent issues and their management-Sexual harassment,	Individual and group guidance in schools Parental awareness activities	▪ Practical works ▪ Participation in various programmes ▪ Activities of guidance cell

problems and issues of adolescence and to suggest remedies. 3. To initiate strategies for students who needs guidance 4. To orient towards guidance programmes in schools 5. To familiarise behaviour management practices in classrooms	Substance abuse - Impact of media/ Internet/ mobile - Depression and suicide- causes and remedies etc. ▪ **Stress management**- concept and practices ▪ **Behaviour management in classrooms**- trends and practices, Classroom Management Skills	Organisation of guidance cell and career corners Interaction with a counsellor Discussions Role play	▪ Field work ▪ **Model Exam**

References

- Parichy. P (1977) Guidance and Counselling in India NCERT, New Delhi
- Humphry & Trazxlor, A.E (1954) Guidance Services Chicago: Science Research Associates Inc.
- Rao S.N (1981) Counselling Psychology, New Delhi: Tata Mc Graw Hills

Suggested Readings

- Allport, G.W, (1960). Personality: A psychological Interpretation .NewYork: Henry Holt and Company .
- Anastasia, Anne (1982). Psychological Testing NewYork: Mc Millan Publishing Company.
- Baron, Robert A, (2003). Social psychology (10th ed). New Delhi :Prentice Hall of India
- Baron, Robert A, (2003). Psychological (3rd ed). New Delhi, 110092 :Prentice Hall of India.
- Benjamin, W.B., (1985). Hand book of Human Intelligence:Theories, Measurement and Application John, London : Wiley of Sons Inc.
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- Carroll, H.A (1984) Mental Hygeine New York, Prentica Hall Publishing Co.
- Crow, L.A and Crow A Educational Psychology (1973) New Delhi : Eurasia Publishing House.
- Duric, L (1990)Educational Psychology New Delhi : Sterling Publishers.
- Entwistle,N.J.(1990). Handbook of educational ideas and practices.London:Routledge
- Ewen, R.B (1980)An Introduction to theories of Personality New York : Academic Press.
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- Hartney, Elizabeth (2008): Stress Management for   teachers; U.K: Continuum
- Jangira, N.K., etal (1991). Functional Assessment Guide. New Delhi : NCERT.
- Kinchelore, J.L., & Horn, R.A (Eds.) (2007) The Praeger Handbook of Education andPsychology; India: Praeger (vol. 1,2,3,&4)
- Kochar, S.K (1993), Educational and Vocational Guidance in Secondary Schools. New York : Sterling Publishers.
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- Martin, garry and Pear, Joseph (2003) .Behaviour modification : what it is and How to do it (7th Ed.). New Delhi: Prentice Hall of India . 110 092.

- Malavika Kapoor(2012) Counselling Children with Psychological Problems, Pearsons Education, New Delhi.
- Sheema Aleem(2012) Theories of Personality, Pearson Education, New Delhi.
- Moghaddam, F.M. (2007) Great Ideas in Psychology: A Cultural and Historical Introduction; India: Oxford; One World.
- Musser, P.H, Conger, S and Kagar, P (1964) Child Development and Personality, New York : Harper Row
- Personality Classic Theories & Modern Research.New Delhi, Pearson Education
- Reilly, P.R & Levis, E (1983) Educational Psychology New York : Macmillian Publishing Co Ltd.
- Sindhu, I.S., (2013); Educational Psychology: India
- Umadevi, M.R.,(2009) Educational Psychology: Theories and Strategies for Learning and Instruction, Bangalore, Sathkruthi Publications
- Robert A Baron, Nyla R Branscombe, Donn, Byrne (2012) Fundamental of Social Psychology, New Delhi: Pearson Education
- Quazi Ferdoushi Islam(consultant editor) (2012) Educational Psychology, Pearson Education, New Delhi.
- http://www.libraries.psu.edu/
- http://www.teacher.net
- www.moodle.org
- http://teamwork.sg/teamwork/schoolportal.aspx
- http://www.enhancelearning.co.in/SitePages/Index.aspx
- http://www.e-learningforkids.org/courses.html
- http://en.wikipedia.org/wiki/Wiki
- http://www.webopedia.com/welcomead/
- http://www.filehippo.com/
- http://www.padtube.com/Windows

EDU 08: EDUCATIONAL AND ENVIRONMENTAL MANAGEMENT

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

- To develop an understanding of the concepts management, administration and organisation in education
- To create an awareness of various levels of Educational Management
- To sensitize towards effective management of human and material management
- To appreciate the role of administrative authorities in maintaining the quality of Institutions
- To Familiarise with the concept of Total Quality Management in Education
- To understand the importance of environmental education
- To practice environmentally friendly life style
- To create an awareness about the environmental movements, laws and rights
- To sensitize towards the concept of disaster management
- To develop values and an environment friendly attitude towards protecting the environment

Contents

A. EDUCATIONAL MANAGEMENT (30HOURS THEORY + 6 HOURS PROCESS)
   Unit I   : **Management, Administration, Organisation**
   Unit II   : **Aspects of school management**
   Unit III   : **Management of School activities**

B. ENVIRONMENTAL EDUCATION (30 HOURS THEORY+18 HOURS PROCESS)
   Unit I   : **Concept and relevance of environmental education**
   Unit II   : **Environmental problems: Global and local level-Causes and Effects**
   Unit III   : **Environmental concerns**
   Unit IV   : **Disaster management**

A. EDUCATIONAL MANAGEMENT

Unit I: Management, Administration, Organisation (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the trends in management 2. To familiarise with the theories, functions and effectiveness indicators of management 3. To understand with educational management 4. To differentiate the concept of educational management and industrial management 5. To realize the importance of educational management in teacher education 6. To understand the different components of educational management 7. To familiarize with the different components of management of educational system 8. To familiarize with the structure of management	▪ Modern trends in management- theories, functions and effectiveness indicators ▪ Educational management – meaning and difference with industrial management ▪ Importance of study of educational management ▪ Different components of management of educational system ▪ Structure of management at Central, State, District and Panchayat level	Verbal discourse Group discussion Narrative expression in small groups Brain storming Collaborative interaction Meaningful verbal learning Oral presentation Brain storming Group discussion	▪ Role performance analysis ▪ Evaluation of document ▪ Analysing the performance ▪ Examine the level of participation ▪ Evaluation based on documentation ▪ Analysing the performance ▪ Examining the level of participation ▪ **CE - Practicum**

References

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▪ Agarwal, V. &Bhatnager, R.P.(1997). Educational Administration, Meerut :R. Lall Book Depot.
▪ Agarwal J.C.(2008). Development and planning of modern education :Vikas Publishing House Pvt. Ltd.
▪ Chaube, S.P.& Chaube, A. (2008).School Organisation, New Delhi: Vikas Publishing House.
▪ www.scribd.com/doc/52442951/Educational-Management-and-Administration
▪ www.teach-nology.com/edleadership/effective_management/

- www.cnx.org/content/m13867/latest/
- www.jstor.org/stable/10.2307/3609548
- www.ascl.org.uk/calendar/event/view?id=118

Unit II: Aspects of School Management (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize with the time management principles 2. To realize the importance of time management 3. To become capable of applying the principles of time management while constructing the time table 4. To gain knowledge of the different resources in education 5. To understand the need for well-defined school plant 6. To get a clear idea about the role of head of the institution as a leader and manager 7. To familiarise with the applications of SWOCK analysis and quality audit in education 8. To analyze the role of administrative staff in educational management 9. To gain an overview about the role of staff council and student council in the management of school activities 10. To explore the importance of PTA	▪ Time management : Time table-importance, principles and types ▪ Resources in education: a).Material resource management: Organization of school plant-building. Equipment, school records and registers- ▪ Human Resource Management : Role of Head of the institution as a leader and a manager-application of Total Quality Management (TQM)-SWOCK analysis-quality audit- duties and responsibilities of teaching and administrative staff-Staff council-Student council-PTA-MPTA ▪ Classroom management: Concept, need and approaches ▪ Role of students in a classroom- Leader, Follower and Non participant ▪ Role of teacher in classroom management	Meaningful verbal expression Discussion Construction Documentation Meaningful verbal discourse Active classroom learning process Practicing SWOCK analysis Small group discussion Brain storming Data collection during practice teaching Report writing Discussion Seminar presentation Small group	▪ Evaluation based on documentation ▪ Evaluating the product ▪ Participation in the learning process ▪ Assessment of SWOCK analysis ▪ Role performance assessment ▪ Participation in brain storming sessions ▪ Verification and assessment of reports ▪ **Internal Test (CE)** ▪ Participation in the classroom discussion ▪ Presentation skill ▪ Role performance analysis ▪ Observation of classroom management during practice teaching

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and MPTA 11. To understand the concept of classroom management and develops the ability in applying the principles of the classroom management in the teaching learning process 12. To identify the role of students in a classroom as a leader or follower or a non-participant 13. To compare the different roles played by the student in a classroom 14. To familiarize with the role of teacher in classroom management 15. To plan the classroom management activities		discussion Applying the theory in actual classroom situation	

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- www.ehow.com/info_7889557_six-components-classroom-management.html
- www.ehow.com/list_6520845_components-effective-classroom-management.html
- www.isixsigma.com/methodology/total-quality-management-tqm/applying-total-quality-management-academics/

Unit III: Management of School Activities (7hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
16. To familiarise with the functions of academic support activities in school management activities 17. To realise the importance of co-scholastic activities in personality development of students 18. To participate in the co-scholastic activities in the college as well as during their practice teaching session	▪ Academic support- library, workshop and museum ▪ Co-scholastic activities- morning assembly, club activities, sports and games, celebration of various days, recreational activities, field trips, debates, discussion, symposium.	Active classroom learning process Discussion Collection of data regarding co-scholastic activities in the practising schools Reporting	▪ Participation in the learning process ▪ Role performance analysis in the discussion ▪ Assessment of report

References

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- Mohanty, Jagannath (2005). Educational Administration, Supervison & School Management .New Delhi: Deep & Deep Publications Pvt Ltd.
- Kochhar, S.K. (2008). Secondary School Administration. New Delhi: Sterling Publishers (Pvt) Ltd.
- www.ehow.com/info_7915716_cocurricular-activities-school.html
- www.authorstream.com/Presentation/aSGuest89896-889804-tqm-in-education/
- www.edchat.blogspot.com/2011/01/definition-and-concept-of-co-curricular.html

B. ENVIRONMENTAL EDUCATION (30 Hours theory+18 Hours related practical works)

Unit I: Concept and relevance of environmental education (7 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To define the meaning of environment 2. To identify the components of an environment	▪ Meaning, definition and components of environment ▪ Ecosystem- Meaning, characteristics and ecological balance	Meaningful verbal learning Interactive classroom	▪ Participation in classroom activity ▪ Observation ▪ Engagement in the learning

3. To realise the importance of various factors of environment 4. To understand the meaning and characteristics of environment 5. To realise the importance of ecosystem in maintaining 6. ecological balance 7. To develop an attitude towards preserving the ecosystem for sustaining life on this earth 8. To familiarise with the concept of environmental education 9. To understand the importance studying environmental education at various levels 10. To familiarise with the objectives of environmental education at various levels	▪ Environmental Education-Concept, definition ▪ Need and importance of environmental education at various levels-primary, secondary and higher secondary level ▪ Objectives and principles of environmental education	activity Explanation with illustration Multimedia presentation Problem solving approach Active classroom learning Meaningful verbal discourse Infusion approach Small group discussion Active classroom learning	process ▪ Participation in the learning process ▪ Engagement in the learning process ▪ Role performance assessment in group discussion ▪ Participation in the teaching learning process

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- www.edurite.com/kbase/environment-and-its-components
- www.scribd.com/doc/7019062/Components-of-Environment
- www.eoearth.org/article/Ecosystem
- www.globalchange.umich.edu/globalchange1/current/lectures/kling/ecosystem/ecosystem.html
- www.reference.com/browse/ecosystem
- www.moef.nic.in/divisions/ee/ee.html

Unit II: Environmental problems: Global and local level-Causes and Effects (16 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To realise the environmental changes at global level 2. To develop a positive attitude towards the need for reducing global warming and related consequences 3. To practice environment protection measures in personal life 4. To realise the consequences of human action on environment 5. To develop an attitude towards protection of environment 6. To acquaint with the various types of pollution 7. To conduct conscientization programme on reducing the environmental pollution 8. To gain knowledge about the various environmental laws and rights 9. To familiarise with the constitutional provisions regarding the environmental protection 10. To apply the environmental laws and principles when need arises 11. To familiarise with the international efforts on environmental protection	▪ Global warming, greenhouse effect ozone depletion and population explosion ▪ Depletion of Bio diversity, loss of arable soil, quarrying, destruction of mangroves and coral reefs, deforestation and extinction of species ▪ Pollution- Air, Water, Soil and Sound ▪ Environmental laws and rights-Air act, Water act, Wildlife protection Act, Forest Conservation Act, Article 48 A, 51 G ▪ International Protocols - ▪ Earth summit, Kyoto protocol, Montreal protocol, Stockholm conference	Panel discussion Multimedia presentation Debate Brain storming session Print media like newspaper and magazine articles Multimedia presentation Role play Seminar presentation Panel discussion Seminar presentation Multimedia presentation Paper presentation	▪ Participation and role performance assessment in the teaching learning process ▪ Ability to generate views in debate ▪ Role performance assessment ▪ Ability to collect and locate materials ▪ Participation in the learning process ▪ Role performance assessment ▪ Presentation skill ▪ Role performance in panel discussion ▪ Presentation skill **CE – Field Study-school/community based** ▪ Engagement in the learning process ▪ Presentation skill

References

- Rana, S.V.S. (2007) Essentials of Ecology & Environmental Science. New Delhi : Prentice Hall of India Pvt Ltd.
- Mishra, Shubharata R. &Yada, P.R.(2004). Environmental Ecology. New Delhi: Discovery Publishing House
- Misra, S.P. &Pandey, S.N. (2011). Environment and Ecology. New Delhi: Ane Books Pvt. Ltd.
- Nagor, A.P.(1996). Biological Diversity and International Environmental Laws. New Delhi: A.P.H. Publishing Corporation.
- www.ehow.com/list_6506519_list-environmental-protocols.html
- www.unpeacemaker.org/international-environmental-law.html
- www.ec.europa.eu/environment/international_issues/agreements_en.htm
- www.biodiversity.govt.nz/picture/biodiversity/state/destruction.html

Unit III: Environmental Concerns (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the urban environmental problems 2. To apply the knowledge of waste management techniques in real life situations 3. To practice the conservation strategies in daily life 4. To propagate the concept of environmental protection among the school students and the society 5. To develop the concept of conservation of energy as a protector of environment 6. To develop an attitude for conserving energy in daily activities 7. To explore the avenues of alternative energy sources 8. To understand the importance of preserving wildlife	• Urban problems- • Solid waste management-Industrial waste management, domestic waste management and e-waste management, water conservation, rain water harvesting • Conservation of energy sources- alternative sources of energy • Wildlife and its conservation • Forests and its conservation • sustainable development-concept and need • Green culture- Green plastics, eco-friendly life style, organic farming • Role of government and non- governmental agencies	Debate Filed study and data collection Expert talks Conscientization programmes Community activity Demonstration Group discussion Brain storming sessions Video presentation Field visit Report writing Video presentation Small group	• Participation in the process of learning • Preparation of tool and data collection method • Evaluating the conscientization programmes • Participation in community activities • **Internal Test (CE)** • Role performance in group discussion • Ability to contribute ideas to group discussion • Participation in field work • Report evaluation • Verification of video report • Participation in group discussion • Assessment of report • Participation in nature club activities

9. To realise the importance of forest in sustaining life 10. To adopt forest conservation measure 11. To familiarise with the concept of sustainable development 12. To realise the importance of preserving the environment for the future generations 13. To familiarise environmentally healthy practices 14. To adopt eco-friendly practices in life 15. To propagate the green culture among the people 16. To familiarise with the role of government and non-governmental agencies in environmental protection		discussion Multimedia presentation Nature club activities Nature trail Small group discussion Meaningful verbal learning Panel discussion Nature club activity Field visits Expert talks Discussion Meaningful verbal interaction	▪ Report verification of nature trail ▪ Participaiton in group activity ▪ Engagement in the learning process ▪ Role performance in the discussion ▪ Participation in the club activity ▪ Report verification of field visits ▪ Engagement in the learning process ▪ Participation in the teaching learning process

References

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- Sharma,R.A.(2008). Environmental Education. Meerut: R.Lall Books Depot.
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- www.controllingpollution.com/need-for-environmental-education/
- www.nrdc.org/globalwarming/
- www.worldviewofglobalwarming.org/
- www.globalwarming.com/2009/03/the-greenhouse-effect/
- www.globalissues.org/article/171/loss-of-biodiversity-and-extinctions
- www.slideshare.net/LalteshSharma/various-type-of-pollution
- www.typesofpollutionandcausesofpollution.blogspot.com/
- www.web.worldbank.org/WBSITE/EXTERNAL/TOPICS/EXTURBANDEVELOPMENT/EXTUSWM/0,,menuPK:463847~pagePK:149018~piPK:149 093~theSitePK:463841,00.html
- www.swlf.ait.ac.th/UpdData/International/NRIs/Electronic%20waste%20management%20in%20India.pdf
- www.wildlifeindia.co.uk/wildlife-conservation.html

Unit IV: Disaster management (8 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise with the concept of disaster management 2. To realise the importance of disaster management in life 3. To familiarise with the phases of disaster management 4. To familiarise with the mentioned disasters 5. To prepare an action plan for disaster prevention and preparedness	▪ Meaning and concept of disaster management ▪ Phases of disaster management – Steps and brief description only ▪ Prevention and preparedness for Flood, Land slide, Fire and Earthquake	Meaningful verbal expression Class discussion Multimedia presentation Active classroom learning Small group discussion Active classroom learning Practical session on action plan preparation Brain storming sessions	▪ Formative evaluation ▪ ▪ Performance in group ▪ Engagement in the learning process ▪ Participation in the group activity ▪ Engagement in the learning process ▪ Assessment of the action plan **CE Test/Model Exam**

References

- Jyothi, M.K. &Pandey, B.N.(2008). Disaster Management New Delhi: APH Publishing Corporation
- Sundar, I. & Samuel, Kirubakaran .(2007). Environmental Education New Delhi: Sarup and song, Ansari Road.
- Misra S.P. &Pandy, S.N.(2008). Essential Environmental Studies, New Delhi: Ane Books Pvt. Ltd.
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- WWW.ENVFOR.NIC.IN/REPORT/0304/CHAP-03.PDF
- WWW.NIC.IN/NATURAL%20HAZARDS%20&%20DISASTER%20MANAGEMENT.PDF
- WWW.WCPT.ORG/NODE/36987

Suggested Readings

- Bush, Tony.(2012).Educational Management, Administration &Leadership.New Delhi, SAGE Publications Pvt. Ltd.
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- Beenardin, Johntt.(2012). Human Resource Management- An experiential Approach. New Delhi: Tata McGraw Hill Education.
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- Sjrovastave, Kumar, Arun (2007). Global Warming. New Delhi: APH Publishing Corporation.
- Khurana, B.K.(2005).All You Wanted To Know About Disaster. New Delhi: New India Publishing Agency.
- Bayad, Anjali(2009). Environmental Studies. Pune: Technical Publications.
- Gupts, Harshak.,(2008). Disaster Management. Hyderabad: Universities Press (India) Pvt. Ltd.
- Aswathy, Dr.Amit(2009). Disaster management-Warning Response & Community Relocation. New Delhi: Global India Publications Pvt Ltd.
- Joseph, Benny (2005). Environmental Studies. New Delhi: Tata McGraw Hill Education.

EDU 09.1 - THEORETICAL BASE OF MALAYALAM EDUCATION- II

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

- To get acquainted with principles/concepts of curriculum construction, National/Kerala curriculum framework, different types of curriculum etc.
- To understand the basic theories/concepts/perspectives in language acquisition, Chomsky's conceptions on language, the whole language approach etc.
- To obtain essential knowledge/practice in the importance/uses/operations/making of AV aids.
- To get acquainted with the integrated approach in teaching Malayalam
- To get familiarized with the theory and practice of different language discourses.

Contents

Unit I	:	**Curriculum Construction**
Unit II	:	**Language Learning – New Perspectives**
Unit III	:	**Learning Aids**
Unit IV	:	**Integrated Approach in Teaching Malayalam**
Unit V	:	**Discourse Oriented Pedagogy**

Unit I: Curriculum Construction (17 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get acquainted with principles/concepts of curriculum construction, National/Kerala curriculum framework, different types of curriculum etc.	- Principles of curriculum construction - Curriculum and Syllabus - General Approach on language learning in National/Kerala curriculum framework - Different concepts in curriculum construction: Activity oriented, Issue based, Problem based curricula.	Open discussion on the suitability of present day school curriculum Preparation of an essay on general approach on language learning in National/Kerala curriculum frameworks	- Participation in discussion/Relevance of ideas - Essay **CE Test**

Unit II: Language Learning – New Perspectives (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the basic theories/concepts/perspectives in language acquisition, Chomsky's conceptions on language, the whole language approach etc.	▪ Language a biological triggered behavior ▪ Language acquisition vs. Language learning. ▪ Language acquisition and cognitive development ▪ The parameters of LAD and Universal Grammar ▪ Chomsky on Language and thought ▪ The whole Language Approach	Seminar on conventional and new perspectives in learning language Preparation of short notes on LAD, universal Grammar Discussion on supplied reading materials.	▪ Seminar paper/participation ▪ **CE-Preparation and uploading of an innovative teaching manual on the blog**

Unit III: Learning Aids (16 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To obtain essential knowledge/practice in the importance/uses/operations/making of AV aids	▪ Essential learning aids for teaching Malayalam ▪ Audio – Visual Aids ▪ Importance - Types - Projected and Non-projected aids ▪ Films/Short films, documentaries and Animations	Preparation of Leaning aids for secondary and higher secondary Malayalam classes Workshop on short film/documentary/animation making	▪ Adaptability of learning aids ▪ Participation of students ▪ **CE-Practicum**

Unit IV: Integrated Approach in Teaching Malayalam (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get acquainted with the integrated approach in teaching Malayalam	- Significance - Different types - Interdisciplinary Approach - Stages of application - Integrated learning activities	Designing of integrated learning activities	Innovations in the design

Unit IV: Discourse Oriented Pedagogy (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get familiarized with the theory and practice of different language discourses	- Importance of discourse in language learning and teaching - The salient features of Discourse Oriented Pedagogy - Functions of: Debate, Drama Seminars, Discussions, Conversations, Diary, Posters, Narratives, Screen Play, Editorials, and Travelogues etc. - Process of constructing discourses	Preparation of discourse oriented activities for high school classes Discussion on the suitability and adaptability of discourse oriented pedagogy Preparation of discourse like narratives/ travelogues/ editorials/ posters etc.	- Prepared activities - Participation in discussion - Written documents

References

- Anveshanangalkku oru kaippusthakam;
- Padhana Projectukalkku oru Kaippustakam, Prof. MK Prasad, Kerala Shaasthrasaahitya Parishad
- Divaswapna, Gijubhai Bhadeka, National Book Trust
- Engane Malayalattil Blogam, Baburaj PM, DC Books, Kottayam
- Gadyarachana, Dr.CK Chandrasekharan Nair, Kerala Bhasha Institute
- Gadyashilpam, CV Vasudeva Bhattathiri, Kerala Bhasha Institute
- Kerala Panineeyam, AR Rajaraja Varma , DC Books, Kottayam
- Kuttikale Padanathil Sahayikkam, PK Abdul Hammed Karassery, DC Books, Kottayam
- Malayala Bhasha Bodhanam, CV Vasudeva Bhattathiri, Kerala Bhasha Institute
- Malayala Kavithapadhanamgal, K Sachidanandan, Mathrubhoomi Books
- Malayala Sahithya Charithram, Dr. Kalpatta Blakrishnan, Kerala Bhasha Institute
- Malayala Sahithya Charithram, PK Parameswaran Nair, Sahithya Academy
- Malayala Sahithya Niroopanam, Dr. Panmana Ramachandran Nair, Current Books, Kottayam
- Malayala Sahithya Vimarshanam, Dr. Sukumar Azheekkode, DC Books, Kottayam
- Mumbilulla Jeevitham, J Krishnamoorthi, DC Books, Kottayam
- Nalla Malayalam, CV Vasudeva Bhattathiri, DC Books, Kottayam
- Nammude Bhasha, EMS Namboothiripad, Kerala Bhasha Institute
- Parivarthanonmugha Vidhyabhyabyasam, Guru Nithyachaithanya Yathi, Narayana Gurukulam, Varkala
- Prayogika Vyakaranam, Irinjayam Ravi
- Purogamana Vidyabhyaasa chinthakal, PV Purushothaman, Kerala Shaasthrasaahitya Parishad
- Thettillatta Malayalam, Prof. Panmana Ramachandran Nair, DC Books, Kottayam
- Tirakkadha Rachana – Kalayum Sidhanthvum, Jose K Manuel, Current Books, Kottayam
- Toto Chan, Tetsuko Koriyo Nagi, Kerala Shaasthrasaahitya Parishad
- Tuition to Intuition, Dr. KN Anandan, Transcend, Malappuram
- Ucharanam nannavan, Dr.VR Prabodhachandran, Kerala Bhasha Institute
- Vidhyabhyasathil Viplavam, Osho, Silence, Kozhikkode
- Vidyabhyaasa chinthakal, Asis Tharuvana, Olive, Kozhikkode
- Vidyabhyasa Parivarthanattinoru Amugham, Kerala Shaasthrasaahitya Parishad
- Vyakarana Mitham, Sheshsgiri Prabhu
- Malayala Bhashadyapanam, Dr.K Sivarajan, Calicut University
- Micro teaching, Allen,D & Ryan, K, Adison Wesley, London
- Mathrubhashabhodhanam:

- Pravanathakalum Reethikalum, Bindhu,C.M., Scorpio, Calicut
- Online Resources
- http://ml.wikipedia.org
- https://www.facebook.com/groups/144983732246185
- https://www.facebook.com/groups/paribhasha
- http://www.keralasahityaakademi.org/
- http://malayalambloghelp.blogspot.com/
- http://www.topsite.com/best/malayalam
- http://malayalam.kerala.gov.in/index.php

EDU 09.2 - Theoretical Base of English Education- II

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

- To familiarize with concepts related to Curriculum and Syllabus.
- To develop an understanding of the need and scope of school-community linkage.
- To identify and critique different types of Course Books.
- To explore possibilities of collaborative and cooperative learning.
- To sensitize with ways of engaging classes in inclusive settings.
- To evoke a need to regularly update research in the field of ELT

Contents

Unit 1	**: Curriculum and Syllabus**	
Unit 2	**: Teaching Learning Resources: School and Community linkage**	
Unit 3	**: Instructional Materials and strategies***	
Unit 4	**: Collaborative and Cooperative Learning**	
Unit 5	**: Inclusive Education**	
Unit 6	**: Research in ELT**	

Unit I: Curriculum and Syllabus (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarize student teacher with the principles of curriculum construction and organization 2. Grasp the relationship between curriculum and Syllabus	- Curriculum - Types - Principles of construction - NCF 2005 - KCF 2007 - Difference-Curriculum and Syllabus - Syllabus types - State - CBSE - NCERT	Direct instruction Intro talk on the different Frame work available Verbal interaction	- Evaluation of entry made in Reflective Journal **CE Test**

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	ICSE
	Critical Pedagogy
	Problem Based Learning
	Issue-based curriculum

Unit II: Teaching Learning Resources: School and Community linkage (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Acquaint with teaching and learning resources available in formal and informal contexts	- Teaching and learning resources - Formal learning contexts - Informal learning contexts - Library for learning english - Society as Language Lab - Film - Theatre - Language Institutes - Spoken English Centres - Soft Skills training centres - Literary clubs - Language forums - e-Library - Commercially available materials	Field visit Hands-on experience Group discussion Sharing of learning experience	- Surveying - Checklist - Presentation of Field visit reports **CE –Preparation and uploading of an innovative teaching manual (Blog)**

Unit III: Instructional Materials and strategies (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To analyze instructional materials in print form for effective transaction	- Instructional materials - Course Books - Learning Modules as in Correspondence Course Study Materials	Meaningful verbal expression	- Performance evaluation - Role analysis - Participant observation

| 2. | To explore and practice infotainment activities in language | Supplementary Reader Work Book Teachers' Handbook Cartoons Comics Strategies Play-way method Dramatization Skit Mnemonics | Demonstration

Use of video clips | **CE Practicum** |

Unit IV: Collaborative and Cooperative Learning (8 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To enable student teachers to promote student effort in learning	- Collaborative Learning - Steps and tasks - Co-operative Learning - Steps and tasks - Interactive sessions - Tasks - Dealing with heterogeneous groups - Project Work - Workshop - Seminar - Symposia - Debates - Anchoring - Event Management	Intro lecture Enquiry centred discussion Group tasks by assigning specific roles	- Style of presentation - Performance - Examine communicative competence

Unit V: Inclusive Education (8 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To equip to manage diverse learner needs in language classes	▪ Inclusive Education ▪ Concept ▪ Need and significance ▪ Proficient and non proficient learners ▪ Talented children ▪ Less talented children ▪ Ways of identifying ▪ Nurturing ▪ Assigning appropriate tasks ▪ Learning disability(LD) ▪ Ways of dealing with learners with LD in inclusive settings	Case Study Review of e-resources Extension lectures by specialists	▪ Identifying children with diverse needs ▪ Reports

Unit V: Inclusive Education (8 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop interest in research in the field of English Language Teaching/learning	▪ Research in English ▪ Language Education and Second Language Pedagogy ▪ Innovative practices	Action Research Review of related literature e-resources Journals Reference of Research Abstracts	▪ Presentation of select research findings ▪ **CE-Test**

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Suggested References

- Experiential learning Beand, Colin, Wilson, Colin Jones second edition (2001)
- Experiential learning activities- concepts and principles Thompson, Martin (2008)
- Educational Research –An Introduction Aggrawal, J.C. (2002). New Delhi, Arya Book Depot.
- Instructed Second Language Acquisition A literature Review, Report To The Ministry Of Education Ellis, R., , New Zealand, 2005.
- An Introduction To Functional Grammar Halliday, M.. London: Arnold, 1986.
- A History Of English Language Teaching Howatt, A.. Oxford University Press. 1984.
- On Communicative Competence Hymes, D.. Philadelphia. PA: University of Pennsylvania Press, 1971.
- Classroom- oriented research in second language acquisition Nystrom, N. Teacher- student interaction in bilingual classrooms: Four approaches to error feedback. In H Seliger & M. Long (Eds.) Rowley, Mass.: Newbury House, 1983.
- Approaches And Methods In Language Teaching Richards, J., & Rogers, T.. Cambridge: Cambridge University Press, 1986.
- Errors Correction And Good Language Learners Roberts, Michael and Carol Griffiths. Cambridge Language Teaching Library, Cambridge, 2008.
- The Threshold Level For Modern Language Learning In Schools Van Ek, J.. Harlow: Longman, 1976.
- Constructivist Strategies **for English Language learners** Sharon, A.R & Trina, L.V (2008). Crown press, USA.

Select Online resources

Cambridge ELT
http://uk.cambridge.org/elt/
CILT (Centre for Information on Language Teaching and Research)
http://www.cilt.org.uk/infos/index.htm
ESLflow
http://www.eslflow.com/
Free-ENGLISH.com
http://www.free-english.com/english/Home.aspx
Internet TESL Journal, The
http://iteslj.org/
Learn English Central (British Council)
http://www.learnenglish.org.uk/
One Stop English Magazine
http://www.onestopenglish.com/
TEFL.NET
http://www.tefl.net/index.html
 For Online research
http://tewt.org/index.php/research

EDU.O9. 3 THEORETICAL BASE OF HINDI EDUCATION – II

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

The student teachers:

- Familiarize with different curriculum reforms and strategies
- Gain direct experience through school and community based teaching - learning
- Evolve and utilize appropriate modern instructional strategies to satisfy the needs of different categories
- Develop the ability to address the special needs of differently abled children in Hindi language classroom
- Attain the ability to assess and evaluate the performance

CONTENT

Unit I	:	**Introduction to Curriculum Reforms (11 hrs)**
Unit II	:	**Formal and Informal learning contexts (15 hrs)**
Unit III	:	**Learning Resources and Co-curricular Activities (16 hrs)**
Unit IV	:	**Instructional Strategies (13 hrs)**
Unit V	:	**E-resources for Hindi instruction (15 hrs)**
Unit VI	:	**Evaluation and Assessment (14 hrs)**

Unit I: Introduction to Curriculum Reforms (11 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarize with different curriculum reforms and strategies	▪ Curriculum – recent regional/ national/ international curriculum movements, ▪ Problem Based Learning/ Critical Pedagogy, Issue Based Curriculum -NCF – 2005, KCF 2007, NCFTE 2010	Assignments, Library work, Group Discussion, Preparation of Lesson plans based on different Theories and Strategies	▪ Evaluation of lesson plans ▪ **CE-1 (PRACTICUM-1)**

Unit II: Formal and Informal Learning Contexts (15 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Acquaints with various formal and informal learning contexts 2. Gain direct experience through community based teaching – learning	▪ School and community based teaching learning resources, ▪ Role of Parents Teachers Association (PTA),Society; Social and community involvement activities- ▪ Field visit, visit to central Govt institutions ,conducting activities related to libraries and reading rooms, celebration of Hindi day,Hindi week,fortnight celebrations, etc, ▪ Interaction with native Hindi speakers, visiting institutions that promote Hindi language namely Kerala Hindi Prachar sabha, Dakshin Bharat Hindi Prachar Sabha, Regional Hindi Directorates etc., visit to SCERT, NCERT	Small group discussions Community involvement Activities Day celebrations Field visit	▪ Evaluation of daily Reflective Journals ▪ **Pracicals** o Assessment of field trip report

Unit III: Learning Resources and Co-Curricular Activities (16 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop the ability to organize various activities in Hindi for the development of various skills	▪ School based resources for Hindi learning:-– text book, workbook, handbook, sourcebook, comics,cartoon, preparation of learning modules,watching commentaries in Hindi on Television,Radio etc, ▪ Organizing skits, plays, Hindi club activities,Co-curricular activities in school ;	Group Investigation Conceptualization Sessions in small or medium groups Day celebrations,	▪ Role Performance Assessment ▪ **CE - Practicum** ▪ Evaluation of daily reports

	organization of seminars, discussions, recitations, kavi sammelan, study tour,	Seminars	
	▪ academic activities, aesthetic development activities, developing cultural activities, literary activities,Use of Hindi library – developing library skill, skill of reference,arranging class library, make use of Hindi magazines, Newspapers, ▪ e-journals& e-resources related to Hindi	Books, Journals and online referencing	

Unit IV: Instructional Strategies (13 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To motivate student teachers to evolve and utilize appropriate instructional strategies to satisfy the needs of different categories 2. To equip Student teachers to address the special needs of differently abled children in Hindi language classroom	▪ Evolving instructional strategies for collaborative& co-operative ▪ learning in small and medium groups ;-Reciprocal Teaching,Jigsaw learning,Group activities,Peer Tutoring,Innovative techniques ▪ ▪ Evolving instructional strategies for ▪ High,Average and Low achievers in the class ▪ Use of instructional strategies and teaching learning materials to address the special needs of differently abled children in the language class room	Co-operative learning Collaborative learning Peer Instruction Scaffolding Adopting different strategies according to the level of students Developing different strategies for differently abled students	▪ Assessment of students' progress ▪ **Practicals** o Innovative work/teaching aid Assessment of learning materials prepared for differently abled students

Unit V: E-resources for Hindi instruction (15 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Cope up with the changing trends and methods for language instruction in the postmodern world	▪ E-resources and learning management systems in Hindi language instruction:-Use of animation and multimedia – Familiarize with transliteration software for Hindi typing and editing, Developing Blogs in Hindi, Formation of Hindi Net groups/online communities -Use of e-content in Hindi for enhancing students language attainment- ▪ Need for Hindi e-resource pooling and development of e-portfolio, M-learning as a pervasive method for effective Hindi instruction	Use of web-resources Video conferencing Creating Digital learning platforms	▪ Evaluation of ▪ e-contents used in Hindi ▪ **CE-2** o **Creating Blogs in Hindi and posting an innovative teaching manual**

Unit VI: Evaluation and Assessment   (14 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Attain the ability to assess and evaluate the performance in the functional plane of teaching and learning	▪ Performance assessment methods and means with respect to Hindi language :- assessment based on process indicators like listening comprehension, pronunciation-intonation-stress-accent assessment, vocabulary test, handwriting assessment, creative writing,Communication skill assessment, language editing and summarization, Think-Pair-Share and Correct technique to reduce language errors, ▪ Translation: Hindi-English,English-Hindi, ▪ Hindi-Malayalam,Malayalam-Hindi	Activities for the development of language skills,communication skills Strategies and methods for improving Translation Action Research Identifying scope of	▪ Assessment of activities for developing communicative Hindi ▪ **CE-3** **INTERNAL TEST-1 (UNIT- 1,11,111,1V,V & V1)**

	▪ Action research in Hindi to overcome problems faced by teachers and students, ▪ Scope of researches	research areas	

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Acharya Nandu Dulare BajPeyi,Hindi Sahitya Ka Samshiptha Ithihas
Acharya Sitharan Chaturvedi,Bhasha Ki Shiksha
Dr.G.C.Bhattacharya,Adhyapak Shiksha,Vinod Pustak Mandir,Agra
Dr.Bholanath Tiwari,Hindi Bhasha Shikshan
Dr.Bholanath Tiwari,Hindi Bhasha Ka Saral Vyakaran
Dr.Satyanarayan Dube,Shikshan Vidhiyam Aadharbhhoth Thatv
Dr.ShailendraBhooshan,Shikshan Adhigam Ke
Bhai Yogendrajith, Hindi Bhasha Shikshan, Agrawal Publications,Agra
Dhirendra Varma,Hindi Bhasha Aur Lipi
Dinesh Chandra Bharadwaj,Basic Shiksha Manovigyan, Agrawal Publications,Agra
Durgesh Nandini,Hindi Shikshan,Sumith Enterprises
Prof.Ganesh Prases Sidha,Bhasha Shikshan Nidhi
Kamatha Prasad Guru, Hindi Vyakaran
Kesav Prasad,Hindi Shikshan
Lalji Ram Shukl,Shiksha Manovigyan
Dr.K.P.Pandey,Shiksha mem Kriyatmak Anusandhan
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Dr.Sreedharananda Mukherji,Rashtra Bhasha Ki Shiksha
Dr.Sitaram Jaiswal,MahendraPal Sharma,Shiksha Ke Thatwik Sidhanth
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Text Books in Hindi,Kerala State Syllabus,SCERT
National Curriculum Framework,NCERT (2005),NewDelhi
Kerala Curriculum Framework,SCERT,Thiruvananthapuram
Report of Education Commission (Kothari Commission).Govt.of India
Report of the Official Language Commission

Online Resources

http://ask.metafilter.com/149992/What-are-the-best-resources-for-learning-Hindi
http://www.transparent.com/learn-hindi/
http://learnelearning.com
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www.wikipedia.com
www.google.com

EDU 09.4 - THEORETICAL BASIS OF SANSKRIT EDUCATION- II

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

OBJECTIVES
- To understand the principles of organizing curriculum
- To provide familiarization with school and community based teaching learning
- To familiarise Text book and other resource materials
- To familiarise the modern instructional strategies in Sanskrit
- To familiarise E- resource and learning management systems
- To familiarise a positive attitude -towards research

CONTENTS:

Unit 1	**:**	**Curriculam Recent /Regional / National. International Curriculum Movements along with the 20th Century Movements (Critical Pedagogy /PBI/Issue Based Curriculam NCF-2005), KCF (2007) and its Latest Versions**
Unit 2	**:**	**School and Community Based Teaching Learning Resources**
Unit 3	**:**	**Text Book –Reader, Work Book, Hand Book, Source Book, Comics and Carton Drawing and Plays –Skils, Learning Modules Etc, Subject Club Activities**
Unit 4	**:**	**Instructional Strategies in Sanskrit**
Unit 5	**:**	**E-Resources and Learning Management System in Teaching and Learning of Sanskrit**
Unit 6	**:**	**Educational Entrepreneurship**

Unit I: CURRICULAM RECENT REGIONAL / NATIONAL. INTERNATIONAL CURRICULUM MOVEMENTS ALONG WITH THE20TH CENTAURY MOVEMENTS) CRITICAL PEDAGOGY /PBL/ISSUE BASED CURRICULAM NCF-2005), KCF (2007) AND IS LATEST VERSIONS (12 HOURS)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the principles of organizing curriculum	▪ Concept –definition –curriculum and syllabus- importance of curriculum- present position of skt in school ▪ curriculum - time allotted to various stages ▪ Types of curriculum ▪ Traditional – activity –child centered ▪ Experience centered -undifferentiated ▪ Principles of curriculum – General principles – Different approaches ▪ Concentric and spiral approaches – psychological and logical approaches- Modern trends in curriculum – critical study of Sanskrit syllabus- approaches to language syllabus design	Discussion Lecture method Meaningful Verbal expression Presentation brain storming	▪ Participant ▪ Observation - ▪ Optional level focussed group ▪ Discussion – ▪ Examing the level of participation -

Unit II: SCHOOL AND COMMUNITY BASED TEACHING LEARNING RESOURCES(14 HOURS)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To provide familiarization with school and community based teaching learning	▪ -School- community – ▪ -formal and informal learning ▪ Community living camp CLC – visit to language institutes, pedagogy park, library , museum agri- farm historical monument etc	-Discussion - -Buzz session -brain storming – -mind-maping -	▪ -Participant ▪ Observation - ▪ -Role performance - ▪ -Analysis ▪ In group discussion- -and minimising – ▪ **CE - Practicum**

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Unit III: TEXT BOOK –READER, WORK BOOK, HAND BOOK, SOURCE BOOK, COMICS AND CARTON DRAWING AND PLAYS –SKILS, LEARNING MODULES ETC, SUBJECT CLUB ACTIVITIES(15 HOURS)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To familiarise Text book and other resource materials	• Text book - reader -work book- hand book source book, comics cartoon drawing –plays –skits learning modules class magazines latterly club –
	 • E-learning sources etc.
		Document analysis -
		 Group discussion -
		 Narrative expression Sessions in small or medium groups -
			• -Role Performance-
			 • -Analysis in group -discussion and miming
			 • -Participant observation -
			 • **CE-practicals**
			   o **Uploading an innovative teaching manual in blog**
			   o **Test**

Unit IV: INSTRUCTIONAL STRATEGIES IN SANSKRIT(15 HOURS)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise the modern instructional strategies in Sanskrit	• Approach –method- strategy –programmed learning –computerised instruction – Team teaching –co-operative – collaborative learning – brain storming – buzz- seminar- role play- • Dabate- Language Laboratory -	Meaningful verbal - Expression - Virtual tour to digital Learning platforms-	• Discussion --observation - • Role performance analysis in group discussion and miming – • Evaluate the competency to compare and contrast – • Monitoring the ability to involve in different types of sources-

Unit V: E-RESOURCES AND LEARNING MANAGEMENT SYSTEM IN TEACHING AND LEARNING OF SANSKRIT(20 HOURS)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise E- resource and learning management systems	▪ Definition- ▪ identification of e-resources, - ▪ e-content development –mobile learning- ▪ construction of a web, blog- operational - ▪ know ledge of network knowledge of – ▪ Sanskrit related web site -	Meaningful verbal expression - Group discussion - virtual tour to digital learning- Assessing on live input on the topic -	▪ Role performance analysis in group discussion - ▪ Participant observation – ▪ Evaluation based on documentation – ▪ **Practicals** o Creation of a blog

Unit VI: EDUCATIONAL ENTREPRENEURSHIP(10 HOURS)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise a positive attitude - towards research	▪ The importance of – ▪ Research –scope – ▪ The possibilities of -web opportunities – ▪ Areas of research	Groups discussion Document Analysis Presentation	▪ Role Performance -Analysis ▪ Evaluation of Daily -reflective journal's ▪ **CE-Test/Model exam**

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- The teaching of language a practical approach, B.N. Safaya
- The principle and methods of teaching, Bhatia and Bhatia
- Technology of Teaching, R.A. Sharma
- Models of Teaching, Bruce Joyce- Mersha Wein
- Introduction of Educational Technology, K. Sampath, a paneer Selvam, S- Santhanam

- Modern trends in teaching technology, Romesh Varma, Suresh sarma.
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- Practical Sanskrit Grammer, PRD Sarma
- Tarkasamgrah, Annambhatta
- First book of Sanskrit and Second Book of Sanskrit, Bhandarkar
- A Sanskrit Grammer for Students, A macdoval
- Kuvalayanandam, Appayadikshita
- Vrtarathnakaram, Kedarabhatta
- Sidhanta Kaumudi, Bhattogi Dhikshidar
- Laghusidhanta Kaumudi, Varadaraja Panditan
- A Work book for Sanskrit Learners :   DPI 2012 General Education
- Abhyasamanjari   CD by DPA
- Vakyamritham   14 DVD by DPI
- Prayogaparichayam   2 CD -DPI

EDU 09.5 - THEORETICAL BASE OF ARABIC LANGUAGE EDUCATION - II

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives :

The student teacher:

- Familiarizes with the principles of curriculum construction and organization
- Grasps the relationship between curriculum and Syllabus
- Acquaints with teaching and learning resources available in the formal and informal contexts
- Analyzes instructional materials in print form for effective transaction
- Explores and practice infotainment activities in language
- Enables to promote student effort in learning
- Equips to manage diverse learner needs in language classes
- Develops interest in innovative practices in the field of Arabic Language Teaching and learning

Contents

UNIT I	:	CURRICULUM
Unit II	:	TEACHING LEARNING RESOURCES OF ARABIC LANGUAGE
UNIT III	:	ACTIVITY BASED TEACHING & LEARNING OF ARABIC
UNIT IV	:	MODERN INSRUCTIONAL STRATAGIES
UNIT V	:	INCLUSIVE EDUCATION

Unit I: CURRICULUM : (12 T + 5 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Prospective teacher familiarizes with the principles, approaches of curriculum construction and organization	▪ Meaning & Definition ▪ Principles , Approaches to curriculum construction ▪ Curriculum and syllabus ▪ Types of Curriculum ▪ Modern Trends in Curriculum Construction ▪ NCF(2005)	Introductory lecture Direct instruction Intro talk on the different Frame work available	▪ TE ▪ CE ▪ Assignments

	KCF(2007)	Verbal interaction	Presentation of report
	Life Centered, Learner centered, Activity centered , Issue Based, Problem Based Critical Pedagogy	Cooperative learning	Level of Participation
		Analytical Approach	

Unit II: TEACHING LEARNING RESOURCES OF ARABIC LANGUAGE (12T = 5 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Acquaints with the teaching-learning resources available in the formal and informal contexts.	• Teaching and Learning Resources • Text Book/Course Book its characteristics an qualities • Handbook: its characteristics an qualities • Supplementary Reader • Other resources: • Source book, workbook, local Text, magazines, newspapers, journals, cartoons, learning modules • E-books • Digital Learning resources • Library: • School library, class library, digital library, online library • Language institutes	Field visit/Survey Projects Hands-on experience Group discussion Sharing of learning experience	• TE • **CE-Practicum** • (preparation and submission of filed visit reports) • Report Writing • Individual Task Analysis

Unit III: ACTIVITY BASED TEACHING LEARNING RESOURCES OF ARABIC(12 T + 5 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops an understanding of different activity resources and aids of Teaching -learning Arabic	- Learning by doing - Arabic Learning Activities - Formal / Informal contexts - Nadiyathullugha (Literary Club) - Jamiyyathu al adabiyya al arabiyya - Majallathu al Arabiyya: al saffiyya, al Madrasiyya, al Jidariyya, al Nuskhiyya(manuscript) - Idaathu al Arabiyya (Broadcasting) - Ialaanathu al Arabiyya (Notices& Advts) - Maharjan al Adab Al Arabi - Al thaaleef wa Thasdeer - Al Mushairaa - Fieldtrips \study tour	Meaningful verbal expression Demonstration Use of video clips	**CE** **Uploading of teaching manual in blog** **Practicals** **Innovative work/teaching aid** - monitoring performance tasks - Assessment of Materials

Unit IV: MODRN INSTRUCTIONAL STRATAGIES: (12 T + 5 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To enable the student teacher to promote student effort in learning	- Collaborative Learning & - Co-operative Learning - Discussion - Project Work - Workshop - Seminar - Debate - Interactive sessions	Intro lecture Enquiry centered discussion Brain storming Group tasks by assigning specific roles Watching video recordings Web based learning	- TE - CE - Monitoring level of participation - Submission of reports - Analysis of observation reports

Unit IV: INCLUSIVE EDUCATION: (12 T + 4 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
2. Understands the individual difference and acts accordingly in classrooms	▪ Individual Differences ▪ Multiple level learning ▪ Learning Disability ▪ CWSN (Children With Special Needs) ▪ Strategies for Teaching CWSN	Case Study Review of e-resources Extension lectures by specialists	▪ TE ▪ **CE-Test**

Suggested References
- "Tharaiq Thadrees wa statheejiyyathuhu" Dr. Muhammed Mahmood al haila , Dar al kitab al jamie'I, Al Ain , UAE
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- Mushkilat thaa'leem al lugha al Arabiyya; Abbas mahmood, dar al ssaqfa, Qatar.
- Al muallim al Najih" : Dr. Abdullah al Amiri, dar usama linnashri wa thaouzee'a

EDU 09.6 – THEORETICAL BASE OF TAMIL EDUCATION – II

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives: The student teacher

- **1.** apply the strategies of teaching and evaluation of Tamil language in actual classroom situations.
- 2. acquire the new issues related to the methodology of teaching and evaluation
- 3. acquire the skill of using ICT and language laboratory in teaching of Tamil
- 4. develop sill to collect, improvise and use proper teaching aids
- 5. understand the principles of preparing curriculum for tamil language and text books
- 6. compare the traditional and new methods and strategies of teaching Tamil.
- 7.locate the place of bilingualism in teaching of Tamil in Kerala.
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Contents

Unit 1	: **Curriculum**
Unit 2	: **School and community based teaching**
Unit 3	: **Teaching-Learning support system for Teaching Language**
Unit 4	: **Evolving Instructional strategies for collaborative/cooperative learning – in small and medium groups handling of less abled and more abled students, inclusive education in the respective subject**
Unit 5	: **e-resources and learning management systems in teaching and learning of Tamil**
Unit 6	: **Process based performance assessment methods and means with respect to each optional employability other than teaching a hint (to enhance broad utility of the course) research in the particular optional subject education**

Unit I: Curriculum: Recent regional/national/international curriculum movements –critical pedagogy/PBL/issue based curriculum NCF-2005, KCF-2007, and its latest versions (12 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize with the functional plan of curriculum 2. To develop the ability to construct curriculum	▪ Curriculum-concept of curriculum-definition of curriculum-curriculum and education ▪ Foundation of curriculum development-types of curriculum-principles of curriculum development-curriculum construction in Tamil-Recent regions-religion-International-NCF 2005-KCF 2007.	Brain storming Narration Assigned readings from the works of theorist Co-operative learning Group discussion Web based resources Analytical approach	▪ Examine level of participation ▪ Examine student report ▪ Address the level of pupil group discussion ▪ **Practicals** o Online assignment

Unit II: School and community based teaching/learning resources (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarizes with gathering knowledge from various sources 2. Develop ability to using the different types of resources	▪ Learning resources-formal-informal learning- contexts-library-agri-farm-play ground and music room-historical monuments lancers institutes-local panchayat level initiatives-non-governmental movement and organization-(Here write some name relating Tamil Languageforum)	Demonstration of different ways of learning Co-relating classroom activities/Field visits/Social survey/Projects/Club Use of multimedia resources-Language lab activities online resources-Observation of video clips	▪ Evaluate the competence to compare and control ▪ Monitor the ability to collect information. ▪ Use of checklist to monitor, rate performance in each skill. ▪ **CE-Test**

Unit III: Teaching-Learning support system for Teaching Language (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarize with different types of support system for teaching-learning. 2. Update knowledge of current approaches and sources 3. Develop ability to choose the most suitable sources for teaching learning	▪ Textbook reader ▪ Play skits ▪ Learning Modules ▪ Language Lab ▪ Journals and ▪ Class magazine ▪ Literary club	Demonstration of sources for teaching-learning Meaningful verbal learning Watching video recording of different sources Virtual learning Assessing online input on the topic	▪ Evaluate the competence to compare and contrast --- Assessment tests ▪ Assessment of book entries ▪ **CE- Practicum** ▪ Monitoring the ability to involve in different types of sources

Unit IV: Evolving Instructional strategies for collaborative/cooperative learning – in small and medium groups handling of less abled and more abled students, inclusive education in the respective subject (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify different types of students in classroom 2. Develop the ability to choosing correct method	▪ Different types of group of students small and medium groups in less abled, abled and more abled. ▪ Characteristics of the above three abled. ▪ Proper method of teaching	Brain storming Assigned readings from the works of theories Watching video recordings of different type of teaching. Assessing online input on the topic.	▪ Examine the level of participation. ▪ Assessment tests ▪ Assessment of book entries ▪ **CE - Seminar** ▪ Evaluation based on documentation. ▪ Monitor through classroom performance.

Unit V: e-resources and learning management systems in teaching and learning of Tamil (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To gathering knowledge about e-learning and mobile learning 2. Ability to know the use of e-learning and mobile learning	▪ Meaning of e-resources-e-learning ▪ Disadvantages of e-learning-meaning of mobile learning-characteristics of mobile learning-advantages of mobile learning	Quiz Discussion Assessing online input on the topic Assigned readings from the works o theories.	▪ Examine the level of participation ▪ Evaluation based on documentation ▪ **Practicals** 　o Preparation of a teaching manual and posting in the blog ▪ Addressed the level of pupil involvement in discussion. ▪ Monitor the ability to collects resources from the e-sources.

Unit IV: Process based performance assessment methods and means with respect to each optional employability other than teaching a hint (to enhance broad utility of the course) research in the particular optional subject education (10 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize the higher level skills 2. To identify the higher level skills 3. To understand the steps to develop skills 4. To develop the steps of multi skills	▪ Developing the higher level skills ▪ Identifying the higher level skills ▪ Paragraph writing ▪ Out lining ▪ Summarizing ▪ Note-taking and Note making ▪ Reporting ▪ Creativity-story poems novel etc ▪ Oratory skill ▪ Conversation ▪ Organizing the conversation	Group discussion Documentation Dramatization Narrative expression in small and medium groups	▪ Analysis in group discussion and miming ▪ Debating and Quizzes ▪ Assessment of entries ▪ **CE – Test/Model Exam**

References : See EDU 04.6

EDU 09.7 - THEORETICAL BASE OF MATHEMATICS EDUCATION- II

Instructional Hours: 84(Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

Student-teachers:

- understand the modern trends in curriculum construction and organisation of mathematics
- Understand the need and importance of community based resources in the present scenario online resources
- Understand the man made resources - mathematics laboratory, mathematics library, mathematics club etc. in the present context
- Familiarise with informal learning contexts - Mathematics exhibitions, Fair etc.
- Acquaint with resources for teaching and learning mathematics- Text book ,Teachers hand books ,Work books , websites, Educational
- CDs, Learning Modules etc.
- Develop the ability to adapt with modern instructional strategies
- Understand the ways of developing and maintaining interest in learning mathematics.
- Familiarise with the role of modern technology in teaching learning mathematics

Contents

Unit I	:	**Curriculum Construction & Organisation (18 Hrs.)**
Unit II	:	**School and Community Based Teaching Learning Resources (15 Hrs.)**
Unit III	:	**Resource Materials for Teaching Mathematics (13 Hrs.)**
Unit IV	:	**Modern Instructional Strategies for Learning Mathematics (21 Hrs.)**
Unit V	:	**E-Resources and Learning Management Systems in Teaching and Learning of Mathematics (10 Hrs.)**
Unit VI	:	**Process based Performance Assessment Methods in Mathematics Learning (7 Hrs.)**

Unit I: CURRICULUM CONSTRUCTION & ORGANISATION (18 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the modern trends in curriculum construction 2. To familiarise with the principles of Curriculum organisation, approaches to mathematics	• Concept of Curriculum • New approaches to curriculum transaction - Critical Pedagogy, Problem Based Learning, Reflective learning, Experiential learning	Group discussions Seminars Meaningful verbal presentation	• Performance analysis in group discussions • Observation • Seminar reports • Participation in the Seminar

	Modern trends in curriculum construction - their application in developing Mathematics curriculum	Power point presentations	sessions
curriculum and curriculum study groups		Seminars	■ Assessment of optional note/lecture note
3. To acquaint student teachers with the various approaches of Curriculum transaction and various curriculum study groups in India and abroad	■ Principles of Curriculum organisation – Topical and Spiral, Logical and Psychological, Concentric and Spiral, Correlation	Assignments	■ Assessment of daily reflections / assignment
	■ Approaches to mathematics curriculum suggested by NCF and KCF		**Practicum (CE)**
	■ Curriculum Study Groups - SMP SMSG, NMP, SCERT, NCERT		

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-

Unit II: SCHOOL AND COMMUNITY BASED TEACHING LEARNING RESOURCES (15 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To make the student teachers understand the need and importance of community based resources in the present scenario 2. To understand the man made resources in the present context 3. To make familiarise with informal learning contexts	■ Concept of community based resources ■ Human resources - locally available experts in Mathematics ■ Natural resources- Mathematical aspects found in Environmental phenomena- congruence, similarity, ratio and proportion, geometric shapes, symmetric property etc. ■ Man made resources like: Mathematics laboratory- need and significance, Mathematics library-need and Significance,	Group discussions Seminars Meaningful verbal presentation Power point presentations Illustrations Field visit-Guest talk	■ Questioning ■ Performance analysis in group discussions ■ Observation ■ Participation in the Seminar sessions ■ Evaluation of daily reflections

	Mathematics Club- need and significance, formation and its activities, On line resources ▪ Informal learning contexts such as Mathematics exhibitions, Fair etc.		

References

- James, A.(2005). *Teaching of Mathematics*. New Delhi: NeelkamalPublications,Pvt Ltd.
- James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd
- Mangal, S.K. *Teaching of Mathematics.* Ludhiana: Prakash Brothers Educational Publishers.
- Kumar, S.&Ratnalikar,D.N.(2003). *Teaching of Mathematics*. New Delhi: Anmol Publications Pvt. Ltd.

Unit III: RESOURCE MATERIALS FOR TEACHING MATHEMATICS (13 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint student teachers with resources for teaching and learning mathematics 2. To make the student teachers familiar with the possibilities of the resource materials in the present context	▪ Text book – need and importance, qualities of good mathematics text book, critical analysis of the existing mathematics text book in secondary schools of Kerala ▪ Teachers hand books – need and importance ▪ Work books – need and importance ▪ Need and importance of websites, Educational CDs, Learning Modules	Group discussions Collaborative learning strategies Seminar Document Analysis Practicum Power point presentation Development of e-materials (Practicals)	▪ Role Performance in discussions ▪ Participation in Group activities ▪ Assessment of document ▪ Reports of practicum **Practicals** o **Teaching Manual (uploading a self designed innovative lesson segment on a single concept)**

References

- James, A.(2005). *Teaching of Mathematics.* New Delhi: Neelkamal Publications, Pvt Ltd.
- James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd.
- Mangal, S.K. *Teaching of Mathematics.* Ludhiana: Prakash Brothers Educational Publishers.

Unit IV: RESOURCE MATERIALS FOR TEACHING MATHEMATICS (13 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop the ability to adapt with modern instructional strategies 2. To understand the nature , characteristics and needs of children with CWS 3. To understand the ways for developing and maintaining interest in learning Mathematics.	**Modern instructional strategies** ▪ Cooperative learning strategies ▪ Collaborative learning ▪ Concept mapping ▪ Gradation ▪ Simulation ▪ **Mathematics Education for children with special needs:** Nature, Characteristics and activities of ▪ Gifted students ▪ Slow learners and ▪ Culturally deprived children ▪ Ways for Stimulating and maintaining interest in learning Mathematics	Group discussions Seminars Role play Meaningful verbal presentation Collaborative and cooperative learning strategies Power point presentations Dramatisation Group discussions Seminars Meaningful verbal presentation Power point presentations	▪ Summative evaluation ▪ Performance analysis in group discussions ▪ Observation ▪ Participation in the Seminar sessions ▪ Evaluation of the reflective journal ▪ **Tests (CE)** ▪ Performance analysis in group discussions ▪ Observation ▪ Participation in the Seminar sessions

References

- Ediger, M. &Rao, D. B. (2000).*Teaching Mathematics Successfully*. New Delhi: Discovery Publishing House.
- Kar, C. (1992). *Exceptional Children- Their Psychology and Education.* New Delhi: Sterling Publishers Pvt. Ltd.
- James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd.
- James, A. (2006). *Techniques of Teaching Mathematics.* New Delhi: Neelkamal Publications Pvt. Ltd.
- Mangal, S.K. Teaching of Mathematics. Ludhiana: Prakash Brothers Educational Publishers.

Unit V: E-RESOURCES AND LEARNING MANAGEMENT SYSTEMS IN TEACHING AND LEARNING OF MATHEMATICS (10 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise with the role of modern technology in the teaching and learning of Mathematics	▪ Learning management systems- definition and identification of e-resources ▪ e-content development ▪ m-learning	PowerPoint presentations Brainstorming Meaningful verbal presentations Seminars Extension talks On line learning	▪ Participant observation ▪ Evaluation of reflective diary **Practicals** o **Innovative work/teaching aid**

Unit VI: PROCESS BASED PERFORMANCE ASSESSMENT METHODS IN MATHEMATICS LEARNING (7 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise with various 2. Performance assessment methods	▪ Research in Mathematics Education- Need and importance ▪ Performance Assessment Methods in Mathematics Learning	PowerPoint presentations Seminars Group activities Practicum On line assignment	▪ Role Performance in discussions ▪ Participation in Group activities ▪ Document analysis ▪ **CE** ▪ **Test/Model Examination**

References/Suggested Readings

- Aggarwal, J.C. (2001). Principles, Methods & Techniques of Teaching (2nded.). New Delhi: Vikas Publishing House Pvt. Ltd.
- Ediger, M. &Rao, D. B. (2000).Teaching Mathematics Successfully. New Delhi: Discovery Publishing House.
- James, A.(2005). Teaching of Mathematics. New Delhi: Neelkamal Publications, Pvt. Ltd.
- James, A. (2006). Techniques of Teaching Mathematics. New Delhi: Neelkamal Publications Pvt. Ltd.

- Mustafa,M.(2005). Teaching of Mathematics. New Delhi: Deep and Deep Publications Pvt. Ltd.
- Orton, A. (2007).Learning Mathematics.(3rd ed.). London: Continuum
- Siddiqui, M. H. (2007). Teaching of Mathematics. New Delhi: APH Publishing Corporation.
- Wadhwa, S. (2000). Modern Methods of Teaching Mathematics. New Delhi: Sarup& Sons.
- Kumar,S.&Ratnalikar,D.N.(2003). Teaching of Mathematics. New Delhi: Anmol Publications Pvt. Ltd.
- Soman, K. Ganithasasthrabodhanam.Thiruvananthapuram: Kerala Bhasha Institute.
- Chambers,P.(2008). Teaching Mathematics. New Delhi: Sage publications

EDU 09.8 - THEORETICAL BASE OF PHYSICAL SCIENCE EDUCATION - II

Instructional Hours: 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

- To get a field based understanding of theories and principles of of pupil assessment and evaluation
- To inculcate the theoretical and practical wisdom of science classroom and its associated units' design, management and innovation
- To identify the Entrepreneurial opportunities of futuristic significance associated with the Physical Science education.
- To strengthen the experience of the promising student-teachers as Science curriculum designers, transmitters and assessors.
- To develop a neo-humanistic attitude among the student-teachers in the light of Science-Technology-Society-Environment interaction paradigm.

Contents

Unit 1	:	**Curriculum in Science Education**
Unit 2	:	**Community Based Science Teaching–Learning Resources**
Unit 3	:	**Resource Materials for Teaching Physical Science**
Unit 4	:	**Modern Instructional Approaches in Science Education**
Unit 5	:	**E-resources in Teaching and Learning of Physical Science**

Unit I: Curriculum in Science Education (16+6=22 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the principles of curriculum organization 2. To acquaint student teachers with the various approaches of curriculum organization. 3. To provide familiarization with the modern trends in curriculum organization in regional, national & international level	▪ Curriculum – meaning- syllabus, Principles of curriculum construction . Hidden curriculum ▪ Approaches to curriculum organization – concentric plan, spiral curriculum, type study, topical approach, historical approach, nature study, nature rambling, general science and disciplinary approach.	Meaningful verbal expression Group discussion buzz session Document Analysis Explicit Teaching Seminar cum discussion	▪ Role performance analysis in group discussion ▪ Participant observation ▪ Class Tests ▪ Open Book analysis ▪ Poster Designing ▪ Concept Mapping

	Modern trends in curriculum construction – Regional – National – International (Critical Pedagogy / Problem Based Learning / Issue Based Curriculum , KCF (2007), NCF (2005 , 2009), NCERT, State curriculum (SCERT), Nuffield Science Teaching Project, PSSC, CHEM study, SAPA, CASE.	Web Streaming Blog reading	
4. To understand correlation of physical science with other subjects.	▪ Modern trends in curriculum construction – Regional – National – International (Critical Pedagogy / Problem Based Learning / Issue Based Curriculum , KCF (2007), NCF (2005 , 2009), NCERT, State curriculum (SCERT), Nuffield Science Teaching Project, PSSC, CHEM study, SAPA, CASE. ▪ Correlation – Incidental & systematic — correlation of physical science with other subjects such as Biology, Mathematics, Language, Geography, History, Earth science, Music, Art & Craft, life and environment.		

Unit II: Community Based Science Teaching – Learning Resources (14+10=24 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize various community resources and various formal and informal learning contexts. 2. To identify government and non-governmental movements for popularizing science.	▪ Community based resources-Meaning, Need and significance ▪ Formal Science learning contexts: Library – School library and class library. Science library – importance and its organization, web resources for accessing information. Science lab – importance and its organization, Registers-purchase and maintenance of chemicals, apparatus and equipments, laboratory rules, accidents in the laboratory, precautions, and first aid. Facilities for individual and group work in the lab. Need and importance of field trips, excursions, Science fairs and exhibitions: facilities and support to create knowledge, Significance and organization of Science	Group discussion Assignment seminar field trip Video based Discussion Seminar Assignment Study Tour Case Study Scenario based Learning	▪ Document analysis ▪ Quiz programme ▪ Problem based Practicum ▪ Experimental set up deigning for competitions (Practicum) ▪ K-W-L charting **Practicum – CE** **Practicals** ○ **Online assignment**

	club – activities-training in problem solving and development of psychomotor skills		
	▪ Informal learning contexts such as parks, museum, historical monuments, play ground, music room, planetarium, ANERT etc.	Community resource mobilization/Context ual analysis	
	▪ Governmental and non-governmental movements & organizations for popularizing science – Science Talent Search Programme, Science Olympiad, KYVP, Sasthraposhini scheme etc.		

Unit III: Resource Materials for Teaching Physical Science (8+2=10 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint student teachers with resources for teaching & learning physical science.	▪ Textbook – qualities of a good science text book –Vogel's criteria, Readability-Fog index, handbook for teachers – source book – work book for learners – reference books – supplementary reading materials – educational CD /DVDs – learning module - websites.	Meaningful verbal expression Group discussion Narrative expression sessions in small or medium groups Case Study and Specimen Analysis Seminar Assignment Discussion in small groups	▪ Participant observation ▪ Analysis in group discussion ▪ Class Test ▪ Material Development Circles ▪ **Class Test (01)-CE**

Unit IV: Modern Instructional Approaches in Science Education (12+3=15 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize modern instructional approaches for classroom learning. 2. To identify special education needs of slow learners, fast learners, scientifically gifted and creative learners	▪ Modern instructional approaches for cooperative / collaborative learning – Jigsaw technique, circle learning, concept mapping, think – pair and share. ▪ Science education for students with special education needs – slow learners, fast learners, scientifically gifted and creative learners	Meaningful verbal expression Group discussion Small group sessions Peer instruction Cooperative Learning Video presentations Digital Presentations Seminar cum demonstration sessions	▪ Analysis in group discussion ▪ Participant observation ▪ Grading sheet for observation ▪ MCQ based Quiz

Unit V: E-resources in Teaching and Learning of physical science (10+3=13 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand and develop e-contents for teaching various topics of physical science 2. To explore the ways to develop an educational entrepreneur.	▪ Learning management systems –Definition - identification of E –resources. ▪ e – content development – steps (Practice as Practicum) ▪ Educational entrepreneurship – career possibilities for trained graduate and post graduate science students	Web Streaming Document Analysis Explicit Teaching Collaborative designing sessions Development of e-content Individual/ group presentation Demonstration	▪ Assessment of individual/ group performance ▪ Debate ▪ Critical self reflection ▪ Rubric based assessment of individual performance ▪ Think Aloud Sessions **Practicals** o **Uploading innovative teaching manual in blog (01)** **CE-Test/model exam**

References

- BunnieOthanel Smith (1950): Fundamentals of Curriculum Development: California, World Book Company.
- David Heywood, Joan parker (2010): The Pedagogy of Physical Science: London, Springer.
- DimitrisPsillos& Hans Niedderer (2002): Teaching and Learning in the Science Laboratory: Netherlands, Kluwer Academic Publishers.
- Frederick M. Hess (2006): Educational Entrepreneurship: realities, challenges, possibilities: Harvard, Harvard Education Press.
- FundaOrnek, Issa M. Saleh (Eds.) (2012): Contemporary Science Teaching Approaches: Promoting Conceptual Understanding in Science: USA, Information Age Publishing Group.
- Jeffrey Michael Reyes, Duncan Andrade, Ernest Morrell (2008): The Art of Critical Pedagogy: Possibilities for Moving from Theory to Practice: New York, Peterlang Publishing Inc.
- John Wallace, William Louden (2002): Dilemmas of Science Teaching [electronic resource]: perspectives on problems of practice: New York, Routledge.
- NCSECA (1995):National Science Education Standards USA ,National Academic Press.
- RadhaMohan(2007): Innovative Science Teaching: New Delhi, Prentice Hall of India Pvt Ltd.

EDU 09: THEORETICAL BASES OF NATURAL SCIENCE EDUCATION -PART II

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives
- To enable the student teachers to:
- Understand the trends in Life Science curriculum
- Identify the school and community resources for better science learning
- Familiarize the e-learning resources in Life Science
- Develop instructional strategies for collaborative /co-operative learning
- Develop rubrics for process based performance assessment.

Content
Unit I   **: Modern instructional strategies**
Unit II   **: Community based resources for enhancing science learning Human resources**
Unit III   **: School based resources of science learning**
Unit IV   **: Resource materials for teaching natural science**
Unit V   **: Curriculum trends in biological science**

Unit I: MODERN INSTRUCTIONAL STRATEGIES.(Hours-11)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand about the Cooperative, Collaborative strategies. 2. To understand various modes and means of reflective practices	▪ Modern instructional approaches/technique for Cooperative and Collaborative learning – Jigsaw technique, circle learning, concept mapping, think-pair share. ▪ Reflective practices – Meaning and importance, modes and means of reflective practices.	Meaningful verbal expression. Group discussion. Narrative expression sessions in small or medium groups. Brain storming. Seminar. Reflective practices. Debate.	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy. ▪ Daily reflective journal ▪ Participant observation

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
		Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	

References

- Tony liversidge, MattCochrane, Bernie Kerfoot, (2009).Teaching Science-Developing as a Reflective Secondary Teacher, Sage South Asia education, New Delhi.
- Mathew, T.K., and Molikutyy, T.M (2006).Science Education- Theoretical Base of Teaching and Pedagogic Analysis, Rainbow Book Publishers, Kerala.

Unit II: COMMUNITY BASED RESOURCES FOR ENHANCINGSCIENCE LEARNING(19 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify, and utilize different community resources for science learning.	▪ Community based resources for science learning- relevance and scope. ▪ Identification of Community resources for better science teaching and learning –Human resources- e.g. Resource persons/ eminent teachers/ personalities/ scientists in the local community. Natural Resources- e.g .pond /lake/river/sea/ forest/ wet land/ mangroves/ sacred grooves etc. Man made Resources- e.g. Museum/ Zoo/ Botanical garden/ Agrifarms / hospital, Krishibhavan/Research centers /other governmental and non governmental agencies etc.	Group discussion Seminar Personality profile presentation Reflective practices. PBL Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	▪ Posters ▪ Online assessment ▪ Quiz programme. ▪ *Participation in group discussion. ▪ Questioning. ▪ On-task behavior. ▪ student's portfolio ▪ **CE- practicum**

References

- Carl simmons, Claire Hawkins, (2009).Teaching ICT-Developing as Reflective Secondary teacher, Sage South Asia education, New Delhi.
- Ramakrishna, (2012). Methodology of Teaching Life Sciences, Dorling kindersly Pvt Ltd, India.

- Jessy Mathews, (2008).Teaching of Natural Science –theory, Perspectives and practices. Methodology of teaching life sciences
- Radha Mohan, (2007). Innovative Science Teaching for Physical Science teachers(3rded) PHL learning, New Delhi.
- Narendera Vaidhya, (2006).Science Teaching in School for the 21st Century ,deep and deep publications PVT, New Delhi.
- Mathew,T.K., and Molikutyy, T.M, (2006).Science Education- Theoretical Base of Teaching and Pedagogic Analysis, Rainbow Book Publishers,Kerala.

Unit III: SCHOOLBASED RESOURCES FOR SCIENCE LEARNING(Theoryhours-18)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand, and utilize school based resources in formal and informal learning. 2. To organize different extra-curricular activities related to science teaching	▪ Library –School and Class library- importance and its organization, Types of resources for accessing information - book, non book and web resources. ▪ Science laboratory- significance and organization –Designing a high school biology laboratory. ▪ Club activities - Science club, Science fair, Exhibition, Manuscript magazine, Field trip & Excursion, Community awareness programme and Living corners- Pisciculture, Bird watching and rearing ,different types of garden(Vegetable, ornamental and Herbal).	Meaningful verbal expression. Group discussion. Narrative expression sessions in small or medium groups. Brain storming. Seminar. Reflective practices. PBL. Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy. ▪ Daily reflective journal ▪ Participant observation. ▪ Student's portfolio

Unit IV: RESOURCE MATERIAL FOR TEACHING NATURAL SCIENCE (Hours-17)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand ,design and practice resource material for teaching and learning of science. 2. To generate awareness about educational CDs/DVDs developed by SCERT, NCERT, IT@school for effective Biology teaching.	▪ Text books- qualities of good science text book, Text book analysis. Supplementary reader. ▪ Hand book for teachers and Work book for learners-prepare a work book based on the select unit of secondary school biology. ▪ Reference material-encyclopedia, newsletters, magazines, journals. ▪ ICTBaesd Resource Materials- –Educational CDs developed by SIET, NCERT, IT@ school and other Non Governmental agencies for the learning of biology at secondary level.	Group discussion Small group sessions Peer instruction Narrative expression sessions in small or medium groups. Brain storming. Seminar. Reflective practices. PBL. Modular approach. Multimedia and interdisciplinary approach. Peer tutoring	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy. ▪ Daily reflective journal ▪ Participant ▪ observation ▪ **CE-** ▪ **Uploading of self designed lesson segment in the blog.** • **Practicum**

Unit V: RESOURCE MATERIAL FOR TEACHING NATURAL SCIENCE(Hours-17)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand ,design and practice resource material for teaching and learning of science. 2. To generate awareness about educational CDs/DVDs developed by SCERT, NCERT, IT@school for effective Biology teaching.	▪ Text books- qualities of good science text book, Text book analysis. Supplementary reader. ▪ Hand book for teachers and Work book for learners-prepare a work book based on the select unit of secondary school biology. ▪ Reference material-encyclopedia, newsletters, magazines, journals.	Group discussion Small group sessions Peer instruction Narrative expression sessions in small or medium groups.	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy. ▪ Daily reflective journal ▪ Participant

		Brain storming.	▪ observation
	▪ ICT Based Resource Materials- – Educational CDs developed by SIET, NCERT, IT@ school and other Non Governmental agencies for the learning of biology at secondary level.	Seminar. Reflective practices. PBL. Modular approach. Multimedia and interdisciplinary approach. Peer tutoring	

References

- Carl simmons, Claire Hawkins, (2009).Teaching ICT-Developing as Reflective Secondary teacher , Sage South Asia education,New Delhi.
- Mathew,T.K., and Molikutyy, T.M (2006).Science Education- Theoretical Base of Teaching and Pedagogic Analysis, Rainbow Book Publishers,Kerala.
- Jessy Mathews, (2008).Teaching of Natural Science –theory, Perspectives and practices. Methodology of teaching life sciences.
- Sharma, R .A., (2009).Information and Communication Technology in Teaching.Lall Book Depot,Meerat
- Mohanthy J, (1994).Educational Broadcasting: Radio and Television, Sterling Publishers, New Delhi.
- JessyMathews., (2008).Teaching of Natural Science –Theory, Perspectives and Practices, Methodology of Teaching life sciences.
- www.teach-ict.com/-21k
- www.edurite.com
- http://itschool.gov.in
- http://www.learning technologies.co.uk/

Unit V: CURRICULUM TRENDS IN BIOLOGICAL SCIENCE (Theory hours-15, marks -15)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand and apply the principle and organization of curriculum construction. 2. To understand and compare the curricular movements instate, national and international level.	▪ Curriculum-Meaning-functions and, Principles of curriculum construction, ▪ Types of curriculum-subject centered, activity centered, integrated and hidden curriculum ▪ Approaches to curriculum organization-	Meaningful verbal expression Group discussion Small group sessions	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy.

| 3. To understand and and skill in practicing Critical Pedagogy, Problem Based Learning, and Issue Based Learning in science teaching learning process. 4. To make a Critical analysis of the prevailing secondary school biology syllabus. | Topical, Subject, Concentric, Spiral and Integrated. Factors affecting curriculum organization, Criteria of a good Natural science curriculum.
▪ Modern trends in curriculum movements
▪ State-SCERT,KCF(2007)
▪ National –NCERT,NCF(2005)
▪ International-Biological Science Curriculum Study (BSCS),Nuffield Biology Project
▪ Critical analysis of the prevailing secondary school biology syllabus.
▪ An introduction to Critical Pedagogy, Problem Based and Issue Based Learning. | Peer instruction

Narrative expression sessions in small or medium groups.

Brain storming.

Seminar.

PBL.

Modular approach.

Multimedia and interdisciplinary approach.

Team teaching.

Peer tutoring | ▪ Daily reflective journal
▪ Participant
▪ observation.

CE-Test no-1 .Including all chapters.Marks-5 |

References

- BunnieOthanel Smith (1950): Fundamentals of Curriculum Development: California, World Book Company.
- David Heywood, Joan parker (2010): The Pedagogy of Physical Science: London, Springer.
- DimitrisPsillos& Hans Niedderer (2002): Teaching and Learning in the Science Laboratory: Netherlands, Kluwer Academic Publishers.
- Frederick M. Hess (2006): Educational Entrepreneurship: realities, challenges, possibilities: Harvard, Harvard Education Press.
- FundaOrnek, Issa M. Saleh (Eds.) (2012): Contemporary Science Teaching Approaches: Promoting Conceptual Understanding in Science: USA, Information Age Publishing Group.
- Jeffrey Michael Reyes, Duncan Andrade, Ernest Morrell (2008): The Art of Critical Pedagogy: Possibilities for Moving from Theory to Practice: New York, Peterlang Publishing Inc.
- John Wallace, William Louden (2002): Dilemmas of Science Teaching [electronic resource]: perspectives on problems of practice: New York, Routledge.
- NCSECA (1995):National Science Education Standards USA ,National Academic Press.
- RadhaMohan(2007): Innovative Science Teaching: New Delhi, Prentice Hall of India Pvt Ltd.

Suggested Further Reading

- Anderson R.D et al. (1992): Issues of Curriculum Reform in Science, Mathematics and Higher Order Thinking Across the Disciplines: U.S.A, The Curriculum Reform Project.
- Carin& Robert Sund (1989): Teaching Modern Science (5th Ed.): U.S.A, Merill Publishing Co.
- Chauhan S. S. (1985): Innovation in Teaching and Learning Process: New Delhi, Vikas Publishing House.
- DavarMonika(2012):Teaching of Science: India, PHI Learning Pvt. Ltd.

- Edgar Dale (1963): Audio-Visual Methods in Teaching (Revised Ed.): New York, Thy Dryden Press.
- Falvery P., Holbrook J. &Conian D. (1994): Assessing Students: Hongkong, Longmans Publications.
- Gupta S.K. (1985): Teaching of Physical Science in Secondary Schools: New Delhi, Sterling Publications.
- Harms N. &Yager R. (1981): What Research Says to the Science Teacher (Vol. 3): USA, National Science Teachers Association.
- Heiss, Obourn& Hoffman (1985): Modern Science in Secondary Schools: New Delhi, SterlingPublications.
- Husen T., Keeves J.P. (Eds.) (1991): Issues in Science Education: Oxford, Pergamon Press.
- Jenkins E. W. (2000): Innovations in Science and Technology Education (Vol. VII): Paris, UNESCO.
- Kalra R. M. & Gupta Vandana (2012): Teaching of Science - A Modern Approach: India, PHI Learning Pvt. Ltd.
- Khana S. D., Sexena V.R., Lamba T.P. & Murthy V. (1976): Technology of Teaching: New Delhi, Doaba House.
- Mintzes Joel J., Wandersee James H. & Novak Joseph D. (Ed.) (2005): Teaching of Science for Understanding-A Human Constructivist View: California, Academic press, USA.
- Nair, C.P.S. (1971): Teaching of Science in our Schools: New Delhi, Sultan Chand & Co. (Pvt.) Limited.
- Natrajan C. (1997): Activity Based Foundation Course on Science Technology and Society: Mumbai, HomiBhaba Centre for Science Education.
- Nayak (2003): Teaching of Physics: New Delhi, APH Publications.
- Pandey (2003): Major Issues in Science Teaching: New Delhi, Sumit Publications.
- Patton M. Q. (1980): Qualitative Evaluation Methods: NewDelhi, Sage Publications.

EDU 09.10 :Theoretical Base of Social Science Education - II

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:
- To understand the principles of curriculum construction and to acquaint with the different approaches of organization of Social Science curriculum.
- To analyse the significance of Social Science education in developing the true spirit of National Integration and International understanding
- To familiarize community based teaching- learning resources in Social Science
- To acquaint with the organizing and maintaining library and other resources in Social Science.
- To develop understanding on recent instructional strategies for collaborative, metacognitive and critical learning in Social Science.
- To generate an awareness about the need and scope of research in the teaching and learning of Social Science at Secondary level.

Contents

Unit 1	:	**Curriculum in Social Science**
Unit 2	:	**Role of Social Science in National Integration and International understanding**
Unit 3	:	**Organizing and maintaining of Social Science materials and resources**
Unit 4	:	**Community Resources in Social Science**
Unit 5	:	**Present practices in Social Science teaching**
Unit 6	:	**Research inputs of Social Science Education**

Unit I: Curriculum in Social Science (14 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the principles of curriculum construction 2. To understand and familiarize different content organization approaches in Social Science	▪ Social science curriculum- Principles- Modern trends in curriculum- ▪ Concentric – Spiral- Topical approaches	Lecture cum discussion- analyse the significance of curriculum principles in group work Prepare PPT (at least seven slides) on different approaches of content organization in Social Science	▪ Assessment of learning process and reflections ▪ **Uploaded a self designed innovative teaching manual in blog** (**CE -1**)

References

- Aggarwal, J.C. (2003). Teaching of Social Studies: A Practical Approach. Mumbai:Vikas Publishing House.
- Kumar, S.P.K &Noushad,P.P.(2009). Social Studies in the Classroom: Trends andMethods.
- Pathak R.P.(2012).Teaching of social studies. Pearson, Delhi
- Ehman& Patrick (1974). Towards Effective Instruction in Social Studies. USA: Houghton Miffn.
- Dash, B. N.(1998). Content cum Methods of Teaching Social Studies. Ludhiana: Kalyani Publishers.
- Edigar, M. &Rao, B. (2003).Teaching Social Studies Successfully. New Delhi: Discovery Pub.House.

Unit II: Role of Social Science in National Integration and International   understanding

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To analyse the role of Social Science in promoting the spirit of National Integration and International understanding 2. To identify the challenges in modern world and to generate ideas about how the study of Social Science helps to meet the challenges	▪ Meaning of National integration and international understanding ▪ The role of Social science in promoting the spirit ▪ Challenges to democracy-Communalism, Terrorism, globalization and technological advancement.	Meaningful verbal learning with Power point presentation- analyse the significance of the content areas in Social Science Panel discussion- collect information and analyse in separate groups- then form a panel inducting one member from each group	▪ Assessment of learning process and reflections ▪ (role of the learner in discussion, collection of information, analysis and presentation)

References

- NCERT . (2005)National Curriculum Frame Work New Delhi: NCERT
- SCERT. (2007) Kerala Curriculum Frame Work Thiruvananthapuram: SCERT
- Pathak R.P.(2012).Teaching of social studies. Pearson, Delhi
- http://en.wikipedia.org/wiki/Wiki
- http://blog.efrontlearning.net
- Mass media

Unit III: Organizing and maintaining of Social Science materials and resources (16 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the significance of Social Science room, laboratory, museum and library 2. To discriminate the features, need and significance of Social science text book, hand book and work book	▪ Features , significance and ways to organize- o Social science room o Laboratory o Museum o Library ▪ Features of a good Social Science Text book ▪ Difference between Text book and hand book Need and significance of work book	Lecture cum discussion- assignment- analyse the possibilities to learn Social science with these facilities Meaningful verbal learning- compare Social science textbook and hand book for standard 8/9/10 to identify the differences	▪ Assessment of learning process and reflections ▪ **Internal test for units 1,2 & 3 (CE-2)** ▪ **Practicals** • **Innovative work/teaching aid**

References

- Aggarwal, J.C. (2003). *Teaching of Social Studies: A Practical Approach.* Mumbai:Vikas Publishing House.
- Kumar, S.P.K &Noushad,P.P.(2009). *Social Studies in the Classroom: Trends and Methods.*
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- Ehman& Patrick (1974). Towards Effective Instruction in Social Studies. USA: Houghton Miffn.
- http://en.wikipedia.org/wiki/Wiki

Unit IV: Community Resources in Social Science (16Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the importance of community resources in teaching of Social Science	▪ Community resources- meaning –nature- need and significance- ▪ Relationship between school and community ▪ Historical- Palace, Museum, caves etc.	Lecture cum discussion	▪ Assessment of learning process and reflections ▪ (role of the learner in discussion, collection of information,

2. To identify important community resources and to understand the ways to utilize in the teaching of Social Science	▪ Geographical- planetarium, geology museums, sea shore etc. ▪ Political – local self govt. institutions, gramasabha legislative assembly etc ▪ Economical – banks, markets etc ▪ Ways to utilize- bring the community to school or bring the school to community	Prepare a list of community recourses- discuss and present the ways to utilize the community recourses Conduct a field study to any one of the resource centres	analysis, presentation and participation in field trip)

References

- Aggarwal, J.C. (2003). Teaching of Social Studies: A Practical Approach. Mumbai:Vikas Publishing House.
- Kumar, S.P.K &Noushad,P.P.(2009). Social Studies in the Classroom: Trends and Methods.
- Pathak R.P.(2012).Teaching of social studies. Pearson, Delhi
- Ehman& Patrick (1974). Towards Effective Instruction in Social Studies. USA: Houghton Miffn.
- Dash, B. N.(1998). Content cum Methods of Teaching Social Studies. Ludhiana: Kalyani Publishers.
- Edigar, M. &Rao, B. (2003).Teaching Social Studies Successfully. New Delhi: Discovery Pub.House.
- http://en.wikipedia.org/wiki/Wiki

Unit V: Present practices in Social Science teaching (12 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To enquire and understand the approaches and strategies that promote social learning, thinking skills and investigative nature of learning	▪ Collaborative – problem solving- discovery – investigatory and metacognitive approaches and strategies	Meaningful verbal presentation with PPT support-Group discussion and presentation on how those strategies can be applied in Social science	▪ Assessment of learning process and reflections

References

- Aggarwal, J.C. (2003). *Teaching of Social Studies: A Practical Approach.* Mumbai:Vikas Publishing House.
- Kumar, S.P.K &Noushad,P.P.(2009). *Social Studies in the Classroom: Trends andMethods.*
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- Kincheloe, J. (2008). Critical Pedagogy (2nd Edn.) New York: Peter Lang.
- Kilpatrick, W. H. (1969). The Project Method. New York: Teachers' College Press.
- Gardner, H. (1983). Frames of Mind: The Theory of Multiple Intelligences. New York: Basic Books
- Goleman, D. (1995). Emotional Intelligence. New York: McGraw Hill.
- Freire, Paulo. (1998). Pedagogy of the Oppressed. USA: Continuum Pub. Co.
- Fitchman& Silva (2003). The Reflective Educators' Guide to Classroom Research. California:Corwin Press, Inc.
- http://en.wikipedia.org/wiki/Wiki

Unit VI: Research inputs of Social Science Education (12 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the need of research in the pedagogical practices in Social Science	▪ Need of research in the teaching learning process ▪ Need for developing innovative techniques and strategies in pedagogy and evaluation ▪ Action research in Social Science	Lecture cum discussion-Analyse (in groups) the need of research and try to find out certain areas of Social Science School curriculum for action research- Prepare a paper (utilizing internet) on the latest research findings on pedagogical aspects in Social science and conduct a seminar.	Assessment of learning process and reflections **Practicals** o **Online assignment** (**Practical evaluation**)

References

- Aggarwal, J.C. (2003). Teaching of Social Studies: A Practical Approach. Mumbai:Vikas Publishing House.
- Kumar, S.P.K &Noushad,P.P.(2009). Social Studies in the Classroom: Trends and Methods.
- Pathak R.P.(2012).Teaching of social studies. Pearson, Delhi
- Dhand, H. (1991). Research in Teaching Social Studies. New delhi: Ashish Publishing House
- Crowder, N.A. (1959). Action Research to Improve School Practices. New York: Columbia University.
- http://en.wikipedia.org/wiki/Wiki
- www.moodle.org
- http://www.ncert.nic.in
- http://www.ciet.nic.in/

EDU 09.11 - Theoretical Base of Geography Education - II
Instructional Hours – 84 (Theoretical discourses – 60 & Related Practical work – 24)

Objectives:
- To understand the principles of curriculum construction and to acquaint with the different approaches of organization of Geography curriculum.
- To familiarize community based teaching- learning resources in Geography
- To acquaint with the organizing and maintaining library and other resources in Geography
- To develop understanding on recent instructional strategies for collaborative, metacognitive and critical learning in Geography
- To generate an awareness about the need and scope of research in the teaching and learning of Geography at Secondary level.

Contents
Unit 1   : **Curriculum in Geography**
Unit 2   : **Role of Social Science in National Integration and International understanding**
Unit 3   : **Organizing and maintaining of Geography materials and resources**
Unit 4   : **Community Resources in Geography**
Unit 5   : **Present practices in Geography teaching**
Unit 6   : **Research inputs of Geography Education**

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Unit I: Curriculum in Social Science (10 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the principles of curriculum construction 2. To understand and familiarize different content organization approaches in Geography	▪ Geography curriculum- Principles- Modern trends in curriculum- ▪ Concentric – Spiral- Topical approaches ▪ Approaches to Geography curriculum suggested by NCF and KCF	Lecture cum discussion- analyse the significance of curriculum principles in group work	▪ Assessment of learning process and reflections **CE - A self designed innovative teaching manual for a single concept in Geography has to be uploaded in the Blog and submit a print out**

References

- Varma, O.P., and Vedanayagam, E.G.(1987) Teaching of Geography, Sterling Publishers
- Private Limited, New Delhi.
- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green and
- Company.
- Barnard. H.C.(1963).Principles and Practices of teaching Geography, Bihar Hindi GrandhAcademy,Patna.

Unit II: Organizing and maintaining of Geography materials and resources (12 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To develop understanding about the significance of Geography room, laboratory, museum and library
2. To discriminate the features, need and significance of Geography text book, hand book and work book
	▪ Concept of community based resources
	▪ Human resources-Natural resources-Man made resources
	▪ Features , significance and ways to organize-
	  o Geography room
	  o Museum
	  o Library
	▪ Features of a good Geography Text book
	▪ Difference between Text book and hand book
	▪ Need and significance of work book
		Lecture cum discussion- assignment- analyse the possibilities to learn Geography with these facilities
		
		Meaningful verbal learning- compare Geography textbook and hand book for standard 8/9/10 to identify the differences
			▪ Assessment of learning process and reflections
			▪ **Internal test for units 1,2 & 3 (CE-2)**

References:

- Arora, M.L.(1979)Teaching of Geography, Prakash Brothers, Ludhiana.
- Gopill, G.H.(1966) Teaching of Geography, Macmillan, London
- Garnett, Olive. (1967) Fundamentals in School Geography, George G., Harrap and
- company, London.
- Varma, O.P., and Vedanayagam, E.G.(1987) Teaching of Geography, Sterling Publishers
- Private Limited, New Delhi.
- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green and
- Company.

- Barnard. H.C.(1963).Principles and Practices of teaching Geography, Bihar Hindi GrandhAcademy,Patna.
- Prasad Jagdish. (1982). Teaching of Geography, VinodPustakMandir, Agra
- Singh. H.W.(1985). Teaching of Geography, VinodPustakMandir, Agra
- Ehman& Patrick (1974). Towards Effective Instruction in Social Studies. USA: Houghton Miffn.
- http://en.wikipedia.org/wiki/Wiki

Unit III: Community Resources in Geography (12 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the importance of community resources in teaching of Geography 2. To identify important community resources and to understand the ways to utilize in the teaching of Geography	▪ Community resources- meaning –nature- need and significance- ▪ Relationship between school and community ▪ Geographical- planetarium, geology museums, sea shore etc. ▪ Ways to utilize- bring the community to school or bring the school to community	Lecture cum discussion Prepare a list of community recourses- discuss and present the ways to utilize the community recourses Conduct a field study to any one of the resource centres	▪ Assessment of learning process and reflections ▪ (role of the learner in discussion, collection of information, analysis, presentation and participation in field trip) **Practicals** o **Innovative work/teaching aid**

References
- Arora, M.L.(1979)Teaching of Geography, Prakash Brothers, Ludhiana.
- Gopill, G.H.(1966) Teaching of Geography, Macmillan, London
- Garnett, Olive. (1967) Fundamentals in School Geography, George G., Harrap andcompany, London.
- Varma, O.P., and Vedanayagam, E.G.(1987) Teaching of Geography, Sterling Publishers Private Limited, New Delhi.
- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green andCompany.
- Barnard. H.C.(1963).Principles and Practices of teaching Geography, Bihar Hindi GrandhAcademy,Patna.
- Prasad Jagdish. (1982). Teaching of Geography, VinodPustakMandir, Agra
- Singh. H.W.(1985). Teaching of Geography, VinodPustakMandir, Agra
- http://en.wikipedia.org/wiki/Wiki

Unit IV: Present practices in Geography teaching (8 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To enquire and understand the approaches and strategies that promote social learning, thinking skills and investigative nature of learning 2. To understand the nature , characteristics and needs of CWS	▪ Collaborative – problem solving- discovery – investigatory and metacognitive approaches and strategies ▪ Geography education for children with special needs: Nature, charactristics and activities of Gifted students, Slow learners and Culturally deprived children.	Meaningful verbal presentation with PPT support- Group discussion and presentation on how those strategies can be applied in Geography	▪ Assessment of learning process and reflections **CE-Practicum**

References

- Kincheloe, J. (2008). Critical Pedagogy (2nd Edn.) New York: Peter Lang.
- Kilpatrick, W. H. (1969). The Project Method. New York: Teachers' College Press.
- Gardner, H. (1983). Frames of Mind: The Theory of Multiple Intelligences. New York: Basic Books
- Goleman, D. (1995). Emotional Intelligence. New York: McGraw Hill.
- Freire, Paulo. (1998). Pedagogy of the Oppressed. USA: Continuum Pub. Co.
- Fitchman& Silva (2003). The Reflective Educators' Guide to Classroom Research. California: Corwin Press, Inc.
- http://en.wikipedia.org/wiki/Wiki

Unit V: Research inputs of Geography Education (8 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the need of research in the pedagogical practices in Geography	▪ Need of research in the teaching learning process ▪ Need for developing innovative techniques and strategies in pedagogy and evaluation ▪ Action research in Geography	Lecture cum discussion- Analyse (in groups) the need of research and try to find out certain areas of Geography School curriculum for action	▪ Assessment of learning process and reflections

		research- Prepare a paper (utilizing internet) on the latest research findings on pedagogical aspects and conduct a seminar.	

References

- Kumar, S.P.K &Noushad,P.P.(2009). Social Studies in the Classroom: Trends and
- Methods.
- Dhand, H. (1991). Research in Teaching Social Studies. New delhi: Ashish
- Publishing House
- Crowder, N.A. (1959). Action Research to Improve School Practices. New York: Columbia
- University.
- http://en.wikipedia.org/wiki/Wiki
- www.moodle.org
- http://www.ncert.nic.in
- http://www.ciet.nic.in/

EDU 9.12 THEORETICAL BASE OF COMMERCE EDUCATION – II

Instructional Hours: 84(Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

- To get acquaint with modern principles and trends in the construction and organization of commerce curriculum
- To become systematically correlate instructional practices with life of the community to develop better public relations.
- To become equipped in retrieving suitable teaching learning resources
- To attain proficiency in IT enabled instructional resources for preparing text book, work book, handbook, source book etc in commerce.
- To become talented in applying innovative strategies and approaches for instructional effectiveness.
- To develop capability in managing heterogeneous learning set up.
- To generate a broad perspectives of e-resources in instructional practices and to develop skill in retrieving and transacting commerce curriculum through e-resources
- To develop a positive attitude towards research to develop inquiry skills and scientific investigation
- To understand the wide scope of employability of Commerce learning

Contents

Unit 1	**: Commerce Curriculum**	
Unit 2	**: School and Community Resources**	
Unit 3	**: Instructional Resources**	
Unit 4	**: Innovative Strategies and Approaches**	
Unit 5	**: e- Resources**	
Unit 6	**: Process based Performance Assessment**	

Unit I: Commerce Curriculum (7 Hours + 4 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get acquaint with modern principles and trends in the construction and organization of commerce curriculum	▪ Curriculum – Concept, Pnciples of curriculum construction, Approaches, types of curriculum, Modern trends in curriculum construction.	Analytical approach Debate Seminar	▪ Group investigation summary reports ▪ Prepare a brief sketch of NCF and KCF

| 2. To become conversant with NCF and KCF
3. To get an awareness about critical pedagogy | ▪ Curriculum transaction: meaning and modes
▪ Brief outline about NCF (2005) KCF (2007) and its relevance in vocational education. | Co-operative learning | |

References

- http://www.ncert.nic.in/html/pdf/schoolcurriculum/framework
- http://www.ssamis.com/web/downloads/KCF 2007.pdf
- http://www.case.edu/artsci/engl/emmons/writing/pedagogy
- Rao, Bhaskara (2005) Curriculum for Learning to Live Together. New Delhi: Discovery Publishing House.
- Aggarwal, J.C. (1996) A Practical Approach. New Delhi :Vikas Publishing House Pvt. Ltd.
- Singh and Gopal (2004) Teaching Strategies. New Delhi: APH Publishing Corporation.
- Sue, Cowley (2006) A – Z of Teaching. New York: Brijbasi Art Press Ltd. Raj, Rani Bansal (1999). New trends in teaching of Commerce: Models of teaching and concepts of learning. New Delhi: Anmol Publications.
- SeemaRao (1995). Teaching of Commerce. New Delhi: Anmol Publications.
- Singh, Y.K. (2007). Teaching of Commerce. New Delhi: APH Publishing Corporation.

Unit II: School and Community Resources (8 Hrs + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop a desire to take active involvement in community affairs 2. To become systematically correlate instructional practices with life of the community; thereby develop better public relations.	▪ School and community based teaching – learning resources: school to the community and community to the school. ▪ Co-curricular activities-school bank, commerce club, commerce library, commerce room.	Discussion Project method Visit to community Visit to community to institution	▪ Prepare a list of community recourses- discuss and present the ways to utilize the community recourses ▪ Conduct a field study to any one of the resource centers

References

- **http://cricap.org**
- http://www.ehow.com/
- Aggarwal, J.C. (1996) A Practical Approach. New Delhi :Vikas Publishing House Pvt. Ltd.
- Singh and Gopal (2004) Teaching Strategies. New Delhi: APH Publishing Corporation.

- Raj, Rani Bansal (1999).Models of teaching and concepts of learning. New Delhi: Anmol Publications.
- SeemaRao (1995). Teaching of Commerce. New Delhi: Anmol Publications.
- Singh, Y.K. (2007). Teaching of Commerce. New Delhi: APH Publishing Corporation.

Unit III: Instructional Resources (10 Hrs + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To become equipped in retrieving suitable teaching learning resources 2. To attain proficiency in IT enabled instructional resources for: preparation of text book, work book, handbook, source book etc in commerce.	▪ Instructional Resources: textbook, workbook, handbook, source book, cartoons. ▪ IT enabled instructional resources: videos, YouTube resources, animations, film clippings.	Document Analysis Self Study Group Discussion ICT based instruction Search engines Text book analysis Internet based learning	▪ Text book analysis ▪ Work book preparation ▪ **Material preparation** ▪ Report writing ▪ **Internal test for units 1,2 & 3 (CE-1)** ▪ **CE-** ▪ **Uploading of an innovative teaching manual in the blog**

References

- http://www.phschool.com/eteach/social_studies
- https://www.itschool.gov.in
- www.youtube.com/user/itsvicters
- en.wikipedia.org/wiki/**IT@School_**Project
- **victers**.itschool.gov.in/
- www.youtube.com/user/its**victers**
- Teacher's handbook- Accountancy and business studies of Plus 1 & 2(2006), SCERT, Govt. of Kerala
- Text books- Accountancy and business studies of Plus 1 & 2, SCERT, Govt. of Kerala

Unit IV: Innovative Strategies and Approaches (16 Hrs+ 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get familiar with innovative Strategies and approaches in commerce. 2. To become talented in applying the innovative strategies and approaches for instructional effectiveness. 3. To develop capability in managing heterogeneous learning set up.	▪ Instructional Strategies: Collaborative learning, Co-operative learning , Experiential learning, Self study approach, Contract learning, Problem Based learning, Graphic organizers ▪ Approaches for teaching book keeping and accountancy ▪ Strategies to deal with differently able, slow learners, gifted students in heterogeneous class room.	Meaningful verbal expression Demonstration Group discussion Problem solving approach	▪ Assessment of learning process and reflections ▪ Graphic organizers preparation and analysis ▪ **Practicals** o **Innovative work/teaching aid**

References

- http://education.stateuniversity.com/pages/2099/Instructional
- http://www.questia.com/library/education/curriculum-and-instruction
- http://www.preservearticles.com/2012032829168/7-main-approaches
- Alexey Semenov, UNESCO, (2005): Information and Communication Technologies in Schools: A Handbook for Teachers.
- Roblyer, M.D. (2008).Integrating educational technology into teaching. New Delhi: Pearson.
- Fitchman& Silva (2003).The Reflective Educators' Guide to Classroom Research. California: Corwin Press, Inc. House.
- Atkins N.J and Atkins J.N, Practical Guide to Audio Visual Technique in Education
- Hoole H.S. Ratnajeevan&HooleDushyanthi.(2005). Information and communication technology. New Delhi: Foundation Books PVT. LTD.
- Entwistle,N.J.(1981). Style of learning and teaching. London: John Wiley &Sons
- Fosnot,C.(1996).Constructivism: theory, perspectives and practice. Newyork: Teachers College Press
- Borich, Gary D (2012). Effective teaching methods: Research based practice. New Delhi: Pearson Education
- Tate, Marcia L(2003). Instructional strategies that engage in brain. California: Thousand Oaks
- Dymoke, Sue & Harrison, Jennifer (2008).Reflective teaching and learning. New delhi: SAGE
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- Gagnon, George .W & Michelle, Collay.(2006). *Constructivist learning design*. California: Thousand Oaks.
- Jacqueline, Thousand S., Richard A. Villa & Ann, Nevin I. (2007).*Differentiating instruction: Collaborative planning and teaching for universally designed learning*. SAGE: Thousand Oaks.
- Barrows, H.S. (1986). *Taxonomy ofproblem based learning methods.* Medical Education; Vol. 20, 481-486

Unit V: e- Resources (10 Hrs + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To generate a broad perspectives of e-resources in instructional practices 2. To develop skill in retrieving and transacting commerce curriculum through e-resources	▪ Concept of e- resources, Web resources, social networking, Educational blogs, e-journals, pod casting, e-learning, web based learning. ▪ Learning management system in the teaching learning process of commerce education. ▪ E-commerce and its relevance in the modern world	Online learning Demonstration Narrative expression Web search	▪ Use any e-resources to prepare any 4 learning materials

References

- http://www.bbk.ac.uk/linkinglondon/resources/
- http://en.wikipedia.org/wiki/Learni management_systemhttps://www.itschool.gov.in
- www.youtube.com/user/itsvicters
- en.wikipedia.org/wiki/**IT@School_**Project
- **victers**.itschool.gov.in/
- www.youtube.com/user/its**victers**

Unit VI: Research inputs of Commerce Education (9Hrs + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop a positive attitude towards research 2. To develop inquiry skills and scientific investigation 3. To understand the wide scope of employability of Commerce learning	▪ Action Research ▪ Research in Commerce Education- Need and importance ▪ Qualities of a good researcher ▪ An introduction to educational research and preliminary data analysis	Group Discussion Prepare a paper (utilizing internet) on the latest research findings on pedagogical aspects in Commerce and conduct a seminar.	**Practicals** o **Online assignment** (**Practical evaluation**)

References

- http://www.edu.plymouth.ac.uk/resined/action**research/**arhome.htm
- Obul Reddy, D. (2007). *Revitalizing Commerce Education*.Midnapore: Vidyasagar University Journal of Commerce; Vol. 12.
- Obul, Reddy D. (2000). *Re-designing of commerce education in India in the context of changing business environment*, The Journal of Commerce; Vol. 36(3).
- Best, John.W& Kahn, James.V.(1999). *Research in Education*.Boston: Allyn and Bacon.
- Leary, ZinaO((2010). Doing your research project. New Delhi. SAGE

EDU 9.13: THEORETICAL BASE OF HOME SCIENCE EDUCATION- II

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

To enable the student -teachers to:
- understand the trends in Home Science curriculum
- identify the school and community resources in learning
- familiarise the different assessment and evaluation in classrooms
- get acquainted with classroom management and rules
- develop schedules for process based performance assessment

Contents

Unit I	:	**Curriculum Trends in Home Science (20HRS)**
Unit Ii	:	**School and Community Based Resources in Formal and Informal Learning Context (20 Hrs)**
Unit Iii	:	**Assessment and Evaluation in Classrooms (12 Hours)**
Unit Iv	:	**Class Room Management (8 Hrs)**

Unit I: CURRICULUM TRENDS IN HOME SCIENCE(26 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of the basis aspects of curriculum 2. To identify the principles,types, approaches of curriculum construction. 3. To get acquainted with modern trends in curriculum construction	▪ 1.1 Meaning, Derivation, Definition and Nature of curriculum ▪ 1.2 Principles of curriculum construction ▪ Foundation of curriculum organization ▪ 1.4 Types of curriculum-subject centered,activitycentered,integrated and hidden curriculum ▪ 1.5 Approaches to curriculum organization- Topical, Subject, Concentric, Spiral and Integrated	Meaningful verbal expression Group discussion Narrative expression sessions in small or medium groups Document analysis and peer instruction Project reports	▪ Performance assessment in group discussion ▪ Assessment of Optional Note Book enteries ▪ Questioning and quizes ▪ Tests ▪ Peer evaluation

			Practicals
	▪ 1.6 Factors affecting curriculum organization ▪ 1.7 Criteria of a good science curriculum ▪ 1.8 Modern trends in curriculum construction ▪ 1.9 National Curriculum Frame work (2005) ▪ 1.10 Kerala Curriculum Frame work (2007)		○ **Uploading of a teaching manual in the blog**

Unit II: SCHOOL AND COMMUNITY BASED RESOURCES IN FORMAL AND INFORMAL LEARNING CONTEXT (26 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. to develop an understanding of different school and community resources in learning 2. to identify ,classify and distinguish between human,manmade and community resources in learning Home Science 3. to identify the material supports in learning Home Science 4. to understand the relevance of various club activities in learning Home Science	▪ conceptual analysis /classification of school and community resources. ▪ Human Resources- Resource persons/ eminent teachers and personalities from different fields of Home Science. ▪ Man made Resources-Home Science library, Home Science Laboratory ▪ Community Resources- Food Processing Units, ICDS- Balwadi and Anganwadi, Creche and Preschool, Institutions for special education, Centres for Rehabilitation, Textile Units, and Cottage Industries etc. ▪ Material supports **-** Text book reader, work book, hand book, source book, Reference materials -- encyclopaedia, newsletters, magazines, journals, learning module ▪ Club Activities- Home Science club, Home Science exhibition, manuscript magazine, field trip & excursion, community awareness programmes	Group discussion Brain storming Debate Field trip Project reports Seminar Symposium	▪ Test ▪ Performance assessment in debate,brainstorming,symposiu metc ▪ Assessment of performance in group discussion,seminar ▪ Evaluating the project reports and field visit reports ▪ **CE- Practicum** ▪ **CE-Test**

Unit III: ASSESSMENT AND EVALUATION IN CLASSROOMS (18 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. To prepare and practice the different assessment tools in classrooms
2. To prepare and administrate Achievement and Diagnostic tests
3. To prepare Microteaching Matrix
4. To prepare different test items and scoring system.
	▪ Preparation and practice Formative, Summative, Qualitative and Quantitative Assessment tools.
	▪ Tests- Achievement , Diagnostic tests, Remedial Teaching.
	▪ Microteaching Matrix
	▪ Schedule for assessing
	  o Classroom performance
	  o Practice teaching including ICT
	  o Peer Evaluation
	  o Self Reflection
	  o Student Portfolio
	  o Laboratory Skills
	  o Learning Aids
	▪ Different test items (HOT, LOT Questions)
	▪ Scoring system- manual / electronic
	▪ Development of rubrics
	▪ Administration of oral and open book examination
		▪ Meaningful verbal expression
		▪ Group discussion
		▪ Work shop
		▪ Seminar
			▪ Performance assessment in group discussion,workshop,seminar
			▪ Assessment of Optional Note Book enteries
			▪ Tests
			▪ Peer evaluation

Unit IV: CLASS ROOM MANAGEMENT (14 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get acquainted with classroom rules. 2. To understand the importance of time management in classroom	▪ Class room rules- Concept, need and dimension ▪ Time management in class room- allocated time vs. engaged time	Lecture cum discussion Meaningful learning	▪ Performance assessment in group discussion ▪ Assessment of Optional Note Book enteries

3.	To familiarise with Class room facilities and physical arrangement for different methods	• Class room rules, negative reinforcement and positive reinforcement. Preparation of class room rules and corresponding positive reinforcement and negative reinforcement • Class room facilities and physical arrangement for different methods including ICT facilities	Group discussion Document analysis	• Questioning and quizes • Tests • Peer evaluation

References

- Human Resource Management in Schools and Colleges- Middlewood, David &Lumby, Jocky
- School Organization, Administration and Management- Aggarwal J C
- Measurement and evaluation –Aggarwal.J.C
- A Text Book of Child Development- Jaya &Devadas
- Teaching of Home Science- MujibulHasanSiddique
- Modern Teaching of Home Science-FahmeedaBeegum
- Science Teaching-Dr.K. Sivarajan
- Science Teaching in Schools- Das R C
- Teaching of Home Science- SeemaYadav

EDU 10.1--- TECHNO-PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS- MALAYALAM
Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

- To get familiarized with the e- resources for teaching/learning Malayalam
- To get accustomed with the theory and practice of assessment and evaluation
- To understand the importance of resource materials for teaching and learning like text book, work book, hand book, dictionary etc.
- To understand relation between mass media and education
- To get familiarized with self-instructional strategies

Contents
Unit 1   **: e-Malayalam**
Unit 2   **: Assessment and Evaluation**
Unit 3   **: Resource Materials for Teaching and Learning**
Unit 4   **: Mass Media and Malayalm**
Unit 5   **: Self - Instructional Strategies**

Unit I: e-Malayalam (18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get familiarized with the e-resources for teaching/learning Malayalam 2. To incorporate e-resources in the pedagogic content knowledge analysis of Malayalam	▪ Applications for writing Malayalam - Google translator, Epic browser ▪ Typing software for Malayalam: ISM, iLEAp etc. ▪ Design and development of Malayalam blogs. ▪ Use of 'Wikipedia Malayalam' and other major sites in teaching and learning Malayalam. ▪ Use of Social Networking 'groups', 'pages', 'forums' in enhancing and updating language learning and teaching.	Familiarisation session on applications/software/ sites suitable for Malayalam teaching and learning Design and development of a blog for Malayalam class (group activity)	▪ Participation of students innovative ideas ▪ Comprehensiveness

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
	▪ Use of 'YouTube' in teaching and learning Malayalam. ▪ Incorporation of e-resources in learning Malayalam language and literature	**Practicum**	

Unit II: Assessment and Evaluation(18 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get accustomed with the theory and practice of assessment and evaluation	▪ Importance ▪ Different Types ▪ Continuous and comprehensive Evaluation-CCE ▪ Evaluation criterion for different learning activities ▪ Evidence based performance assessment through 'Portfolios' ▪ Construction and administration of achievement test and diagnostic test ▪ Significance of grading system in schools ▪ Feedback/Reflective Practices/video lesson • Reflective Journal	Open discussion on the significance of grading system in schools Workshop on performance assessment through portfolios Assignment Preparation of reflective journal	▪ Significance of opinions ▪ Participation ▪ Assignment Paper ▪ **CE** o *Preparation and uploading of power point in blog* ▪ **Practical** o **Online Assignment**

Unit III: Resource Materials for Teaching and Learning (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the importance of resource materials for teaching and learning like text book, work book, hand book, dictionary etc.	▪ Text Book: Detailed/ Non - Detailed Text Books ▪ Characteristics of a good text book, ▪ Resource Units and Workbooks ▪ Importance and effective use of Teacher's	Text book review Test paper Organization of a reading corner in	▪ Comprehensiveness ▪ Student Participation ▪ Versatility ▪ Usefulness ▪ **CE-Practicum**

		class room	
2. To get acquainted with importance of Library/language lab activities	Handbook. ▪ Use of resource materials like periodicals, handouts, books etc. ▪ Use of Dictionaries, Thesaurus, Encyclopedias Community Resources ▪ Library – Importance -Different types - School/Class/Subject libraries – ways for effective organization. ▪ Online libraries. ▪ Local text ▪ Importance of Language Lab • Language lab activities.	Preparation of audio lessons Design and development of language lab activities	**Practical** ○ **Creation of a Blog** ○ **Innovative work/ Teaching Aid**

Unit IV: Mass Media and Malayalam (12 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand relation between mass media and education	▪ News Papers and Periodicals ▪ Radio ▪ Cinema ▪ Documentaries ▪ Television ▪ Online Publications	Media analysis Discussion on influence of mass media in education Preparation of radio lessons Preparation of screen plays for making documentaries	▪ Comprehensiveness ▪ Student participation ▪ Usefulness ▪ Appropriateness ▪ **CE-Test**

Unit V: Self - Instructional Strategies(16 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get familiarized with self-instructional strategies	- Personalised Instruction - Programmed Instruction : Linear, Branched - Instructional Modules - Computer Assisted Instruction - CAI, - Computer Managed Instruction-CMI	Discussion on reading materials given. Preparation of modules Workshop for the familiarization of CAI, CMI	- Participation - Completeness - Involvement in the workshop

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- EnganeMalayalattilBlogam, Baburaj PM, DC Books, Kottayam
- Gadyarachana,.CK Chandrasekharan Nair, Kerala Bhasha Institute
- Gadyashilpam, CV VasudevaBhattathiri, Kerala Bhasha Institute
- Kerala Panineeyam, AR RajarajaVarma, DC Books, Kottayam
- KuttikalePadanathilSahayikkam, PK Abdul Hammed Karassery, DC Books, Kottayam
- MalayalaBhashaBodhanam, CV VasudevaBhattathiri, Kerala Bhasha Institute
- MalayalaKavithapadhanamgal, K Sachidanandan, Mathrubhoomi Books
- MalayalaSahithyaCharithram, Dr. KalpattaBlakrishnan, Kerala Bhasha Institute
- MalayalaSahithyaCharithram, PK Parameswaran Nair, Sahithya Academy
- MalayalaSahithyaNiroopanam, Dr. PanmanaRamachandran Nair   , Current Books, Kottayam
- MalayalaSahithyaVimarshanam, Dr. SukumarAzheekkode, DC Books, Kottayam
- MumbilullaJeevitham, J Krishnamoorthi, DC Books, Kottayam
- Nalla Malayalam, CV VasudevaBhattathiri, DC Books, Kottayam
- NammudeBhasha, EMS Namboothiripad, Kerala Bhasha Institute
- ParivarthanonmughaVidhyabhyabyasam Guru NithyachaithanyaYathi, NarayanaGurukulam, Varkala
- PrayogikaVyakaranam, Irinjayam Ravi
- PurogamanaVidyabhyaasachinthakal, PV Purushothaman, Kerala ShaasthrasaahityaParishad

- Thettillatta Malayalam, Prof. PanmanaRamachandran Nair, DC Books, Kottayam
- TirakkadhaRachana – KalayumSidhanthvum, Jose K Manuel, Current Books, Kottayam
- Toto Chan, TetsukoKoriyoNagi, National Book Trust, Kerala ShaasthrasaahityaParishad
- Tuition to Intuition, Dr. KN Anandan, Transcend, Malappuram
- Ucharanamnannavan, Dr.VRPrabodhachandran, Kerala Bhasha Institute
- VidhyabhyasathilViplavam, Osho, Silence, Kozhikkode
- Vidyabhyaasachinthakal, AsisTharuvana, Olive, Kozhikkode
- VidyabhyasaParivarthanattinoruAmugham, Kerala ShaasthrasaahityaParishad
- VyakaranaMitham, SheshsgiriPrabhu
- MalayalaBhashadyapanam, Dr.KSivarajan, Calicut University
- Micro teaching, Allen,D& Ryan, K, Adison Wesley, London
- Mathrubhashabhodhanam:
- PravanathakalumReethikalum, Bindhu,C.M, Scorpio, Calicut

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- http://ml.wikipedia.org
- https://www.facebook.com/groups/144983732246185
- https://www.facebook.com/groups/paribhasha
- http://www.keralasahityaakademi.org/
- http://malayalambloghelp.blogspot.com/
- http://www.topsite.com/best/malayalam
- http://malayalam.kerala.gov.in/index.php

EDU 10.2 Techno-Pedagogic Content Knowledge Analysis- English

Objectives

- To familiarize with the concept of teacher as a Techno-pedagogue.
- Identifies ways of professionalizing Language Education in a Techno-pedagogic scenario.
  Explores possibilities of ICT-enabled teaching in English class rooms.
- Develops an awareness of assessing using ICT tools.
- Analyzes and identifies ICT-enabled instructional strategies.

Contents

Unit 1	**: Teacher as a techno-pedagogue**
Unit 2	**: Professionalizing Language Education in a Techno-pedagogic scenario**
Unit 3	**: ICT-enabled teaching of Prose, Poetry, Grammar and Vocabulary**
Unit 4	**: ICT integrated assessment practices**
Unit 5	**: Self-instructional strategies**

Unit I: Teacher as a techno-pedagogue (12 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with the concept of teacher as Techno-pedagogue 2. Identifies the inter-relationship between Content Knowledge, Pedagogic Knowledge and Technological Knowledge	▪ Techno-pedagogy ▪ Content Knowledge ▪ Pedagogic Knowledge ▪ Technology Knowledge ▪ Content-based Web resources o *-Need* o *-Ways of using*	Intro talk Demo of ways of using Web resources	▪ Completion of tasks using web resources

Unit II: Professionalizing Language Education in a Techno-pedagogic scenario (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with ways of professionalizing Language Education in a technological scenario	▪ Networking -Teacher >Teacher -Teacher>Institution ▪ Forum-Wiki ▪ Blog-Video Conferencing ▪ Professional communities -Overseas opportunity Educational Blogs English Teacher Blogs Teacher TubeESL Café LinkedIn ▪ Study Skills enhancing using Web resources -Note making-Reference skills -Information literacy ▪ Content writer-Copy Writing ▪ Call Centre jobs-Transcription ▪ Outsourcing ▪ *Learning Management System -Scope- ▪ Storage ▪ Collaboration ▪ * Communication*Evaluation	Introductory talk Demon in Smart Classroom Pair-share Collaborative tasks	▪ Group presentation ▪ Monitoring of activities in virtual world ▪ Checking popularity on Web ▪ Visiting teaching manuals in the web ▪ searching and analyzing classroom.com ▪ *CE- Blog uploading Power point (lesson segment)* *Practical* ○ *Online assignment*

Unit III: ICT-enabled teaching of Prose, Poetry, Grammar and Vocabulary (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops the ability to use ICT-based resources for developing linguistic competence 2. Familiarizes with ways of integrating ICT resources in the teaching of Prose, Poetry, Vocabulary and Grammar	▪ ICT-enabled tasks for ▪ Prose o *Film adaptations of literary texts* o *Online Vocabulary games* o *Online Grammar games* o *Audio podcasts* o *Speeches* o *Pronunciation and Conversation practice Online* o *Poems* o *Critique of poems on websites* o *Exploring text types Online* o *Descriptive* o *Narrative* o *Expository* o *Argumentative*	Demonstration Viewing video lessons Adapts film clips for teaching Tasks Grammar games Language games Demo of use of Online resources	▪ Ability to transact the content ▪ On the spot recitation of poem ▪ Monitored through class room performance ▪ Assessment of final product *CE Practicum* *Practical* o *Creation of Blog* o *Improvised teaching aid/Innovation*

Unit IV: ICT integrated assessment practices (12 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops an awareness regarding ways of assessing using ICT resources 2. Familiarizes with ways of editing Online 3. Develops an understanding of the nature of Placement/ Competency Tests in English	▪ Assessment Rubrics ▪ e-Portfolio ▪ Google Docs ▪ Online editing in Wikis ▪ Digital Magazine editing ▪ Competitive and placement tests IELTS,TOEFL,TKT, TET,NET,SET	Use of Specimen Test Attempts self tests Group work for preparation of Digital Magazine Practice in assessment using ICT resources	▪ Prepares samples ▪ Performance in tests *CE Test*

Unit V: Self-instructional strategies(15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment

1. Develops an understanding of the nature and scope of Self instructional materials	▪ Programmed Instruction
	  o *Linear*
	  o *Branching*
	
	▪ Instructional modules
	  o *Computer Assisted Instruction(CAI)*
	  o *Computer Based Instruction (CBI)*
	  o *Computer Assisted Language Learning (CALL)*
		Demo and hands-on experience
		
		Supply of specimen tasks
		
		Identifies specific roles for teacher and learner
		
		Guided Practice
			▪ Submission of assessment reports
			▪ Preparation of sample materials
			▪ Checks Ability to use

Suggested References
▪ EDU 10.2 Techno-Pedagogic Content Knowledge Analysis- English

List of Books:
▪ The Internet Guide for English Language Teachers Dave Sperling, 1997, Prentice-Hall Regents. (1998 edition also available).
▪ Dave Sperling's Internet Activity Workbook Prentice Hall, Regents ISBN 0-13-010325-X, 1999.

- New Ways of Using Computers in Language Teaching Tim Boswood, Editor, TESOL, 1997.
- CALL Environments: Research, Practice, and Critical IssuesJoy Egbert and Elizabeth Hanson-Smith, Editors, TESOL, 1999.
- Internet for English Teaching Mark Warschauer, Heidi Shetzer, and Christine Meloni, TESOL, 2000.
- Content-based second language instruction Brinton, D.M., Snow, M.A., and Wesche, M.B. (1989). New York: Newbury.

Journals

- *Information & Communication Technologies in ELT* Abdul Mahmoud Idrees Ibrahim, **Journal of Language Teaching and Research**, Vol. 1, No. 3, pp. 211-214, May 2010 © 2010 Academy Publisher ISSN 1798-4769

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- **Content Based Instruction in EFL Contexts** Stephen Davies,
- The Internet TESL Journal, Vol. IX, No. 2, February 2003
- http://iteslj.org/Articles/Davies-CBI.html

E-activities with a Wiki: Innovative Teaching of English as a Foreign Language

http://eunis.dk/papers/p87.pdf
Collaborating with Wikis

- http://tewt.org/index.php/discussion-collaboration/wikis
- **Educational Blogging**
- http://tewt.org/index.php/discussion-collaboration/blogs
- **Using Videoconferencing to Facilitate Various Perspectives on the Teaching and Learning Process** Farren, M. (2002)
- http://www.computing.dcu.ie/~mfarren/perspectives.htm

Quick guide to LMS

- http://edudemic.com/2012/10/a-quick-guide-to-learning-management-systems/

Criticism Prose and verse

- https://tspace.library.utoronto.ca/html/1807/4350/indexcriticism.html

Specimen Linear Programme for teaching Grammar http://programmedinstruction.tiddlyspot.com/#Nouns-17
Online reading material

- http://www.gutenberg.org/wiki/Main_Page
- http://onlinebooks.library.upenn.edu/archives.html

Select Podcasting Sites

- English as a Second Language Podcast: http://www.eslpod.com</p>
- EFLBridges: http://www.eflbridges.com/
- ITESLJ Links: http://iteslj.org/links/ESL/Listening/Podcasts/

Rubrics for Web Lessons
http://webquest.sdsu.edu/rubrics/weblessons.htm

Collaborating with Google Docs

- http://tewt.org/index.php/discussion-collaboration/google-docs

Useful sites for teachers

- www.esl-galaxy.com
- www.tesltools.com/

EDU.10. 3   TECHNO PEDAGOGY CONTENT KNOWLEDGE ANALYSIS - HINDI

Objectives

The student teachers:
- Understand the concept of techno-pedagogy content knowledge analysis
- Develop the ability to acquaint with the various modes of networking for effective language instruction
- Develop the ability to be a reflective practitioner
- Become competent in the subject matter, teaching methodological and techno-pedagogic practices
- Accommodate with the advancement in the field of education through implementing innovative techniques

Content

Unit I	:	**Teacher as a Techno-pedagogue (11 hrs)**
Unit II	:	**Designing of Curriculum Transaction Material (16 hrs)**
Unit III	:	**Networking for Personal and Professional growth (20 hrs)**
Unit IV	:	**Teacher as a Hindi Reflective Practitioner (12 hrs)**
Unit V	:	**Assessment in Classrooms and Competency Enhancement Avenues (12 hrs)**
Unit VI	:	**Technology integrated Individualized Instruction (13 hrs)**

Unit I: Teacher as a Techno-Pedagogue   (11 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Understand the concept of techno-pedagogy 2. Develop the ability to analyze the text books in terms of TPCKA	▪ Teacher as a Techno-pedagogue in Hindi : Techno-Pedagogic Content Knowledge Analysis – Inter-relationship of Technological knowledge,Content Knowledge, Pedagogic Knowledge ▪ Scope and Challenges of TPCKA in Knowledge generalisation and transaction of Hindi ▪ TPCK based content analysis of text books in Hindi of StdVIII, IX and Std X and that of any one CD resource in Hindi	Group Discussion Online referencing TPCK based content analysis through peer discussion and teacher intervention	▪ Document Analysis

Unit II: Designing of Curriculum Transaction Material   (16 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop awareness about the modes of Curriculum designing in Hindi	▪ Preparation of curriculum transaction material designing for Hindi language instruction: Designing of Student Teacher generated Digital texts,Adapting free downloadable digital resource in Hindi, Familiarising with the use of basic tools and software in Hindi -Google transliteration (for Hindi typing), Hindi online dictionaries – www.shabdkosh.com, Collection of Hindi sites - http://dir.hinkhoj.com , Searching Wikis for collecting materials for classroom instruction	Collection of offline and online materials	▪ Authenticating the trustworthiness of the networking resources – by peers and mentor ▪ **CE-1** ▪ **(PRACTICUM-1)**

Unit III: Networking for Personal and Professional growth   (20 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop the ability to acquaint with the various modes of networking for effective language instruction 2. Equip to generate avenues for networking as a means to enhance language learning	▪ Networking as a means of personal and professional growth: E –twinning/ Collaboration with any Hindi language institution's online portal for Institutional and professional growth, Forming Online learning forums, creation of personal email id and Blogs with posts, creating social online groups for promoting teaching-learning of Hindi, Hindi language translation-Translation Buddy.com/Hindi	Using Networking resources – online and offline Utilising e-learning resources	▪ **CE-2** ▪ Evaluation of PPT uploaded in Blog **CE - Postings in Blogs** **Power point slides**

	Exploring the possibility of using Learning management system for storing, collaborating, communicating and evaluating various aspects of Hindi language instruction, Familiarising with e-learning resources		

References

- http://ask.metafilter.com/149992/What-are-the-best-resources-for-learning-Hindi
- http://www.transparent.com/learn-hindi/
- http://learnelearning.com

Unit IV: Teacher as a Hindi Reflective Practitioner   (12 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop the ability to be a reflective practitioner	▪ Teacher as a reflective practitioner- modes and means of reflective practices in Hindi- 'localized designing and developing tools of reflection in Hindi – online reflection using blogs, online forums and Hindi communities, Communication sites, preparation of online notes	Co-operative learning Collaborative learning Scaffolding	▪ Performance assessment and feedback

References

- www.thinkvidya.com

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Unit V: Assessment in Classrooms and Competency Enhancement Avenues   (12 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Equip to generate avenues to enhance the subject matter, teaching methodological and techno-pedagogic competencies 2. Attain skills to perform the best	▪ Assessment as a feedback to students, parents and teachers-Provision for open discussion, showing Progress Records based on performance, Online tests, Designing performance test to assess the process outcomes, Downloading free online assessment tools and conducting online language skill tests/performance test in Hindi ▪ Competency enhancement avenues: Preparation for competitive exams in Hindi like NET,SET, KTET , various entrance tests in Hindi for Ph.D,Dipoma/Degree courses etc , Preparation for regional/national/international competitive exams in Hindi	Virtual tour to digital learning platforms Downloading / pooling competency enhancement packages/ resources	▪ Performance assessment and feedback

References

- http://www.uni.edu/becker/hindi.html

Unit V: Technology integrated Individualized Instruction (13 Hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Cope up with the advancement in the field of education through implementing innovative techniques	▪ Technology integrated Problem Solving Learning, Computer Assisted Learning Packages, Preparation of Instructional Modules, ▪ Creating technology enhanced learning environment- Digital animation, Digitalportfolio, onlinecollaboration, use of	Using creative ideas for technology assisted learning	▪ **CE-3** ▪ Internal Test -1 ▪ (UNIT 1,11,111,1V,V & V1) ▪ Evaluation of Online Assignments

	Multi media,Web-portal,e-learning,Information Literacy,Using PowerPoint for preparing presentations, Storyboarding of presentations, creating Hyperlinks from a presentation, ▪ Using the Internet as a research and Communication tool, Using Search Engines, chat rooms, blogs to encourage peer interaction / expert consultation / collaborative projects, ▪ -Awareness of student safety on the Internet, Copyright Issues regarding computer technology and Internet, International Copyright laws regarding computer technology and Internet. ▪ - Familiarising with e-resources for learning ▪ Hindi,viz., University Affiliated ▪ resources,Collections of links to Hindi ▪ resources, Newspapers and Periodicals,etc.	Infusion of Instructional technology in learning Hindi **Practicals** o *Online Assignments*	

References

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- AcharyaNanduDulareBajPeyi,HindiSahityaKaSamshipthaIthihas
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- Dr.G.C.Bhattacharya,AdhyapakShiksha,VinodPustakMandir,Agra
- Dr.BholanathTiwari,HindiBhashaShikshan
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- BhaiYogendrajith, Hindi BhashaShikshan, AgrawalPublications,Agra
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- Lalji Ram Shukl,ShikshaManovigyan
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- Dr.S.N.Mukherji,RashtraBhasha Ki Shiksha
- Dr.Nareshsharma,Shikshan Ki Avasthayem.VigyanBharathi,Gaziabad
- Dr.RamshaklPandey, Hindi BhashaShikshan
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- P.D.Patak,ShikshaManovigyan, AgrawalPublications,Agra
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- RaveendranathSreevastav,BhashaShikshan,VaniPrakashan,New Delhi
- K.M.Siva Ram Sharma,HindiShikshan Kala
- Sadde,RashtraBhashaKaAdhyapan
- B.L.Vats, Hindi Shikshan, AgrawalPublications,Agra
- YogendraNath,BhashaKaisePadayem
- DevanagariLipiTadha Hindi Varthani,Kendriya Hindi Nideshalay,Hindi
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- Text Books in Hindi,Kerala State Syllabus,SCERT
- National Curriculum Framework,NCERT (2005),NewDelhi
- Kerala Curriculum Framework,SCERT,Thiruvananthapuram
- Report of Education Commission (Kothari Commission).Govt.of India
- Report of the Official Language Commission

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- www.thinkvidya.com
- http://www.uni.edu/becker/hindi.html
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- www.google.com

EDU 10.4 - Techno-Pedagogic Content Knowledge Analysis- Sanskrit

Objectives
- To familiarize with the concept of teacher as a Techno-pedagogue.
- Identifies ways of professionalizing Language Education in a Techno-pedagogic scenario
- To familiarize experience with curriculam design-
- To familiarize networking -activities and related resources
- To provide teacher as a reflective –practitioner
- To develop assessment techniques in classrooms and competency enhancement avenues.

Contents

Unit- I	**: Teacher as a Techno – Pedagogue.**
Unit –II	**: Experience with Curriculum Design**
Unit- III	**: Networking as a Means of Personal and Professional Growth**
Unit- IV	**: Teacher as A Reflective Practitioner.**
Unit- V	**: Assessment in Classrooms and Competency Enhancement Avenue**

Unit I: TEACHER AS A TECHNO – PEDAGOGUE (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop teacher as a techno-pedagogue	▪ Concept- meaning- scope- Role of teaches as a techno- Pedagogue- concept of TPCK- Inter relationship of CK, PK, TK	Group discussion using the possibilities, of Blog- Preparation of PowerPoint- preparation of Video clips- Online assignment.	▪ -Role performance -analysis in group discussion ▪ Practicum **(CE)** ▪ Evaluation of daily reflective journals. ▪ Participant observation.

Unit II: EXPERIENCE WITH CURRICULUM DESIGN (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. -To familiarize experience with curriculum design-	▪ Designing of student- Teacher generated digital tenets- Adapting free downloadable digital resources in Sanskrit based on the principles of curriculum construction	Meaningful verbal expression. Group discussion virtual tour to digital learning platforms. Web based instruction	▪ -Role performance analysis in group discussion- ▪ -optional level focuss group discussion- **Practicals** o *Online assignment.* o *Innovative work/teaching aid*

Unit III: NETWORKING AS A MEANS OF PERSONAL AND PROFESSIONAL GROWTH (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. -To familiarize networking - activities and related resources	▪ Networking- ▪ e- twinning- ▪ Creation of Id Blog, ▪ Web- based instruction- ▪ Learning –-management system.	Meaningful verbal expression. Group discussion Digital Learning- Using Video clips. -Using blog-	▪ Role performance ▪ Participant observation – ▪ creativity- Id formation- Blog formation- using online assignment

Unit IV: TEACHER AS A REFLECTIVE PRACTITIONER. (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To help the teacher to take up the roll of a reflective practitioner	▪ Teacher as a reflective practitioner- ▪ Modes and means of reflective practices- Localized designing and development of	Meaningful verbal group discussion. Virtual tour-	▪ -Role performance ▪ -Analysis in group discussion- ▪ -participant observation-

	tools of reflection for the Sanskrit student-Teacher- Posting of reflection in Blog, Forums.	Presentation- Discussing posting of posting of reflection in Blogs-	▪ **CE** ▪ **Test (CE)** ○ *Uploading Power point slides in the blog*

Unit V: ASSESSMENT IN CLASSROOMS AND COMPETENCY ENHANCEMENT AVENUE (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop assessment tools in classrooms and competency enhancement avenues.	▪ Assessment in class rooms- -Assessment as a feedback to student, Teacher and Parents. Performance test designing in Sanskrit subject for assessment of process outcomes. Downloading of free online assessment tools like on line quiz maker, competitive / placement exams. KTET, NET, SET etc.	Meaningful verbal expression- Group discussion- Presentation- Document analysis-	▪ Participant observation- ▪ Optional level focussed group discussion-

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- Kerala Curriculam Framework, SCERT Trivandrum
- Practical Sanskrit Grammer, PRD Sarma
- Tarkasamgrah, Annambhatta
- First book of Sanskrit and Second Book of Sanskrit, Bhandarkar
- A Sanskrit Grammer for Students, A macdoval
- Kuvalayanandam, Appayadikshita
- Vrtarathnakaram, Kedarabhatta
- SidhantaKaumudi, BhattogiDhikshidar
- LaghusidhantaKaumudi, VaradarajaPanditan
- Siddharupa,
- Rasa and Dhvani, Dr. A. Sankaran
- KavyaPradasa, Mammatan
- History of Sanskrit Literature , Keith
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- The teaching of Sanskrit, Prof. G. Sahadevan
- Lakhusamskritam, Dr. K.G. Poulose

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1. A Work book for Sanskrit Learners :   DPI 2012 General Education
2. Abhyasamanjari   CD by DPA
3. Vakyamritham   14 DVD by DPI
4. Prayogaparichayam   2 CD –DPI

EDU 10.5 Techno Pedagogic Content Knowledge Analysis – Arabic

Objectives:
The student Teacher
- Familiarizes with the concept of teacher as Techno-pedagogue
- Identifies the inter-relationship between Content Knowledge, Pedagogic Knowledge and Technological Knowledge
- Familiarizes with ways of professionalizing Language Education in a technological scenario
- Develops the ability to use ICT-based resources for enhancing teacher effectiveness
- Familiarizes with the ways of integrating ICT resources in teaching and evaluation

Contents

UNIT I	**: TECHNO PEDAGOGY**	
UNIT II	**: DIGITAL CURRICULUM MATERIAL DESIGN**	
UNIT III	**: PROFESSIONALISING ARABIC LANGUAGE EDUCATION IN A TECHNOPEDAGOGIC SCENARIO**	
UNIT IV	**: INTEGRATING ICT RESOURCES FOR TESTING ARABIC LANGUAGE LEARNING:**	
UNIT V	**: ASSESSMENT USING ICT RESOUCES**	

Unit I: TECHNO PEDAGOGY(12 T + 5 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with the concept of teacher as a techno pedagogue	- Techno Pedagogic Content Knowledge Analysis (TPCKA) - Content knowledge, pedagogicl knowledge, technological knowledge and their inter relationships. - Scope and challenges of TPCK in Arabic language teaching - TPCK based content analysis of selected units of text books of secondary schools. - Knowledge Generation - use of Web based Resources	Introductory talk Meaningful verbal learning Group Discussion Demonstrations in Smart Classroom Collaborative tasks	- TE - Daily Reports *CE* *(assignment)* *Practicals* *Online assignment*

Unit II: DIGITAL CURRICULUM MATERIAL DESIGN (12 T + 5 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Gets an awareness of the digital curriculum materials	• Designing of Digital text books • Use of Digital Text books • Adopting down loaded resources for teaching Arabic	Demonstration Brain storming Tasks in groups Viewing video lessons	• TE • Individual assessment of Products • *CE-Practicum* • *(Project Work)*

Unit III: PROFESSIONALISING ARABIC LANGUAGE EDUCATION IN A TECHNOPEDAGOGIC SCENARIO(12 T + 5 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Familiarizes with ways of professionalizing Arabic Language Education in a technological scenario	• Networking • E-Twining for : • Professional growth, Institutional Growth • Forming Forums of Online Learning • Study skills enhancing the use of web resources use emails, Blogs, teacher tub for promoting teaching and Learning Arabic • Learning Management System • Scope of LMS: collaboration, communication& Evaluation	Attempts for creative and aesthetic works Group Discussion Virtual Tours	• TE • Role Performance Assessment • **CE-**Uploading Power point in the *blog*

Unit IV: INTEGRATING ICT RESOURCES FOR TESTING ARABIC LANGUAGE LEARNING:912T + 5 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops the ability to use ICT-based resources for developing linguistic competence	• ICT enabled language teaching and testing • Online Language games • Online Vocabulary games	Discrimination Reflective thinking Collaborative	• TE • **CE** • (ICT - Presentation of

		Interaction	downloading materials)
2. Familiarizes with ways of integrating ICT resources in the teaching and testing of Arabic language learning	▪ Online grammar games ▪ Audi podcasting : ▪ practice in listening speeches, conversations, poems, critiques ▪ Films ▪ Downloading Assessment Tools for exams & competitive Exams & its application	Interaction Explores possibilities e-learning	

Unit V: ASSESSMENT USING ICT RESOUCES (12 T + 4 P)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develops and awareness regarding ways of assessing using ICT resources 2. Develops an understanding of the nature of tests in Competitive examinations in Arabic	▪ Ways of assessment using ICT resources ▪ Different Tests ▪ Development of Online tests ▪ Downloading assessment tools for competitive examinations ▪ Preparation of and use of assessment tools and tests.	Meaningful verbal learning Task directed and inquiry centered discussion Presentation of samples	▪ TE ▪ *CE* ▪ (Submission of Assignment \ ▪ project Work)

References

- Al muallim al Najih" : Dr. Abdullah al Amiri, darusamalinnashriwathaouzee'a
- "ThatweeruAdae'lMuallim: Kifayathutha'aleemwatha'heel al muthawasilwalishraf, hashimUwadha, Dar al ilmlilmalayeen, labnan
- "Tha'leem al lugha al arabiyyabaina al nadriyyawathatbeeq" Dr. HasanShahata, al darmisriyya al lubnaniyya
- Al muallim al Najih" : Dr. Abdullah al Amiri, darusamalinnashriwathaouzee'a
- Mushkilatthaa'leem al lugha al Arabiyya; Abbas mahmood, dar al ssaqfa, Qatar.
- "TharaiqThadreeswastatheejiyyathuhu" Dr. MuhammedMahmood al haila , Dar al kitab al jamie'I, Al Ain , UAE
- Mushkilatthaa'leem al lugha al Arabiyya; Abbas mahmood, dar al ssaqfa, Qatar.
- Al muallim al Najih" : Dr. Abdullah al Amiri, darusamalinnashriwathaouzee'a
- "ThatweeruAdae'lMuallim: Kifayathutha'aleemwatha'heel al muthawasilwalishraf, hashimUwadha, Dar al ilmlilmalayeen, labnan
- Al muallim al Najih" : Dr. Abdullah al Amiri, darusamalinnashriwathaouzee'a

EDU 10.6 - Techno-Pedagogic Content Knowledge Analysis- Tamil

OBJECTIVES:-
- To familiarize with the concept of teacher as a Techno-pedagogue.
- Identifies ways of professionalizing Language Education in a Techno-pedagogic scenario
- To familiarize experience with curriculam design-
- To familiarize networking -activities and related resources
- To provide teacher as a reflective –practitioner
- To develop assessment in classrooms and competency enhancement avenues.

Contents

Unit 1	:	**Teacher as a techno pedagogy**
Unit 2	:	**Experience with curriculam material design**
Unit 3	:	**Network is advance process for Tamil teaching and learning**
Unit 4	:	**ICT in Tamil learning**
Unit 5	:	**Competency enhancement avenues**

Unit I: Teacher as a techno pedagogy (14 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Knowledge about Techno pedagogy 2. To provide an initial collection about language teacher as a technology teacher 3. To know the applications of multimedia in tamil teaching 4. To familiarise the role of language teacher to introduce the computer world	▪ Teacher as a techno pedagogy : Importance of techno pedagogy content knowledge in language teacher ▪ Language act as a Technology teacher ▪ Inter relationship of content knowledge ,pedagogy knowledge and technology knowledgeable ▪ Application of multimedia in tamil teaching-To know about role of language teacher to introduceth e computer world	Meaningful verbal expression Demonstration Brain storming Online learning Group discussion Demonstration	▪ Role Performance ▪ Participant observation ▪ Daily report ▪ Group evaluation ▪ Online assignment

Unit II: Experience with curriculum material design (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the importance of computer in language education 2. To know the importance of computer applications in language teaching- Learning process 3. Gather knowledge about Digital text	▪ Computer in education –computer in educational activities – computer and Tamil language ▪ Collect the Tamil learning data from various medias ▪ Importance of Digital text- Design the attractive digital text ▪ Digital resources in Tamil learning-gathering the data from websites	Meaningful verbal Expression Demonstration Online learning Brain storming Group discussion	▪ Role Performance ▪ Individual assessment ▪ **CE- Practicum** ▪ Observation ▪ Product presentation ▪ Report verification ▪ Continuing evaluations

Unit III: Network is advance process for Tamil teaching and learning (15 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To know the importance of network 2. To understand the functions of internet-based 3. To develop the computer assisted language learning process	▪ Meaning and definition of internet- functions of internet-types of internet services ▪ Connecting internet –Modem-Tamil internet conferences –World's Tamil people in internet ▪ Search Engine-Computer assisted instruction –computer assisted language learning ▪ Collect the data related to the content – Writing CD-Effectively use in classroom	Collaborative learning Demonstration Group work Scaffolding strategies Online learning Document analysis	▪ Participant observation ▪ Role performance ▪ **Practicals** o *Innovative work/teaching aid* ▪ Experience sharing ▪ **CE** o *Uploading power point in blog* ▪ Continuing evaluation ▪ Cumulative evaluation

Unit IV: ICT in Tamil learning (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To know the software applications	▪ Software-meaning of software –software	Group presentation	▪ CE- Test

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
2. Know about Tamil fonts 3. Develop knowledge about email, e-sources and Tamil virtual university	application in Tamil –software for kids – software for students-software for Tamil language learners ■ Tamil fonts –method of Tamil typing-Tamil type writing keyboard-Tamil 99 method-syntax type writer- ■ Email software- create email ID and blogs-to develop the responding ability through email ■ Tamil virtual university-Curriculum of Tamil virtual university-tamil traditional, cultural news and manuscript museum in virtual university	Brain storming Online learning Problem solving Performance	■ Participant observation ■ Continuing evaluation **Practicals** o *Innovative work/teaching aid*

Unit V: Competency enhancement avenues (20 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To know the contributions of IT for the competency enhancement avenues 2. To familiraise the language laboratory 3. To know the contributions of language laboratory for the development of basic skills 4. To know their contribution of computer in Tamil language teaching	■ Importance of IT in the field of language education ■ Language laboratory –Importance of language laboratory-structure of language laboratory (console, master tapes, Twin track tapes, Tape recorders , Headsets, Micro phones) ■ Role of language laboratory in Tamil learning –special features of language laboratory ■ For the better study of poetry ,Prose and Grammar with the help of computer ■ Preparation of teaching aid and digital dictionary with the help of computer	Meaningful verbal expressions Brain storming Intellectual discourses Virtual learning Power point presentation Group discussion	■ Role performance ■ Reflective method. ■ Presentation of skills ■ Assessment of CAI…materials ■ Product of e – learning materials ■ Daily report ■ Continuing evaluation. ■ **CE- Test/model exam**

EDU 10.7 : Techno-Pedagogic Content Knowledge Analysis - Mathematics

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives :

By the end of the course, the learner should:
1. Understand the role of the teacher as a techno- pedagogue
2. Develop the ability to generate and transact TPCK based content analysis of Secondary school text books and CD resources
3. Develop the ability to design digital textbooks
4. Understand the importance of net working as a means of personal and professional growth of teachers
5. Develop skills in online learning
6. Understand the modes of reflective practices and preparation of tools for evaluation of the same
7. Develop the ability to interact with stakeholder with blogs, forums etc.
8. Acquaint with modern evaluation techniques in secondary classes
9. Familiarise with different competitive examinations like TET,SET, etc.

Contents

Unit I	:	**TEACHER AS A TECHNO-PEDAGOGUE (18 hrs)**
Unit II	:	**EXPERIENCE WITH CURRICULUM DESIGN (16 hrs)**
Unit III	:	**NETWORKING AS A MEANS OF PERSONAL AND PEOFESSIONAL GROWTH (15 hrs)**
Unit IV	:	**TEACHER AS A REFLECTIVE PRACTITIONER (19 hrs)**
Unit V	:	**ASSESSMENT IN CLASSROOMS (16 hrs.)**

Unit I: TEACHER AS A TECHNO-PEDAGOGUE (18 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with the concept, meaning and scope of techno-pedagogic Content knowledge 2. To understand the role of the teacher as a techno- pedagogue	▪ Concept, meaning and scope of Techno-pedagogue- ▪ Role of teacher as a techno-pedagogue ▪ Concept of TPCK ▪ Interrelationship of Content knowledge, pedagogic knowledge and technological	Group discussions Seminars Meaningful verbal presentation Power point	▪ Summative evaluation ▪ Performance analysis in group discussions ▪ Observation ▪ Participation in the Seminar sessions

| 3. | To enable the student teacher to generate and transact TPCK based content analysis of Secondary school text books and CD resources | • knowledge
• Scope and challenges of TPCK
• Generation and transaction of TPCK based content analysis of secondary school text books and CD resources | presentations
Illustrations
Online assignment
Using the possibilities of blogs in networking
Video clippings | • Examples cited in their lecture note
• dramatisation |

Unit II: EXPERIENCE WITH CURRICULUM DESIGN (16 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop the ability to design digital textbooks	• Concept of student teacher generated digital text books • Designing of student teacher generated digital text books by adapting free downloadable digital resources in mathematics based on the principles of curriculum construction	Demonstrations Illustrations Video clippings Web based illustrations Power point presentations	• Participant observation • **Practicum/Document analysis (CE)** • Student reports

Unit III: NETWORKING AS A MEANS OF PERSONAL AND PEOFESSIONAL GROWTH (15 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarise the student teachers with net working as a means of personal and professional growth of teachers 2. To understand the modes of interaction with teachers and	• Concept of E-twinning for institutional/professional growth • Concept of Online learning- creation of personal e-mail ID and BLOGS with a minimum of 5 posts for promoting the teaching and learning of Mathematics	Demonstrations Illustrations Video clippings debating	• Document analysis • Student reports (Practicals) o **On line assignment**

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
students through internet and other means for the professional development 3. To provide hands on experience in on line learning		Web based illustrations Power point presentations	○ **Creation of blog**

Unit IV: TEACHER AS A REFLECTIVE PRACTITIONER (19 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the modes of reflective practices 2. To prepare tools for evaluation of reflective practices 3. To make the students familiar with postings in blogs, forums etc.	▪ Concept of reflective practices ▪ Designing and development of tools for evaluating reflective practices in Mathematics ▪ Posting of reflections in Blogs, Forums etc.	Group Discussions Assigned readings of e-text Workshop for developing tools	▪ Document analysis ▪ Student reports ▪ Online Evaluation of postings in blogs-**CE** ▪ **CE-**Preparation of power point based on a single concept-min. 5 slides **& uploading in the blog**

Unit V: ASSESSMENT IN CLASSROOMS (16 hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To make the learners aware of the importance of providing feedback 2. To acquaint with the competitive tests in Mathematics at various levels	▪ Concept of Continuous and Comprehensive evaluation secondary classes ▪ Assessment as a feedback to student, ,teacher and parents. ▪ Downloading of free assessment tools – Maths Olympiad, TET, SET, NET etc.	Discussions Assigned readings on e-text	▪ Document analysis ▪ Student reports ▪ **Test (CE)**

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EDU 10.8 TECHNO-PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS - PHYSICAL SCIENCE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

- To design instructional and learner support mechanism-print, non-print, electronic and digital-appropriate for the learner needs and contextual requirements
- To undertake a self empowerment initiative in transacting the Physical Science curriculum from a Techno-Pedagogical Content Knowledge perspective
- To develop a neo-humanistic attitude among the student-teachers in the light of Science-Technology-Society-Environmental interaction paradigm.

Contents

Unit I	**: Techno-Pedagogic Content Knowledge and Self-Instructional Strategies**
Unit II	**: Material Design for Curriculum Transaction**
Unit III	**: Net working in Physical Science Learning**
Unit IV	**: Teacher as a reflective Practitioner**
Unit V	**: Practice with Assessment in Classrooms**

Unit I: Techno-Pedagogic Content Knowledge and Self-Instructional Strategies (10+4=14 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To conceptualize the basic principles of Pedagogic Content Knowledge Analysis in Physical Science Teaching and Learning 2. To understand different self instructional strategies	• Techno-Pedagogic Content Knowledge Paradigm- Interrelationship of Content Knowledge, Pedagogic Knowledge and Technological Knowledge, Generation and Transaction of the optional subject, in the light of TPCK paradigm, TPCK based content analysis of selected units of the secondary readers in physical Sciences • Self-instructional strategies: Meaning, Personalized System of Instruction , Programmed Instruction-Linear, Branching, CAI and CMI	Web Searching Small Group discussion Document analysis Digital Document Analysis PowerPoint Presentations Seminars Didactic Questioning Self-Study	• Document assessment • Debates • Assignments • Peer Review • Participant Observation • Focused Discussions

Unit II: Material Design for Curriculum Transaction (10+4=14 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the concept of curriculum transaction material design. 2. To familiarize with various curriculum transaction materials using techno pedagogy 3. To design and develop techno pedagogic curriculum transaction materials for learning physical science.	▪ Techno Pedagogic Curriculum Transaction Materials – Digital texts, brief explanation – Designing of digital texts- digital resources, brief explanation – digital resources in Physical Science	Video Presentations K-W-L charting Group discussion Guided Inquiry Digital Modular Expositions	▪ Analysis in group discussion ▪ Assessment through Tess ▪ Assessment of optional notebook entries ▪ **Practicum -CE** ▪ Concept paper Presentation **Practicals** o **-Criticism Lesson Templates (05)** o **Innovative work/teaching aid** ▪ CE-Blog Creation and Posting of Power point slides in Blogs

Unit III: Networking in Physical Science Learning (14+10=24 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the role and purposes of networking in learning physical science 2. To acquaint with the concept of online learning. 3. To acquaint with the creation of email ID and blogs	▪ Networking as a means of collaborative growth. Networking in learning of Physical Science. Purposes – means of personal and professional growth, Types-Technical, Personal and Institutional, e-twinning for institutional or professional growth in learning of Physical Science, Cloud Learning Environment for Science learning. ▪ Online learning – meaning, purposes – creation of email ID – Blogs – meaning – types – educational, instructional blogs for learning Physical Science (with a minimum of 5 postings for promoting teaching –learning of Physical Science)	Group discussion Document analysis and peer instruction Explicit Teaching Invited Lectures Peer Tutoring Blogging Content Development Learning Contracts	▪ Peer Debriefing ▪ Document Analysis ▪ Narrative Analysis ▪ Verification of Blog Postings ▪ Analysis in ▪ group ▪ discussion ▪ **CE - Test**

Unit IV: Teacher as a Reflective Practitioner (14+2=16 Hrs.)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize with reflective practices 2. To be a reflective practitioner	▪ Reflective practitioner: Meaning, Modes and means of reflective practices-Localized designing and development of tools of reflection by the Student-Teacher, Postings of reflection in blogs and forums	Narrative expression sessions in small or medium groups Document analysis Debates Think Aloud	▪ Optional level focused discussion ▪ Journal assessment ▪ MCQ based Quiz ▪ Mind Mapping

Unit V: Practice with Assessment in Classrooms (12+4=16 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To acquaint with online assessment and experience different practices	▪ Online assessment –meaning, practicing of online tools. Down loading of online tools – Online quiz maker, competitive /placement examinations-GATE, GRE, Science Talent Search, Olympiad, Intel Science Programme, Google Science Fair, KTET Performance tests- assessment of process outcomes,	Meaningful verbal expression Group discussion Preparation of rubrics Illustrative Demonstra-tion Web Data Mining	▪ Class Test ▪ Assessment of rubrics ▪ Lab Sessions for skill assessment ▪ Problem Sheets Completion ▪ MCQ based Quiz

References

- AACTE Committee (2008): Handbook of Technological Pedagogical Content Knowledge (TPCK) for Educators: Washington, DC, Rutledge/Taylor & Francis
- Chao, Lee (ed.) (2012) Cloud Computing for Teaching and Learning: Strategies for Design and Implementation: Hershey, PA, IGI Global.
- Frank Rennie& Tara Morrison (2013): E- Learning and Social Networking Handbook (Second Edition): New York, Routledge.
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- Janie Gross Stein, Richard Stein (Ed.) (2001): Network of Knowledge: Collaborative Innovation in International Learning: Toronto, Canada, University of Toronto Press Incorporated
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EDU10: TECHNO-PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS -NATURAL SCIENCE.

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

OBJECTIVES

To enable the student teachers to:
- Develop understanding and application of Techno-Pedagogic Content Knowledge Analysis
- Develop skill in preparation and practice of technology enhanced learning materials.
- Understand and apply online assessment and competency enhancement avenues**.**
- Identify networking as a means of personal and professional growth
- Understand classroom management principles essential for effective pedagogic transaction.

Contents

- **Unit I   : Technological Pedagogical Analysis Of Content Knowledge(TPACK) –**
- **Unit II   : Technology enhanced learning resources- preparation and practice**
- **Unit III   : Online assessment and competency enhancement avenues.**
- **Unit IV   : Classroom management for pedagogic transaction-**

Unit I: TECHNOLOGICAL PEDAGOGICAL ANALYSIS OF CONTENT KNOWLEDGE (TPACK)–ACONCEPTUALANALYSIS (Hours-28)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand and apply in pedagogic transaction. 2. To understand and find inter relationships of different areas of TPACK 3. To develop skill in Technological Pedagogical Analysis of Content Knowledge (TPACK)	▪ **Technological Pedagogical Analysis of Content Knowledge (TPACK)-**meaning and scope. Different knowledge areas of TPACK-1.Content Knowledge (CK), 2. Pedagogical Knowledge (PK), 3. Technology Knowledge (TK) 4. Pedagogical Content Knowledge (PCK), 5.Technological Content Knowledge (TCK), 6.Technological	Meaningful verbal expression. Group discussion. Narrative expression sessions in small or medium groups. PBL.	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy. ▪ Daily reflective journal ▪ Participant observation

| | | Multimedia and interdisciplinary approach.
Team teaching.
Peer tutoring | • **CE-creation blog, uploading of five power point slides based on any single science concept** |

Pedagogical Knowledge (TPK), and 7. Technological Pedagogical Content Knowledge (TPCK). Interrelationships of different areas of TPACK.
■ **Technological pedagogical content knowledge analysis of secondary school biology**.

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- AACTE Committee (2008): Handbook of Technological Pedagogical Content Knowledge (TPCK) for Educators: Washington, DC, Rutledge/Taylor & Francis
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Unit II: TECHONOLOGY ENHANCED LEARNING RESOURCES- PREPARATION AND PRACTICE (Hours-28)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop skill in the preparation and practice ofICT and Multimedia based materials in the teaching learning process of science 2. To understand the scope of networking in science teaching. 3. To develop skill in Networking through different ways.	■ **ICT and Multimedia as technology enhanced communication devises in the teaching of life science** - Collection/ Preparation of e-materials for pedagogic transaction of secondary school biology syllabus including environmental issues affecting local community(Power points, video clippings, pictures, instructional materials) ■ **Networking**- meaning and scope of Net working in science learning.	Group discussion Seminar Personality profile presentation Reflective practices. PBL Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	**Practicals** ○ **Online assessment** ○ **Innovative work/teaching aid** ■ Quiz programme. ■ Participation in group discussion. ■ Questioning. ■ On-task behavior. ■ Student's portfolio.

	▪ Development of one Blog for Natural science class and 5 postings by each student for promoting teaching learning/social issues/challenges etc. ▪ e-twinning- means for institutional and professional growth.		

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Unit III: ONLINE ASSESSMENT AND COMPETENCY ENHANCEMENTAVENUES. (Hours-16)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand develop skill in the preparation and practice of online assessment tools in science teaching learning process. 2. To understand different competitive examinations for teachers. 3. o understand the Educational entrepreneurship - Career possibilities for trained graduate	▪ Online assessment- -meaning and scope, Down load an Online quiz maker and use it during practice teaching. ▪ Competitive examinations for secondary school students – Science Talent Search Scheme, Science Olympiad, Google science fair. ▪ Competitive Examinations for teachers - KTET, NTET, TET. ▪ Educational entrepreneurship - Career	Meaningful verbal expression. Group discussion. Narrative expression sessions in small or medium groups. Brain storming. Seminar.	▪ Participation in group discussion. ▪ Questioning. ▪ On-task behavior in class. ▪ Tests. ▪ Science dairy. ▪ Daily reflective journal ▪ Participant observation. ▪ Student's portfolio ▪ **CE-Practicum**

		Reflective practices. Multimedia and interdisciplinary approach. Team teaching. Peer tutoring	
and post graduate science students.	possibilities for trained graduate and post graduate science students.		

References

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- Tony Ghaye (2011): *Teaching and Learning Through Reflective Practice* (Second Edition): New York, Rutledge.

Unit IV: CLASSROOM MANAGEMET FOR PEDAGOGIC TRANSACTION.(Hours 12)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the basic concept of classroom management. 2. To develop skill in preparing and practicing classroom rules. 3. To understand and practice physical arrangements for different methods of teaching.	• classroom management –a conceptual analysis-an introduction to classroom rules. • Physical arrangement for different types of instruction-small group, large group, laboratory. • Time management in class room- allocated time watching Vs engaged time.	Meaningful verbal expression Group discussion Small group sessions Peer instruction Narrative expression sessions in small or medium groups. Brain storming.. Reflective practices. Modular approach. Multimedia approach.	• Participation in group discussion. • Questioning. • On-task behavior in class. • Tests. • Science dairy. • Daily reflective journal • Participant • Observation. • **CE-Test** • **(including all chapters**

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Suggested Readings

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- Marzano,J.,Robert, Marzono,S.,Jana, and Pickering,J.,Debra., Clssroom Management That Works:Research –Based Strategies for Every Teacher.
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- http://www.theteachersatrisk.com/2010/07/18/most-popular-blog-about-classroom-management/
- http://www.theteachers guide.com/ClassMagement.htm

EDU 10.10 - Techno Pedagogical Content Knowledge Analysis - Social Science

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives:

- To develop an understanding about the qualities and competencies of Social Science teacher and to identify the ways and means of developing professional competency.
- To identify the role of teacher as a reflective practitioner in Social Science and to find out the modes and means of reflective practices.
- To analyse the role of Social Science teacher as a techno pedagogue and to find out the interrelationship of content knowledge and technological knowledge in the teaching-learning process.
- To familiarize the IT related professional inputs of teaching like Computer aided teaching, using presentation software, E- content development, video conferencing and Blogging in Social Science.
- To familiarize the use of Internet as a source to get information, pictures and videos in the teaching of Social Science.

Contents

Unit 1	:	**Professionalism and Social Science teacher**
Unit 2	:	**Teacher as a reflective practitioner**
Unit 3	:	**Social Science teacher as a techno pedagogue**
Unit 4	:	**Information technology inputs in Social Science teaching**
Unit 5	:	**Internet and the teaching of Social Science**

Unit I: Professionalism and Social Science teacher (14 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand meaning of profession and its significance 2. To develop understanding about the role, qualities and competencies of Social Science teacher 3. To identify the ways to improve professional growth	▪ Profession- definition, difference with other occupations- significance of profession ▪ Qualities and competencies of Social science teacher- different roles and personal qualities ▪ In-service programmes, Refresher/ orientation programmes, research and development	Discussion and prepare notes- analyse features of profession and professional ethics Lecture- discussion- question answer Collect information and present in classroom discussion	▪ Assessment of learning process and reflections ▪ (role of the learner in discussion, collection of information, analysis and presentation)

References:

- Aggarwal, J.C. (2003). *Teaching of Social Studies: A Practical Approach.* Mumbai:Vikas Publishing House.
- Kumar, S.P.K &Noushad,P.P.(2009). *Social Studies in the Classroom: Trends andMethods.*
- Pathak R.P.(2012).Teaching of social studies. Pearson, Delhi
- Bining, A.C &Bining, D.H. (1952) Teaching Social Studies in Secondary Schools.New York: McGraw Hill
- Clark, L.H.(1973*). Teaching Social Studies in Secondary Schools.*(2nd Ed.)New York:McMillan.
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- http://www.e-learningforkids.org/courses.html
- http://www.teacher.ne
- http://en.wikipedia.org/wiki/Wiki

Unit II: Teacher as a reflective practitioner (18Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the role of Social science teacher as a reflective practitioner and to understand the different reflective practices	▪ Meaning of reflection- reflective teaching and thinking ▪ Strategy for reflective practices- field experiences and reflective practice.	Meaningful verbal presentation with PPT support-Conduct a reflective session on the experiences of a seminar in the classroom/ field study/ community living camp etc	▪ Assessment of learning process and reflections ▪ **CE-Practicum**

References:

- Fitchman& Silva (2003). The Reflective Educators' Guide to Classroom Research. California:Corwin Press, Inc.
- Ehman& Patrick (1974). Towards Effective Instruction in Social Studies. USA: Houghton Miffn.
- Edigar, M. &Rao, B. (2003).Teaching Social Studies Successfully. New Delhi: Discovery Pub.House.
- Kumar, S.P.K &Noushad,P.P.(2009). *Social Studies in the Classroom: Trends andMethods.*
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- Bining, A.C &Bining, D.H. (1952) Teaching Social Studies in Secondary Schools.New York: McGraw Hill
- http://en.wikipedia.org/wiki/Wiki

Unit III: Social Science teacher as a techno pedagogue (18Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the need of technological inputs in the teaching learning process	▪ Inter relationship with content knowledge with technological knowledge ▪ Technological knowledge needed for a social science teacher ▪ ICT and constructivist approach in Social Science- scope and challenges ▪ Sample content analysis on techno pedagogical aspects	Lecture cum discussion-Analyse the impact of ICT in the classroom environment and transactional modalities (discussion & presentation) Analyse any two units of Social Science textbooks at secondary level and elicit suggestions to transact the content with modern technological support.	▪ Assessment of learning process and reflections ▪ (role of the learner in discussion, collection of information, analysis and presentation)

References

- Alexey Semenov, UNESCO, (2005): Information and Communication Technologies inSchools: A Handbook for Teachers.
- Atkins N.J and Atkins J.N, Practical Guide to Audio Visual Technique in Education,
- BattachaarjeeShymali, (2007). Media and Mass communication. An introduction. NewDelhi: Kanishka Publishers.
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- Khan, BoH (1977) Web-based Instruction. Englewood Cliffs: Educational TechnologyPublications.
- Madhukumar Indira. (2005). Internet based distance learning . New Delhi: Global Network.
- Mayer Richard E(2001); Multimedia Learning, Cambridge University Press, UK.McDonald &Evans Ltd. 1975
- Prasad Janardan, (2007). Audio Visual education. Teaching innovative technique. NewDelhi: Kanishka Publishers.
- Rejesekaran S. (2007) Computer Education and Educational Computing, New Delhi: NeelKamal Publishing Pvt. Ltd.
- Roblyer, M.D. (2008). Integrating educational technology into teaching. New Delhi: Pearson.

- Sagar Krishna, (2005). ICT Teacher training. New Delhi : Global Network
- Kumar, S.P.K &Noushad,P.P.(2009). Social Studies in the Classroom: Trends andMethods.
- http://blog.efrontlearning.net
- http://www.e-learningforkids.org/courses.html
- http://www.teacher.nehttp://en.wikipedia.org/wiki/Wiki

Unit IV: Information technology inputs in Social Science teaching (16Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the use of information technology in the teaching learning process	▪ Computer assisted instruction in Social Science- needs and scope ▪ Utilization of soft wares ▪ E content development in Social science ▪ Video conferencing	Meaningful verbal learning with PPT support. Prepare a report on e- content & video conferencing- visit a e learning centre/ interactive terminal	▪ **Internal test for the units 2,3&4 (CE-1)**

References

- Alexey Semenov, UNESCO, (2005): Information and Communication Technologies inSchools: A Handbook for Teachers.
- Atkins N.J and Atkins J.N, Practical Guide to Audio Visual Technique in Education,
- BattachaarjeeShymali, (2007). Media and Mass communication. An introduction. NewDelhi: Kanishka Publishers.
- Hoole H.S. Ratnajeevan&HooleDushyanthi. (2005). Information and communicationtechnology. New Delhi: Foundation Books PVT. LTD.
- Khan, BoH (1977) Web-based Instruction. Englewood Cliffs: Educational TechnologyPublications.
- Madhukumar Indira. (2005). Internet based distance learning . New Delhi: Global Network.
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- Prasad Janardan, (2007). Audio Visual education. Teaching innovative technique. NewDelhi: Kanishka Publishers.
- Rejesekaran S. (2007) Computer Education and Educational Computing, New Delhi: Neel Kamal Publishing Pvt. Ltd.
- Roblyer, M.D. (2008). Integrating educational technology into teaching. New Delhi: Pearson.
- Sagar Krishna, (2005). ICT Teacher training. New Delhi : Global Network
- Kumar, S.P.K &Noushad,P.P.(2009). *Social Studies in the Classroom: Trends andMethods*.

- http://blog.efrontlearning.net
- http://www.e-learningforkids.org/courses.html
- http://www.teacher.ne
- http://en.wikipedia.org/wiki/Wiki

Unit V: Internet and the teaching of Social Science (18Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the importance of internet and blogging in the teaching learning process of Social Science	▪ Concept of internet- its utilization in Social science teaching- scope and limitations ▪ Blogging – information, teaching and research purposes and utilities	Prepare a seminar paper on internet and the teaching of Social ScienceCreate a blog and post the seminar paper content in it. Prepare an assignment on the utilities of blogging after examine various blogs	▪ **CE** ▪ Preparation and uploading of power point slides in the blog

References
- Alexey Semenov, UNESCO, (2005): Information and Communication Technologies inSchools: A Handbook for Teachers.
- Atkins N.J and Atkins J.N, Practical Guide to Audio Visual Technique in Education
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- Theodore Kaltsounis, (1979).Teaching Social Studies in Elementary School. USA: Prentice hall, Inc.
- Elizabeth Perrot, (1982). Effective Teaching. Singapore: Longman
- Alan Holmeister& Margaret Lukke, (1990).Research in to Practice. USA: Allyn and Bacon.
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- Helen L Burz& Kit Marshall. (1998). Performance based Curriculum for Social studies. California: Corwin Press.
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- George W. Gagnon & Michelle Colly. (2001).Designing for Learning- Six Elements in Constructivist Class rooms. California: Corwin Press.
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- Don Skinner. (2010). Effective Teaching and Learning in Practice. London: Continuum International Publishing group.
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- Tony Ghaye. (2011). Teaching and Learning through Reflective Practice. London:Routledge.

EDU 10.11 : Techno Pedagogical Content Knowledge Analysis -Geography

Objectives:

- To develop an understanding about the qualities and competencies of Geography teacher and to identify the ways and means of developing professional competency.
- To identify the role of teacher as a reflective practitioner in Geography and to find out the modes and means of reflective practices.
- To analyse the role of Geography teacher as a techno pedagogue and to find out the interrelationship of content knowledge and technological knowledge in the teaching-learning process.
- To familiarize the IT related professional inputs of teaching like Computer aided teaching, using presentation software, E- content development, video conferencing and Blogging in Geography
- To familiarize the use of Internet as a source to get information, pictures and videos in the teaching of Geography

Contents-
Unit 1   : Professionalism and Geography teacher
Unit 2   : Teacher as a reflective practitioner
Unit 3   : Geography teacher as a techno pedagogue
Unit 4   : Information technology inputs in Geography teaching
Unit 5   : Internet and the teaching of Geography

Unit I: Professionalism and Geography teacher (15 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand meaning of profession and its significance 2. To develop understanding about the role, qualities and competencies of Geography teacher 3. To identify the ways to improve professional growth	▪ Profession- definition, difference with other occupations- significance of profession ▪ Qualities and competencies of Geography teacher- different roles and personal qualities ▪ In-service programmes, Refresher/ orientation programmes, research and development	Discussion and prepare notes- analyse features of profession and professional ethics Lecture- discussion- question answer Collect information and present in classroom discussion	▪ Assessment of learning process and reflections (role of the learner in discussion, collection of information, analysis and presentation)

References

- Arora, M.L.(1979)Teaching of Geography, Prakash Brothers, Ludhiana.
- Gopill, G.H.(1966) Teaching of Geography, Macmillan, London
- Garnett, Olive. (1967) Fundamentals in School Geography, George G., Harrap and company, London.
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- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green and Company.
- Barnard. H.C.(1963).Principles and Practices of teaching Geography, Bihar Hindi GrandhAcademy,Patna.
- Prasad Jagdish. (1982). Teaching of Geography, VinodPustakMandir, Agra
- http://blog.efrontlearning.net
- http://www.e-learningforkids.org/courses.html
- http://www.teacher.ne
- http://en.wikipedia.org/wiki/Wiki

Unit II: Teacher as a reflective practitioner (15 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the role of Geography teacher as a reflective practitioner and to understand the different reflective practices	▪ Meaning of reflection- reflective teaching and thinking ▪ Refelctivepractioner: meaning, modes and means of reflective practices-localized designing and development of tools of reflection by student teacher, posting of reflection in blogs. ▪ Strategy for reflective practices- field experiences and reflective practice.	Meaningful verbal presentation with PPT support- Conduct a reflective session on the experiences of a seminar in the classroom/ field study/ community living camp etc.	▪ Assessment of learning process and reflections ▪ **CE-Practicum**

References

- Fitchman& Silva (2003). The Reflective Educators' Guide to Classroom Research. California:Corwin Press, Inc.
- Varma, O.P., and Vedanayagam, E.G.(1987) Teaching of Geography, Sterling Publishers Private Limited, New Delhi.
- UNESCO Source Book for Geography Teaching.(1982) London Longman's Green and Company.
- http://en.wikipedia.org/wiki/Wiki

Unit III: Geography teacher as a techno pedagogue (18 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To understand the need of technological inputs in the teaching learning process	- Concept of TPCK - Scope and challenges of TPCK - Inter relationship with content knowledge with technological knowledge - Technological knowledge needed for a Geography teacher - ICT and constructivist approach in Geography- scope and challenges - Sample content analysis on techno pedagogical aspects	Lecture cum discussion- Analyse the impact of ICT in the classroom environment and transactional modalities (discussion & presentation) Analyse any two units of Geography textbooks at secondary level and elicit suggestions to transact the content with modern technological support.	- Assessment of learning process and reflections (role of the learner in discussion, collection of information, analysis and presentation) **Practicals** o **Online assignment**

References

- Alexey Semenov, UNESCO, (2005): Information and Communication Technologies in Schools: A Handbook for Teachers.
- Atkins N.J and Atkins J.N, Practical Guide to Audio Visual Technique in Education,
- BattachaarjeeShymali, (2007). Media and Mass communication. An introduction. New Delhi: Kanishka Publishers.
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- Madhukumar Indira. (2005). Internet based distance learning . New Delhi: Global Network.
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- Rejesekaran S. (2007) Computer Education and Educational Computing, New Delhi: Neel Kamal Publishing Pvt. Ltd.
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- Sagar Krishna, (2005). ICT Teacher training. New Delhi : Global Network
- Kumar, S.P.K &Noushad,P.P.(2009). *Social Studies in the Classroom: Trends andMethods*.
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- http://www.e-learningforkids.org/courses.html
- http://www.teacher.ne
- http://en.wikipedia.org/wiki/Wiki

Unit IV: Information technology inputs in Geography teaching (18 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify the use of information technology in the teaching learning process	▪ Computer assisted instruction in Geography- needs and scope ▪ Utilization of soft wares ▪ E content development in Geography-techno pedagogic curriculum transaction materials- Digital texts-designing-digital resources in geography. ▪ Video conferencing	Meaningful verbal learning with PPT support. Prepare a report on e- content & video conferencing- visit a e learning centre/ interactive terminal	▪ Internal test for the units 2,3&4 (CE-1)

References

- Alexey Semenov, UNESCO, (2005): Information and Communication Technologies in Schools: A Handbook for Teachers.
- Atkins N.J and Atkins J.N, Practical Guide to Audio Visual Technique in Education,
- BattachaarjeeShymali, (2007). Media and Mass communication. An introduction. New Delhi: Kanishka Publishers.
- Hoole H.S. Ratnajeevan&HooleDushyanthi. (2005). Information and communication technology. New Delhi: Foundation Books PVT. LTD.
- Khan, BoH (1977) Web-based Instruction. Englewood Cliffs: Educational Technology Publications.
- Madhukumar Indira. (2005). Internet based distance learning. New Delhi: Global Network.
- Mayer Richard E(2001); Multimedia Learning, Cambridge University Press, UK. McDonald &Evans Ltd. 1975
- Prasad Janardan, (2007). Audio Visual education. Teaching innovative technique. New Delhi: Kanishka Publishers.
- Rejesekaran S. (2007) Computer Education and Educational Computing, New Delhi: Neel Kamal Publishing Pvt. Ltd.
- Roblyer, M.D. (2008). Integrating educational technology into teaching. New Delhi: Pearson.
- Sagar Krishna, (2005). ICT Teacher training. New Delhi : Global Network
- http://blog.efrontlearning.net
- http://www.e-learningforkids.org/courses.html
- http://www.teacher.ne
- http://en.wikipedia.org/wiki/Wiki

Unit V: Internet and the teaching of Geography (18 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop understanding about the importance of internet and blogging in the teaching learning process of Geography	▪ Concept of internet- its utilization in Geography teaching- scope and limitations ▪ Blogging – information, teaching and research purposes and utilities	Prepare a seminar paper on internet and the teaching of Geography Create a blog and post the seminar paper content in it. Prepare an assignment on the utilities of blogging after examine various blogs	▪ **CE - Prepare PPT (at least five slides) on a single concept in Geography and upload in blog.**

References

- Alexey Semenov, UNESCO, (2005): Information and Communication Technologies in Schools: A Handbook for Teachers.
- Atkins N.J and Atkins J.N, Practical Guide to Audio Visual Technique in Education
- BattachaarjeeShymali, (2007). Media and Mass communication. An introduction. New Delhi: Kanishka Publishers.
- Hoole H.S. Ratnajeevan&HooleDushyanthi. (2005). Information and communication technology. New Delhi: Foundation Books PVT. LTD.
- Khan, BoH (1977) Web-based Instruction. Englewood Cliffs: Educational Technology Publications.
- Madhukumar Indira. (2005). Internet based distance learning . New Delhi: Global Network.
- Mayer Richard E(2001); Multimedia Learning, Cambridge University Press, UK. McDonald &Evans Ltd.
- Prasad Janardan, (2007). Audio Visual education. Teaching innovative technique. New Delhi: Kanishka Publishers.
- Rejesekaran S. (2007) Computer Education and Educational Computing, New Delhi: Neel Kamal Publishing Pvt. Ltd.
- Roblyer, M.D. (2008). Integrating educational technology into teaching. New Delhi: Pearson.
- Sagar Krishna, (2005). ICT Teacher training. New Delhi : Global Network
- http://blog.efrontlearning.net
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- http://www.teacher.ne
- http://en.wikipedia.org/wiki/Wiki

Suggested Readings- Geography

- Elizabeth Perrot, (1982). Effective Teaching. Singapore: Longman
- Alan Holmeister& Margaret Lukke, (1990).Research in to Practice. USA: Allyn and Bacon.
- Jerome Freiberg, H & Amy Driscol. (1992). Universal Teaching Strategies. USA: Allyn and Bacon.
- Patricia L. Smith & Tillman J. Ragan. (1999). Instructional Design. New York: John Wiley & sons. Inc.
- George W. Gagnon & Michelle Colly. (2001).Designing for Learning- Six Elements in Constructivist Class rooms. California: Corwin Press.
- Susan Udelhofen. (2005). Keys to curriculum mapping. California: Corwin Press.
- Peter Taylor. (2006). How to design a Training Course. New York: VSO.
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- Judith K. March & Karen H. Peters. (2008). Designing Instruction. California: Corwin Press.
- Robin Alexander. (2008). Essays on Pedagogy. USA: Routledge.
- Nicole Saginor. (2008). Diagnostic Classroom Observation. California: Corwin Press.
- Philip M. Anderson. (2009). Pedagogy. New York: Peter Lang Publishing, Inc.
- Arbind Kumar Jha. (2009). Constructivist Epistemology and Pedagogy. New Delhi: Atlantic.
- Don Skinner. (2010). Effective Teaching and Learning in Practice. London: Continuum International Publishing group.
- ValsaKoshy. (2011). Action Research. New Delhi: Sage Publications.
- Tony Ghaye. (2011). Teaching and Learning through Reflective Practice. London:Routledge.

Web Sites

- Geo.Teacher
- Geography Education @National Geography.com
- Geo.Resource Center
- Geography Education

EDU 10.12: TECHNO PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS – COMMERCE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

- To conscientize the prospective teachers become a techno- pedagogue and become aware of the concept TPCK
- To grow to be competitive in designing digital texts and e-content in commerce disciplines
- To become empower in surfing digital resource for transacting commerce curriculum.
- To familiarize with the networking system for institutional and professional growth.
- To get acquainted with the need of creating e-mail and blogs for pedagogical analysis.
- To prepare the prospective teachers as reflective practitioner
- To get acquaint with the principles and practices of feedback mechanisms.
- To become capable of designing and implementing online assessment tools and techniques.
- To generate a professional aspiration among young world by preparing for competitive / placement exams
- To inculcate a broad perspectives of individualized institution

Contents

Unit 1	**: Techno Pedagogic Content Knowledge Analysis (TPCK) - Introduction**
Unit 2	**: Curriculum Material Design**
Unit 3	**: Networking as a means of personal and professional growth**
Unit 4	**: Reflective Practices**
Unit 5	**: Assessment and Learner Performance**
Unit 6	**: Individualized Instructions**

Unit I: Techno Pedagogic Content Knowledge Analysis (TPCK) – Introduction (10 Hrs+4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To conscientize the prospective teachers become a techno-pedagogue 2. To become aware of the concept	▪ Inter relationship between Technology, Pedagogy and Content ▪ Teacher as a Techno-Pedagogue: Meaning and Qualities	Meaningful verbal learning Demonstration	▪ Prepare a self explanatory note on 'Teacher as a Techno-Pedagogue'

	TPCK	■ Scope and purpose of Techno-Pedagogic Content Knowledge Analysis	On line learning
3.	To become capable of analyzing content based on technology	■ TPCK based content analysis (Selected units of higher secondary commerce text book)	Group discussion

References

- http://en.wikipedia.org/wiki/Technological_Pedagogical_Content

Unit II: Curriculum Material Design (12 Hrs+ 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To grow to be competitive in designing digital texts and e-content in commerce disciplines 2. To become empower in surfing digital resource for transacting commerce curriculum.	■ Experience with curriculum design-Design digital texts and e-content ■ Adapting free downloadable digital resource in commerce ■ Web sites surfing practices	Discussion Online learning Demonstration Workshop Group investigation	■ Concept maps ■ Observation ■ Product presentation ■ Report verification ■ **Internal test for the units 1,2 (CE-1)** ■ **CE - Practicum**

References

- http://teachinghistory.org/issues-and-research/roundtable
- *www.5learn.co/e-content-development*
- www.aptaracorp.com/digital-**content**-production/**econtent**-**development**
- *www.ntu.edu.sg/home/sfoo/publications/2002/02ecdl_fmt.pdf*
- blog.ebayclassifieds.com
- www.net-security.org *cybercoyote.org/security/safe-**web**.htm*l

Unit III: Networking as a means of personal and professional growth (14 Hrs + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize with the networking system for institutional and professional growth. 2. To get acquainted with the need of creating e-mail and blogs for pedagogical analysis. 3. To become practically oriented towards various aspects of networking system	▪ Professional and Institutional growth: Through network-twining ▪ Student and Institution Networking ▪ Online learning: Concept and system of online learning-Creation of e-mail ID and blogs (5 posts for promoting teaching learning of commerce) ▪ Learning management system and pedagogical analysis	Scaffolding strategies Demonstration Simulation Online learning	▪ Experience sharing ▪ Peer assessment ▪ Online assessment ▪ **CE -** ▪ **Uploading of a lesson template(Power point) in blog (CE-2)**

References

- http://www.guardian.co.uk/higher-education-network/

Unit IV: Reflective Practices (8 + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
4. To prepare the prospective teachers as reflective practitioner 5. To become practically experienced in dealing reflective strategies	▪ Teacher as a reflective practitioner, Concept of Reflective practices ▪ Reflective strategies: concept maps, brain storming, journaling, portfolio writing, problem solving	Discussion Brain storming Problem solving Concept maps Online learning	▪ Idea presentation grid ▪ Concept maps ▪ Portfolio writing ▪ Assignment ▪ **CE- Test**

References

- http://en.wikipedia.org/wiki/Reflective_practice
- http://tep.uoregon.edu/showcase/crmodel/**strategies**
- Borich, Gary D (2012). Effective teaching methods: Research based practice. New Delhi: Pearson Education
- Dymoke, Sue & Harrison, Jennifer (2008). Reflective teaching and learning. New Delhi: SAGE

Unit V: Assessment and Learner Performance (8Hrs + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To get acquaint with the principles and practices of feedback mechanisms. 2. To become capable of designing and implementing various performance tests. 3. To orient and familiarize with online assessment tools and techniques. 4. To generate a professional aspiration among young world by preparing for competitive / placement exams	▪ Assessing student performance as feedback for o Students progress o Teacher's proficiency o Parents ▪ Designing performance tests: purposes and uses ▪ Downloading of free online assessment tools-online quiz, online test. ▪ Competitive exams- Basic ideas of MAT,CA, CS, ICWAI	Brain storming Meaningful verbal expression Online learning Group investigation	▪ Performance tests ▪ Assignments ▪ Quiz session

References

- http://www.ero.govt.nz/National-Reports/The-Quality-of-Teach
- http://www.novisystems.com/**Assessment**-Software.aspx
- https://www.**assessment**.gatech.edu/wp-content/uploads/slides
- Aggarwal, J.C. (1996) A Practical Approach. New Delhi :Vikas Publishing House Pvt. Ltd.
- Singh and Gopal (2004) Teaching Strategies. New Delhi: APH Publishing Corporation.
- Sue, Cowley (2006) A – Z of Teaching. New York: Brijbasi Art Press Ltd.

Unit VI: Individualized Instructions (8Hrs + 4 Hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
▪ To inculcate a broad perspectives of individualized institution	▪ Individualized instruction: Importance and principles ▪ Personalized system of instruction(PSI) ▪ Programmed instruction	Discussion Demonstration Self study	▪ Analysis of performance ▪ Assessment of programmed learning material ▪ Assessment of modules

To develop skills in preparing programmed instruction materials and modules	▪ CAI and CMI ▪ Instructional modules	Supervised study Self evaluation Observation	**CE- Test/Model exam**

References

- http://www.airpower.au.af.mil/airchronicles/aureview/1975/se
- Aggarwal, J.C. (1996) A Practical Approach. New Delhi : Vikas Publishing Hou Jacqueline, Thousand S., Richard A. Villa & Ann, Nevin I. (2007).
- *Differentiating instruction: Collaborative planning and teaching for universally designed learning*. SAGE: Thousand Oaks.Pvt. Ltd.
- Singh and Gopal (2004) Teaching Strategies. New Delhi: APH Publishing Corporation.

EDU 10.13 : TECHNO-PEDAGOGIC CONTENT KNOWLEDGE ANALYSIS - HOME SCIENCE

Instructional Hours : 84 (Theoretical Discourses- 60 & Related Practical Work – 24)

Objectives

To enable the student teachers to:
- Identify the role of teacher as a techno-pedagogue
- Develop an understanding and application of Techno-Pedagogic Content Knowledge Analysis
- Identify and develop technology enhanced learning resources
- Familiarise with online assessment tools
- Identify teacher as a reflective practitioner

Contents

Unit I	:	**Teacher as s Techno-Pedagogue (15 Hrs)**
Unit II	:	**Technology Enhanced Learning Resources- Preparation and Practice (25 Hrs)**
Unit III	:	**Assessment in Classroom and Competency Enhancement Avenues (10 Hrs)**
Unit IV	:	**Teacher as s Reflective Practitioner (10 Hrs)**

Unit I: TEACHER AS A TECHNO-PEDAGOGUE(15 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To develop an understanding of meaning,objectives and scope of Technology 2. To get acquainted with the knowledge of Techno-Pedagogic Content Knowledge Analysis (TPCKA) 3. To identify interrelationship of Content knowledge, Pedagogic knowledge and Technological knowledge	▪ Technology- meaning,objectives and scope. ▪ Techno-Pedagogic Content Knowledge Analysis (TPCKA)-Interrelationship of Content knowledge,Pedagogic knowledge and Technological knowledge ▪ TPCKA- Scope and challenges ▪ TPCK based content analysis of selected units of the higher secondary readers and CD resources	Lecture cum discussion Meaningful learning Demonstration Group discussion Document analysis Work shop Assignment Group Pojects	▪ Performance assessment in group discussion ▪ Tests ▪ Peer evaluation ▪ Evaluation of Assignment,projectsetc

			Practicals
4. to understand the Scope and challenges 0f TPCKA 5. to practice TPCK based content analysis of selected units of the higher secondary readers and CD resources			o **Online assignment** ▪ CE-Practicum

Unit II: TECHNOLOGY ENHANCED LEARNING RESOURCES- PREPARATION AND PRACTICE(25 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify ICT and Multimedia as technology enhanced communication devices in Home Science teaching 2. To develop an understanding of e-twinning as a means for institutional and professional growth 3. To prepare 4. e-materials for pedagogic transaction of higher secondary Home Science syllabus using LCD and interactive units 5. To develop skill in developing Blog and posting on it by students for promoting teaching learning 6. To identify and apply the knowledge of resources in 7. e-learning management system for teaching and learning of home science	▪ ICT and Multimedia as technology enhanced communication devices in Home Science teaching ▪ e-twinning- means for institutional and professional growth ▪ Preparation of e-materials for pedagogic transaction of higher secondary Home Science syllabus using LCD and interactive units o Power points, collection of video clippings, pictures, instructional materials from internet and YouTube o Collection of pictures, photographs, video clippings on resources issues and threats of local community for solving issues/ problems by posting on internet ▪ Development of one Blog for each class and 5 posting by each student for promoting teaching learning ▪ Learning Management System: Scope-store, collaborates, communicate and evaluate ▪ Identification and application of resources in	Lecture cum discussion Meaningful learning Demonstration Group discussion Work shop Assignment Group Projects	▪ Performance assessment in group discussion ▪ Tests ▪ Peer evaluation ▪ Evaluation of Assignment, projects etc. ▪ **CE-Preparation of lesson template(power point) In blog**

| | e-learning management system for teaching and learning of home science
o Types- offline and online
o CAI
o EDUSAT
o Video lessons | | |

Unit III: ASSESSMENT IN CLASSROOM AND COMPETENCY ENHANCEMENT AVENUES (10 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To identify Assessment as a feedback to students, teachers and parents 2. To familarise with Downloading of free online assessment tools like online quiz maker, Science Talent Search, Google science fair, KTET etc.	▪ 3.1 Assessment as a feedback to students, teachers and parents ▪ 3.2 Downloading of free online assessment tools like online quiz maker, Science Talent Search, Google science fair, KTET etc.	Lecture cum discussion Meaningful learning Demonstration Group discussion Project Assignment	▪ Performance assessment in group discussion ▪ Tests ▪ Peer evaluation ▪ Evaluation of Assignment, ▪ projects ▪ **CE-Test**

Unit IV: TEACHER AS A REFLECTIVE PRACTITIONER (10 hrs)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familarise the meaning, importance,modes and means of reflective practices 2. To practice in designing and development of Tools of reflection for student teachers 3. To practice reflection through Blogs and Fourms	▪ 4.1 Meaning and importance of reflective practices ▪ 4.2 Modes and means of reflective practices ▪ 4.3 Designing and development of Tools of reflection for student teachers ▪ 4.4 Reflection through Blogs and Fourms	Meaningful verbal expression Group discussion Work shop Seminar	▪ Performance assessment in group discussion,workshop,seminar ▪ Assessment of Optional Note Book enteries ▪ Tests - Peer evaluation **Practicals** o **Innovative work/teaching aid**

EDU – 201.2 & 202.2 - Health Education   (3 credits-36 hrs) – Total Marks - 30

Objectives

- Acquire knowledge of the fundamentals of Health, Health Education and Physical fitness.
- Provide knowledge and understanding regarding the scientific basis and benefits of Physical activity.
- Develop right attitudes and habits for a healthy living in personal and community life.
- To impart knowledge regarding food and nutrition, first aid and the importance of posture.
- Develop awareness about various diseases and their prevention.
- Guiding the next generation to live with social commitment and obligations.

Unit – 1	**: Health & Health Education (4 Hrs)**
Unit – 2	**: Physical Fitness (8 Hrs)**
Unit – 3	**: Types of Exercises (6 Hrs)**
Unit – 4	**: Hygiene & Health Hazards (4 Hrs)**
Unit – 5	**: Nutrition, Lifestyle Diseases, First Aid & Posture (14 Hrs)**

Unit I: Curriculum Construction (17 hours)

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Acquire knowledge of the fundamentals of Health, Health Education and Physical fitness.	▪ Meaning, importance and factors affecting Health ▪ Significance, scope ,aims and objectives of Health Educatio	Meaningful verbal presentation	▪ Test

Unit II: Physical Fitness

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To familiarize the physical fitness components and the modes of developing them.	▪ Definition ▪ Components of Physical Fitness ▪ Health related Physical Fitness ▪ Activities for developing Physical Fitness components	Theoretical orientation Group discssion Demonstration	▪ Self assessment ▪ Test ▪ Attitude and effort

Unit III: Types of Exercises

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Provide knowledge and understanding regarding the scientific basis and benefits of Physical activity.	▪ Aerobic and Anaerobic Exercises ▪ Isotonic ,Isometric and Isokinetic Exercises ▪ Health benefits of Physical Exercises ▪ Effect of exercise on Circulatory, Respiratory and Muscular Systems	Verbal orientation Practical sessions Group activity	▪ Test ▪ Movement skill analysis

Unit IV: Hygiene & Health Hazards

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. Develop right attitudes and habits for a healthy living in personal and community life. 2. Guiding the next generation to live with social commitment and obligations.	▪ -Personal and Community Hygiene ▪ -Smoking ,Alcoholism and Abuse of drugs	Dramatization Presentations in small/medium groups	▪ Evaluation of daily reflective behaviour ▪ Test

Unit V: Food and Nutrition, Diseases, First Aid and Posture

Learning Outcome	Contents / Major concepts	Strategies, Approaches	Assessment
1. To impart knowledge regarding food and nutrition, first aid and the importance of posture.	▪ Macro and Micro Nutrients ▪ Balanced diet ▪ Vitamin deficiency and related diseases ▪ Mal nutrition ▪ Hypo kinetic /Lifestyle diseases and it's management ▪ Definition ▪ Aims and Principles	Narrative expressions Practical sessions Group activity Dramatization Personal profiles Preparation of	▪ Debating and discussions ▪ Test ▪ Survey reports ▪ Group presentation ▪ Posture assessment Grid

2. Develop awareness about various diseases and their prevention.	▪ Management of fracture, Dislocation, Wounds, Sprain, Strain, Cramp, Fainting, Burns, etc. ▪ Congenital and acquired postural deformities ▪ Remedial measures for acquired postural problems	database Social survey	

References

- Ajmeer Singh,Jagdar Singh Gill,Jagadish Bains,Rachpal Singh Brar and Nirmalgit Kaur Rathee,Modern Text Book of Physical Education Health and Sports,New Delhi,Kalyani Publishers-2001.
- Kamalesh M.L,Physical Education: Facts and Foundations,Fareedabad,P.B.Publication Pvt.Ltd-1998.
- Gupta,Sushma; Garg,Neeru and Aggarwal,Amtha,Text Book of Food and Nutrition,Child CarePsychology,Ludhiyana,Kalyani Publishers -1999.
- Carl,W.Willgoose, Health Teaching in Secondary Schools,Philadelphia;W.B.Saunders Company-1977.
- Webb,Michael;Scott,Roy and Beale,Peter,First Aid Manual,Dorling Kindersley,London-1997.
- Adrianne E. Hardman (Author), David J. Stensel, Physical Activity and Health,Amazon Publishers,USA -2013
- B.C.Rai, Health Education and Hygienendra, Prakashan Kendra,Lucknow.
- R.S.Reddy,Teaching Health and Nutrition,Commonwealth Publishers,New Delhi.
- Norman Bezzant, Help! First Aid for Everyday Emergencies,Jaico Publishing House,Bombay.
- Dr.Prathap .C.Reddy,Health and Lifestyle Management Series,Exercises and Fitness, Lifestyle Unit,Apollo Health Street Ltd.,Hyderabad-2004.
- James.S.Basco and William F.Gustafson,Measurement and Evaluation in Physical ducation,Fitness and Sports,New Jersy; Prentice Hall Inc,1983.
- George Immanuel ,Track and Field Manual.
- Thirunarayan.c,Methods in Physical Education,South India Press,Karaikudi-1982.

Website address

- http://www.bradapp.net/   http://www.pitt.edu/gsphhome/
- http://www.theselfimprovementsite.com/

Guidelines for Practical Work

- **Conduct two classes in the Practice Teaching sessions in schools by preparing teaching resources such as charts and diagrams, from which one from Physical Education and the other from Health Education. (10 marks)**
- **Health Education Records (10-15 pages) (10 marks)**
- **Internal Test (one) (10 marks)**

UNIVERSITY OF KERALA

ACADEMIC CALENDAR B. Ed.

Semester I
(November to March)
Total Working Days – 90 *spread over in 20 weeks* (Excluding Christmas holidays)

Activities Weeks →	1	2	3	4	5	6	7	8	9	10	11	12	13	15	16	17	18	19	20	April
Admission																				
General Orientation *	▨																			
College Union Elections					▨															
A. Theory & Related Practical Work EDU 01 -05		▨	▨	▨	▨	▨	▨	▨		▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	
B.College based practicals (1) EDU-101 (a) Optionals				▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	
(2) EDU-101 (b) HE & PE		▨	▨																	
B. Community-based Practicals EDU – 103 (SUPW)				▨	▨	▨	▨	▨	▨	▨	▨	▨	▨							
B. School based Practicals EDU _ 102 Initiatory School Experiences									▨											
Seminar/Projects/Tutorials/		▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨			
Tests, assignments, practicum etc		▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨	▨			
Mid Semester Exam.											▨									
Model Examination																			▨	
Semester End Exam (University)																				▨

***General Orientation** : For details refer curriculum

Semester II
(June to October)
Total working Days – 110 spread over in 22 weeks (including activities taken up during April/May) Excluding Onam Holidays

Activities Weeks →	April/May	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	Nov
A. Theory & Related Practical Work		▦	▦	▦										▦	▦	▦	▦	▦	▦	▦	▦		
B. College based practicals (1) EDU 201.1 – Optional (2)EDU 201.2 - HE		▦	▦	▦										▦	▦								
B. School Based Practicals (1) EDU 202.1 – Optional (2) EDU 202.2 – PE & HE (3) EDU 06, 07 & 08 (field study)	**EDU 203** 1.Community Living camp				Practice Teaching & Related Activities (optional , HE & PE) Field Study of EDU 06, 07 & 08																		
B. Community-based Practicals - EDU 203		EDU 203 - (Arrange conveniently during May) 1. Community Living Camp 2. Educational Tour																					
Seminar/Projects/ Tutorials/	2.Educational Tour	▦	▦	▦										▦	▦	▦	▦	▦	▦	▦	▦		
Tests, assignments, practicum etc		▦	▦	▦										▦	▦								
Mid Semester Exam.														▦									
Practical Examination (External Board)																▦	▦	▦					
Model Examination																						▦	
Semester End Exam (University)																							▦

EVALUATION SHEET

(Teaching practice)

Name of the student:

Co-operating /practicing school:

Subject: Standard: Date:

Criteria	Max. Score	Scores Secured					
		Observation of lessons					Average Score
		1	2	3	4	5	
1. Lesson template	10						
2.Set induction(Introduction of the lesson)	10						
3.Development of the Lesson	10						
4. Learning Experiences (Activities)	10						
5. Learner Involvement	10						
6. Use of Audio-Visual Aids & Technology Integration	10						
7. Mastery of the subject matter	10						
8. Classroom management	10						
9. Closure of the lesson	10						
10. Assessment and evaluation	10						
Total	100						

Overall impression about teaching: Excellent / Very good / Good / Satisfactory / Needs improvement

(90%or above)   (80-89%)   (60-79%)   (50-59%)   (below 50%)

Place: Name and Signature of the observer:

Date:

RATING SCALE

(Pre-practice Teaching)

Name of the student:

Co-operating /Practicing school:

Subject: Standard: Date:

Topic   :

Sl. No	Criteria	Excellent (90% and Above) A	Very Good (80-89%) B	Good (60-79%) C	Satisfactory (50-59%) D	Needs Improvement (Below 50%) E
1.	Lesson template					
2.	Set induction (Introduction of the lesson)					
3.	Development of the Lesson					
4.	Learning Experiences (Activities)					
5.	Learner Involvement					
6.	Use of Audio-Visual Aids & Technology Integration					
7.	Mastery of the subject matter					
8.	Classroom management					
9.	Closure of the lesson					
10.	Assessment and evaluation					
	Total					

Place: Name and Signature of the observer:

Date:

Teacher Observation Standards Rubric- Assessment Tool

Sl. No	Level/ Criteria	Excellent	Very good	Good	Satisfactory	Needs improvement
1	Lesson Template	All components of lesson plan including targeted learning objectives are clearly defined. Reflects all important concepts. Prerequisites are well accommodated. Interdisciplinary connections Clear and accurate class room interaction procedures. Self explanatory to a great extent	All most all components of lesson plan are clearly defined. Reflects all most all important concepts. Prerequisites are accommodated. Attempted for Interdisciplinary connections Clear Class room interaction procedures . Self explanatory	Some components of lesson plan need improvement. Reflects the essential concepts P prerequisites accommodated. More class room interaction procedures are given , but not clear self explanatory to a some extent level.	Some components of the lesson plan need improvement. Pre-requisites included are not properly accommodated. The strategies adopted needs improvement Not self explanatory	Teacher makes content errors. Teacher does not consider prerequisite relationships Teacher plans to use inappropriate strategies Most of the components were not properly defined
2	Set Induction (introduction of the lesson	Sets a conducive environment Intellectual curiosity of the child is very well aroused. Very well refreshes the pre-requisites needed. Very interesting and most relevant introduction	Sets a suitable environment Intellectual curiosity is aroused. Pre-requisites are checked Interesting and relevant introduction	Sets a suitable environment Only a few Pre-requisites refreshed. Interesting Sets a satisfactory environments	Introduction does not suit to the lesson Prerequisites were not appropriate Learning environment needs improvement.	Introduction to the lesson is not at all appropriate Prerequisites not at all considered

| 3 | Development of the Lesson | Sets a conducive environment Intellectual curiosity of the child is very well aroused. Very well refreshes the pre-requisites needed. Very interesting and most relevant introduction Uses very appropriate learning experiences Eliciting student responses to carry/drive the lesson forward Encouraging student enquiry by asking thought provoking open ended questions (brainstorming). Asking multi-level (lower, middle/higher order) questions. Providing scaffolds in constructing knowledge. Providing real world problem based learning environment. Creating situations for the development of values. Focusing on knowledge | Goals were set and defined. Sequenced the content through elaborating student initiated responses. skilled in directing and/supervising learner activities. Creates and sustains interest among students throughout the class. Uses reinforcers (both positive and negative) for recognition and approval. Skilled in identifying learner needs and learning difficulties. . Uses appropriate learning experiences Tries to elicit student responses to carry/drive the lesson forward Asking thought provoking open ended questions. Students are encouraged to construct/generate knowledge. Providing life related problems. | Tries to sequence the content through elaborating student initiated responses. Directing and/supervising learner activities. develops interest among students . Uses reinforcers (both positive and negative) for recognition and approval. Identifies learner needs and learning difficulties. Sets a satisfactory environments Learning experience provided needs improvement Teacher tries to elicit knowledge. Asking different types of question Chances for construction/generation of knowledge. Offers some accommodation to support different levels of learners. | Student initiated responses for developing the content needs improvement Involvement in learner activities is essential. More reinforcers (both positive and negative)are required for recognition and approval. . Learning environment needs improvement. Learning experience provided not at all appropriate. Teacher domination in learning activities Questions asked are not serving the purpose Offers minimum accommodation to support different levels of learners. . | Students not participated in content development. No reinforcement(both positive and negative) Teacher does not recognise the role of student in teaching learning process Learning environment developed is not suitable to the lesson Learning experience needs change No student participation Only a very few questions were asked. Most of the questions asked are leading . . |

		construction/generation. Relates present learning with previous and future learning.(opportunity for applying knowledge) Accommodation to support different levels of learners.	Tries to individualise instruction. Accommodation to support different levels of learners.	.		
4	Learning Experiences (Activities)	Life related to the maximum, variety of activities used, interesting Relevant Child friendly Participatory Satisfying all levels of learners Adequate number of activities	Life related Variety of activities were included, interesting Participatory Considered the different levels of learners Adequate number of activities included	Life related Participation of some learners, interesting to some extent Satisfies some learners only Minimum number of activities were included	Not directly related to life Minimum activities used Does not consider the different levels of learners	Not related to life Activities used are not appropriate and child friendly
5	Learner Involvement	Learners are actively constructing relationships and create metaphors. Learners are actively engaged in dialogue both with the teacher and one another. Learner autonomy and initiative is well appreciated.	Learners are constructing relationships and create metaphors. Encourages learners to engage in dialogue both with the teacher and one another. Learner autonomy and initiative are good.	Learners are actively constructing relationships and create metaphors. Learners are engaged in dialogue both with the teacher and one another. Encourage and accept learner autonomy and	More Learners involvement in constructing knowledge is expected. Learners are expected to have more dialogue both with the teacher and one another	No learner involvement in knowledge construction. Teacher-learner interaction and learner-learner interaction is very poor

		All learners are participating in the teaching learning process		initiative.		
6	Use of Audio-Visual Aids & Technology Integration	Proposed technology use is engaging, age appropriate, beneficial to learning and supportive of higher level thinking skills. Writings in the Board – well planned, neat and legible. Technology is integrated to the success of the lesson plan A clear relationship between use of technology and student learning Selects and uses appropriate audio-visual aids.	Proposed technology use is engaging, age appropriate, beneficial to learning and supportive of certain higher level thinking skills. Writings were planned Selects and uses appropriate audio-visual aids.	Proposed technology use is engaging and, age appropriate, but not clear how it enhances student learning Selects and uses appropriate audio-visual aids some times. Black board was used to the minimum	Proposed technology use is age appropriate and Audio visual aids are used to the minimum	Proposed technology use is not engaging, not age appropriate, not beneficial to learning and not at allsupportive of certain higher level thinking skills. No use of Audio visual aids .
7	Mastery of the subject matter	Clear understanding of the objectives and how it to be delivered. Current research and data includes in the lesson. Thorough and deep content knowledge Knowledge of accurate	Clear understanding of the objectives and how it to be delivered Deep content knowledge Necessary content is known to the teacher Content knowledge is accurate	Content knowledge is the minimum Knowledge of supplementary materials to some extent level	More content knowledge is a must Knowledge of supplementary materials to minimum	Teacher is not clear about the objectives and how to deliver it. Poor content knowledge Teacher makes errors in content

		and updated content Vast knowledge of the supplementary materials.	Necessary supplementary materials were clear to the teacher			
8	Class Management	Develops good rapport with learners Names of all learners are known to the teacher Deals with misconduct very effectively Learners are self disciplined. Recognises attending and non attending behaviours Keeps learners in eye span Learners do group works very systematic	Teacher has a command on students Calls pupils/groups by their names Stops misconduct Learners acts according to the direction of teachers. Learners acts according to the direction of the teacher Learner Manages group activities.	Teacher doesn't give much importance to discipline Learners are restless during group work	Learners are not at all disciplined Difficult to control in group work	Learners are wandering/playing in the class Learners are forced to do group work Teacher punishes for their misbehave
9	Closure of the Lesson	Summarised the lesson with respect to each learning point effectively Provides situations for reflective practice after each class. Provides appropriate feedback. Provides remedial measures daily. Provides enrichment activities for reinforcing the constructed knowledge.	Reviews major points in the lesson Provide reflective practice as a means of evaluation Provides remedial measures on alternate days	Repeats the main points of the lesson After each class student is advised to reflect on the class.	Summarises some points of the lesson Teacher does not insist on reflection	No review of the content is done Reflection is not a matter of the teacher

10	Assessment and evaluation	Questions for authentic assessment of all targeted objectives are included A clear relationship is evident between learning objectives and assessment of learning. Assessment tools contain topic specific criteria to serve as a helpful scaffold for learners Provision for formative evaluation through out the session	Questions for authentic assessment of all most all targeted objectives are included A clear relationship is evident between learning objectives and assessment of learning. Assessment tools contain majority topic specific criteria to serve as a helpful scaffold for learners Provision for formative evaluation to a greater extent	Questions for authentic assessment of some targeted objectives are included A clear relationship is evident between some learning objectives and assessment of learning. Assessment tools contain some topic specific criteria to serve as a helpful scaffold for learners Provision for formative evaluation to some extent	Questions for authentic assessment of few targeted objectives are included A clear relationship is evident between few learning objectives and assessment of learning. Assessment tools contain few topic specific criteria to serve as a helpful scaffold for learners Minimum provision for formative evaluation	Questions for authentic assessment of all targeted objectives are not included No clear relationship is evident between learning objectives and assessment of learning. Assessment tools do not contain topic specific criteria to serve as a helpful scaffold for learners No provision for formative evaluation .

CRITERIA FOR AWARDING SCORES IN COMMUNITY LIVING CAMP

Criteria	Very good	Good	Satisfactory	Need improvement
Participation in planning and implementing educational activities during the camp	4	3	2	1
Participation in the creative/ expressive/ demonstrative/ presentation aspects of different sections	4	3	2	1
Leadership quality/ Democratic culture/ Social accommodation & adaptability/ Group working skill	4	3	2	1
Participation in the community related programmes/ activities	4	3	2	1
Comprehensiveness of report (Record)	4	3	2	1

Structure of a Report (Record) of Community Living Camp

- Community Living Camp- Introduction (need and significance)

- Main theme of the camp during the academic year

- Objectives

- Module

- Session wise details (objective of the session, programme/ activity, consolidation/ outcome with self assessment)

- Conclusion

- Appendix

    - Organising committee

    - List of groups/ members

    - Responsibilities (group wise)

        (Maximum 10 page)