LOGANATHA NARAYANASAMY GOVERNMENT COLLEGE (AUTONOMOUS)

44, T. H. Road, Ponneri - 601 204, Thiruvallur District, Tamilnadu.
(Affiliated to University of Madras, Chennai - 600 005)
Phone& Fax : 044 - 2797 2266

INTERNAL QUALITY ASSURANCE CELL

PROGRAM OUTCOMES,
PROGRAM SPECIFIC OUTCOMES &
COURSE OUTCOMES

PROGRAM OUTCOMES – Under Graduate Programs

Program	Outcome Code	Outcomes
B.A.	PO 1	Understanding how cultural, historical, geographical, political, linguistic, and environmental forces shape the world and recognizing the role of the individual within communities to effect change.
	PO 2	Analyzing and critically reflecting on complex problems incorporating multiple perspectives and innovative thinking.
	PO 3	Demonstrating the ability to extract and convey information accurately in a variety of formats.
	PO 4	Engaging in a inquiry to identify and investigate questions of a theoretical and/or applied nature.
	PO 5	Demonstrating a deep knowledge in one or more disciplines and integrate knowledge and perspectives across disciplinary boundaries.
	PO 6	Demonstrating personal integrity and professional behavior in scholarly endeavors and in collaborating with others within and beyond the academic community.

Program	Outcome Code	Outcomes
B.Sc.	PO 1	Applying their broad knowledge of science across a range of fields, with in-depth knowledge in at least one area of study, while demonstrating an understanding of the local and global contexts in which science is practiced.
	PO 2	Articulating the methods of science and explaining why current scientific knowledge is both contestable and testable by further inquiry.
	PO 3	Applying appropriate methods of research, investigation and design, to solve problems in science, mathematics, technology and/or engineering, including the planning and/or conducting a significant project or investigation.
	PO 4	Recognizing the need for information; effectively searching for, evaluating, managing and applying that information in support of scientific investigations or scholarly debates.
	PO 5	Employing highly developed conceptual, analytical, quantitative and technical skills and being adept at a range of technologies.
	PO 6	Articulating the relationship between different science communities, the international scope of science, mathematics, technology and engineering knowledge and methods, and the contributions to their development that have been made by people with diverse perspectives, cultures and backgrounds.

Program	Outcome Code	Outcomes
B.Com.	PO 1	To build a strong foundation of knowledge in different areas of Commerce.
	PO 2	To develop the skill of applying concepts and techniques used in Commerce.
	PO 3	To develop an attitude for working effectively and efficiently in a business environment.
	PO 4	To integrate knowledge, skill and attitude that will sustain an environment of learning and creativity among the students.
	PO 5	To sensitise students to entrepreneurship.
	PO 6	To enable a student to be capable of making decisions at personal and professional level.

PROGRAM OUTCOMES – Post Graduate Programs

Program	Outcome Code	Outcomes
M.A.	PO 1	Understanding how cultural, historical, geographical, political, linguistic, and environmental forces shape the world and recognizing the role of the individual within communities to effect change.
	PO 2	Analyzing and critically reflecting on complex problems incorporating multiple perspectives and innovative thinking.
	PO 3	Demonstrating the ability to extract and convey information accurately in a variety of formats.
	PO 4	Engaging in a scholarly inquiry to identify and investigate questions of a theoretical and/or applied nature.
	PO 5	Demonstrating detailed knowledge in one or more disciplines and integrating knowledge and perspectives across disciplinary boundaries.
	PO 6	Demonstrating personal integrity and professional behavior in scholarly endeavors and in collaborating with others within and beyond the academic community.
	PO 7	Acquiring knowledge of specialized topics of interest.
	PO 8	Obtaining efficiency to pursue a research career in an emerging field of the present world.

Program	Outcome Code	Outcomes
M.Sc.	PO 1	Evaluating the role of science, mathematics, technology, and engineering in addressing current issues facing local and global communities, for example climate change, health and disease, food security, sustainable energy use.
	PO 2	Working effectively in groups to meet a shared goal with people whose disciplinary and cultural backgrounds differ from their own.
	PO 3	Communicating clearly and convincingly about scientific and technological ideas, practices and future contributions to expert and non-expert audiences, matching the mode of communication to their audience.
	PO 4	Being able to identify the field in which higher education can be pursued and integrating towards science and technology activities.
	PO 5	Applying disciplinary or interdisciplinary learning across multiple contexts, integrating knowledge and practice.
	PO 6	Identifying a research career through the knowledge of PG level projects.

PROGRAM SPECIFIC OUTCOMES

Program Specific	Outcome Code	Outcomes
B.A. Tamil	PSO 1	Understanding Tamil Grammar, improving Communication skills in Tamil and learning about Tamil culture and history.
	PSO 2	Nurturing various literary competencies through the classical poets'various linguistic styles.
	PSO 3	Learning classical Tamil grammar.
	PSO 4	Inculcating altruistic ideas through various works of art.
	PSO 5	Getting the students to gain an in-depth knowledge so that they can shine in all spheres.
	PSO 6	Providing a maximum of employment opportunities using Tamil both as a local language and global language.

Program Specific	Outcome Code	Outcomes
B.A. English	PSO 1	Enabling the students to understand the properties and functions of language.
	PSO 2	Instilling phonological competence in students.
	PSO 3	Getting the students acquainted with English grammatical forms and functions.
	PSO 4	Getting the students acquainted with morphological concepts and processes.
	PSO 5	Making students aware of basic concepts in syntactic and semantic levels of language.
	PSO 6	Helping the learners to apply the science of pronunciation and oral forms of English language.

Program Specific	Outcome Code	Outcomes
B.A. Historical Studies	PSO 1	Understanding the basic themes, concepts, chronology and the Scope of Indian History.
	PSO 2	Getting acquainted with a range of issues related to Indian History that span distinct eras.
	PSO 3	Understanding the history of the countries other than India with comparative approach.
	PSO 4	Thinking and arguing historically and critically in writing and holding discussions
	PSO 5	Preparing for various types of Competitive Examinations
	PSO 6	Critically recognizing the Social, Political, Economic and Cultural aspects of History.

Program Specific	Outcome Code	Outcomes
B.A. Economics	PSO 1	Being able to understand the basic concepts of Economics.
	PSO 2	Being able to analyze the economic behavior in practice and enabling Thinking in relation to Economics
	PSO 3	Enhancing the ability to analyze historical and current events from an economic perspective.
	PSO 4	Augmenting the ability to write clearly expressing an economic point of view.
	PSO 5	Creating an awareness about alternative approaches to economic problems through exposure to coursework in allied fields.
	PSO 6	To create students' ability to suggest their own solutions to various economic problems.

Program Specific	Outcome Code	Outcomes
B.A. Political Science	PSO 1	Understanding and identifying the names of geographic locations of the most contemporary states.
	PSO 2	Enabling the students to explain the central concepts of modern western political thought.
	PSO 3	Discussing the evolution of constitutional law and its interpretation as it is related to the issues of gender.
	PSO 4	Identifying and describing the major theories of the public organization and bureaucratic behaviour.
	PSO 5	Analyzing and comparing the negative and positive impact of globalization on the world.
	PSO 6	Discussing how political factors shape policy formulation and implementation.

Program Specific	Outcome Code	Outcomes
B.Com.	PSO 1	Demonstrating a grasp of theory, technically based skills and ethical perspectives relevant to core business areas, including marketing, statistics, financial accounting, management accounting, finance, economics, information systems, strategic management, organizational behavior, and commercial law.
	PSO 2	Showing the basic understanding of subjects related to marketing, statistics, financial accounting, management accounting, finance, economics, information systems, strategic management, organizational behavior and commercial law.
	PSO 3	Developing own principles on models useful in business and commerce.
	PSO 4	Understanding and ability to apply the subject matter in hypothetical situations.
	PSO 5	Evaluating strengths and weaknesses, solving problems and making recommendations in business and commercial practices.
	PSO 6	Showing the ability to influence people and/or organizations in relation to business and commercial practices.

Program	Outcome Code	Outcomes
B.Com. **(Cooperation)**	PO 1	Enabling the students to gain fundamental knowledge of co-operation.
	PO 2	To provide high quality education in Co-operation and preparing students for higher education.
	PO 3	To enhance the professional competencies of the students.
	PO 4	To develop among students, sensitivity to contribute to the betterment of society through knowledge in Cooperation.
	PO 5	To prepare and train students in a manner which converts them into a future-ready for work
	PO 6	Understanding the co-operative finance, banking and general information about Salesmanship.

Program Specific	Outcome Code	Outcomes
B.Sc. Mathematics	PSO 1	To be able to explain the core ideas and techniques of Mathematics at the college level.
	PSO 2	Being able to apply rigorous, analytic, highly numerical approach to analyzing, executing tasks and solving problems in daily life and at work.
	PSO 3	Enabling students to recognize the power of abstraction and generalization, and carry out investigative mathematical work with independent judgment.
	PSO 4	Enabling students to communicate effectively about mathematics to both lay and expert audiences utilizing appropriate information and communication technology.
	PSO 5	Goading on students to work independently, and collaborate effectively in team work and team building.
	PSO 6	Enabling students to conduct self-evaluation, and continuously enrich themselves through lifelong learning.

Program Specific	Outcome Code	Outcomes
B.Sc. Physics	PSO 1	Imparting a clear knowledge about mechanics of macroscopic and microscopic bodies.
	PSO 2	Clarifying the Concept of heat, transmission of heat, kinetic theory of gases and laws of thermodynamics.
	PSO 3	Teaching the concepts of optics, such as interference and diffraction properties of light and acquiring the knowledge of handling optical instruments.
	PSO 4	Making basic principles of electricity and magnetism clear and applying the concepts in energy applications.
	PSO 5	Inculcating the principles of atomic physics and exploring their knowledge of identification of structures and energy levels using X-rays and lasers for various spectroscopic studies.
	PSO 6	Imparting the concept of semiconductors and making the operation of amplifiers & basic electronic circuits clear.

Program Specific	Outcome Code	Outcomes
B.Sc. Chemistry	PSO 1	Providing knowledge about organic molecules and their reaction mechanisms
	PSO 2	Disseminating basic principles in Inorganic chemistry and imparting knowledge of properties of various elements and their compounds.
	PSO 3	Understanding the various laws of thermodynamics, kinetics of reactions, thermochemistry, colligative properties and phase diagrams.
	PSO 4	Teaching the concept of spectroscopy and its applications in day-to-day life.
	PSO 5	Knowledge of analytical and pharmaceutical chemistry.
	PSO 6	Understanding the importance of environmental and green chemistry.

Program Specific	Outcome Code	Outcomes
B.Sc, Plant Biology & Plant Bio-Technology	PSO 1	Comprehending the introduction and history of biotechnology.
	PSO 2	Disseminating the scope in agriculture, medicinal, agriculture and environment.
	PSO 3	Making clear the cell biology and the basic structural and functional study of prokaryotic and eukaryotic cells.
	PSO 4	Giving a thorough idea about the growth, nutrition and factors affecting microbial growth.
	PSO 5	Clarifying the basic requirements of microorganisms and further its classification.
	PSO 6	Enabling students to understand the Structure and organization of cell membrane.

Program Specific	Outcome Code	Outcomes
B.Sc. Computer Science	PSO 1	To attain knowledge and understanding the principles of programming for applying in broad range of languages and open source platforms.
	PSO 2	To improve the ability of imparting knowledge in various domains and solve real world problems with modern technological tools.
	PSO 3	Understanding the programming concepts and methodology & the functionality of hardware and software aspects of computer systems.
	PSO 4	Providing effective and efficient real time solutions using acquired knowledge in various domains such as C, C++, JAVA, Web designing, etc.
	PSO 5	Providing a technical training, through a range of educational activities, to develop a range of transferable skills applicable to employment.
	PSO 6	Helping students Emerge as Network Administrator / Manager and function as Data Base Administrator.

Program Specific	Outcome Code	Outcomes
BCA	PSO 1	Being able to develop historical knowledge about generations and basic architectures of computer
	PSO 2	Acquiring knowledge to write the assembly language programme in microprocessors.
	PSO 3	Understanding the fundamental concepts of C, C++ programming and OOPS.
	PSO 4	Knowing the basic concepts of Data Structures, Java and computer graphics.
	PSO 5	Being able to understand Visual Basic programmes, RDBMS concepts and Normalization, OS structures, process and CPU scheduling
	PSO 6	Developing hands-on knowledge of multimedia systems, software engineering, web technology and mobile computing.

PROGRAM SPECIFIC OUTCOMES – Post Graduate Programs

Program Specific	Outcome Code	Outcomes
M.A. Tamil	**PSO 1**	Understanding Phonetics, Phonology, Syntax, Semantics, Stylistics and Etymology.
	PSO 2	Improving moral thoughts, discipline and patriotism
	PSO 3	Familiarizing students with Sangam literature comprising some of the oldest extant Tamil literature, and dealing with love, traditions, war, governance, trade and bereavement.
	PSO 4	To create linguistic consciousness.
	PSO 5	To understand how Arts and history define Tamils as people.
	PSO 6	To show the inseparability of Tamil with the past.

Program Specific	Outcome Code	Outcomes
M.A. English	PSO 1	Getting acquainted with the language, style, dialogue structure of the age to which it belongs.
	PSO 2	Demonstrating an appropriate level of expertise in literary history, literary theory, and rhetoric.
	PSO 3	Demonstrating a high-level proficiency in literary research and in the synthesis of research.
	PSO 4	Showing critical and analytical skills in the interpretation and evaluation of literary texts.
	PSO 5	Nurturing a command over academic English, including the abilities to a) organize and present material in a cogent fashion, b) formulate and defend original arguments, c) employ effectively the language of their discipline and d) write under time constraints.
	PSO 6	Developing a reading knowledge of at least one foreign language.

Program Specific	Outcome Code	Outcomes
M.A. Political Science	**PSO 1**	Learning the concepts and theories of political scientists and studying the phenomena in the discipline.
	PSO 2	Understanding the nature of politics, public values and the institutions and process of politics in their various forms.
	PSO 3	Appreciating the knowledge and civic responsibilities required for effective participation in political life.
	PSO 4	Demonstrating knowledge and understanding of the nature and significance of politics and governance.
	PSO 5	Applying the concepts and theories used in the study of political science to the analysis of interests, ideas, institutions and behavior.
	PSO 6	Helping students acquire knowledge of the different phenomena, research methods used to investigate political phenomena and ability to apply these methods.

Program Specific	Outcome Code	Outcomes
M.A. Historical Studies	PSO 1	Understanding and evaluating the complexities of historical developments of various nations, societies and cultures.
	PSO 2	Getting the students acquainted with research skills, methodologies, philosophy of history and historiography as being a professional historian and researcher.
	PSO 3	Learning to evaluate the historical narratives with comparative methods.
	PSO 4	Understanding Indian history and world history with the scientific, critical and rational approaches.
	PSO 5	Understanding values of unity in diversity, multiculturalism, multi-religiosity, secularism and humanism which are inherited in Indian Culture and upheld by our Constitution.
	PSO 6	Identifying how the Indian culture has contributed to the world human civilization through the Ages.

Program Specific	Outcome Code	Outcomes
M.Sc. Mathematics	PSO 1	Formulating and analyzing mathematical and statistical problems, precisely defin key terms, and drawing clear and reasonable conclusions.
	PSO 2	Reading, understanding and constructing correct mathematical and statistical proof and using the library and electronic data-bases to locate information on mathematical problems.
	PSO 3	Using mathematical and statistical techniques to solve well-defined problems and presenting their mathematical work, both in oral and written format, to various audiences.
	PSO 4	Explaining the importance of Mathematics and its techniques to solve real life problems and providing the limitations of such techniques and the validity of the results.
	PSO 5	Proposing new mathematical and statistical questions and suggesting possible software packages and/or computer programming to find the solutions to these questions.
	PSO 6	Continuing to acquire mathematical and statistical knowledge and skills appropriate to professional activities and demonstrating the highest standards of ethical issues in mathematics

Program Specific	Outcome Code	Outcomes
M.Sc. Physics	PSO 1	Understanding the basic concepts of Classical and statistical mechanics.
	PSO 2	Obtaining knowledge of advanced mathematical methods and theories on various mathematical and Physical problems.
	PSO 3	Understanding the evolution of Quantum mechanics and the transformation between centre of mass and laboratory frame.
	PSO 4	Acquiring knowledge of fundamental aspects of the structure of the nucleus, nuclear reactions.
	PSO 5	Understanding the architecture of basic microprocessor 8085 & 8086 and their functions.
	PSO 6	Acquiring knowledge about Condensed Matter Physics and Nanoscience and Nano technology.

Program Specific	Outcome Code	Outcomes
M.Sc. Chemistry	PSO 1	To understand spectroscopy of various organic compounds.in an elaborate way.
	PSO 2	Acquiring knowledge on various heterocyclic compounds and their reaction mechanisms.
	PSO 3	Knowledge about structural elucidation of various coordination compounds, electrical and magnetic properties of various rare earth compounds.
	PSO 4	Understanding the mechanism of various organic reactions through kinetics
	PSO 5	Understanding the concepts of classical and quantum mechanics and electrochemistry.
	PSO 6	Gaining knowledge of sustainable chemistry and its role in protecting our environment.

Program Specific	Outcome Code	Outcomes
M.Sc. Computer Science	PSO 1	Acquiring knowledge about Design and Analysis of Algorithm, advanced Java programming and quantitative techniques.
	PSO 2	Attaining awareness of Data warehousing and Mining, Software Project Management and multimedia system.
	PSO 3	Obtaining familiarity about Advanced Software Engineering and Advanced Visual Programming.
	PSO 4	Getting hold of Principles of Compiler design, Information Security and Cloud Computing.
	PSO 5	Getting awareness of Mobile Computing, Distributed operating system and Open Source Technologies.
	PSO 6	Understanding the Dot net Technologies and Advanced web Programming.

Program Specific	Outcome Code	Outcomes
M.Sc. Plant Biology & Plant Bio-Technology	PSO 1	Understanding about Algae, Bryophytes, Fungi, Lichen & Plant Pathology.
	PSO 2	Obtaining familiarity on Entrepreneurial Botany and Herbal Botany.
	PSO 3	Acquiring knowledge on Plant Bio-diversity, Plant Morphology and Taxonomy of Angiosperms.
	PSO 4	Understanding the concepts of Plant Biotechnology & Plant Tissue Culture.
	PSO 5	Having an insight of plant physiology & biochemistry, biophysics, bioinformatics & nanotechnology
	PSO 6	Getting the students to know the concepts of Plant Ecology, Phytogeography and Remote Sensing.

COURSE OUTCOME FORMAT

NAME OF THE DEPARTMENT

PROGRAMME	YEAR	SEMESTER	COURSE		COURSE OUTCOME				
			Subject Code	Subject Name	CO 1	CO 2	CO 3	CO 4	CO 5
BA / BSc / BCA / BCom	First Year	I							
		II							
	Second Year	III							
		IV							
	Third Year	V							
		VI							

PROGRAMME	YEAR	SEMESTER	COURSE		COURSE OUTCOME				
			Subject Code	Subject Name	CO 1	CO 2	CO 3	CO 4	CO 5
MA / MSc	First Year	I							
		II							
	Second Year	III							
		IV							