

(Accredited with NAAC A++)

## School of Computer and Information Sciences

### Master of Computer Applications (MCA)

#### Objective

• The broad objective of the MCA programme is to prepare graduate students for productive careers in software industry, academia and research.

Minimum  
Duration

2 Years

Medium of  
Instruction

English

Fees  
Rs.12000/-  
per  
semester

Total:  
Rs.48000/-

#### Eligibility Criteria

(a) Passed BCA / B.Sc(Computer Science/IT)  
/ Bachelor Degree in Computer Science  
Engineering or Equivalent Degree

(b) Obtained atleast 50% marks in the  
qualifying examination (45% marks in  
case of candidates belonging to  
reserved category)

OR

(a) (i) Any Bachelor's degree of minimum 3  
(three) year duration from a  
recognized University AND  
Mathematics as one of the subject at  
10+2 level or graduation level.

(ii) Obtained atleast 50% marks in the  
qualifying examination (45% marks in  
case of candidates belonging to  
reserved category).

(b) Successfully completed PGDCA of IGNOU

Programme Coordinator

**Akshay Kumar**

**School of Computer &  
Information Sciences**

**IGNOU, New Delhi**

**Email: mca@ignou.ac.in**

#### Programme Structure

Course Code	Semester	Theory / Practical	Credits
Semester I			
MCS-211	Design and Analysis of Algorithms	Theory	4
MCS-212	Discrete Mathematics	Theory	4
MCS-213	Software Engineering	Theory	4
MCS-214	Professional Skills and Ethics	Theory	2
MCS-215	Security and Cyber Laws	Theory	2
MCSL-216	DAA and Web Design Lab	Practical	2
MCSL-217	Software Engineering Lab	Practical	2
Semester II			
MCS-218	Data Communication and Computer Networks	Theory	4
MCS-219	Object Oriented Analysis and Design	Theory	4
MCS-220	Web Technologies	Theory	4
MCS-221	Data Warehousing and Data Mining	Theory	4
MCSL-222	OODA and Web Technologies Lab	Practical	2
MCSL-223	Computer Networks and Data Mining Lab	Practical	2
Semester III			
MCS-224	Artificial Intelligence and Machine Learning	Theory	4
MCS-225	Accountancy and Financial Management	Theory	4
MCS-226	Data Science and Big Data	Theory	4
MCS-227	Cloud Computing and IoT	Theory	4
MCSL-228	AI and Machine Learning Lab	Practical	2
MCSL-229	Cloud and Data Science Lab	Practical	2
Semester IV			
MCS-230	Digital Image Processing and Computer Vision	Theory	4
MCS-231	Mobile Computing	Theory	4
MCS-232	Project	Project	12

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<https://ignouadmission.samarth.edu.in/>

[www.ignou.ac.in](http://www.ignou.ac.in)



## School of Computer and Information Sciences

# Post Graduate Diploma in Computer Applications (PGDCA)

### Objective

•The broad objective is to prepare graduate students for productive careers in software industry. The programme's thrust is on giving the students a thorough and sound background in theoretical and application-oriented courses relevant to the latest computer software development.

Minimum  
Duration

1 Year

Medium of  
Instruction

English

Fees  
Rs.10800/-  
per  
semester

Total:  
Rs.21600/-

## Programme Structure

### Eligibility Criteria

Any Bachelor's degree of minimum 3 (three) year duration from a recognized University AND Mathematics as one of the subject at 10+2 level or Graduation level.

OR

Any Bachelor's degree of minimum 3 (three) year duration from a recognized University AND doesn't have Mathematics as one of the subject at 10+2 level or graduation level. These students are required to successfully complete BCS-012 (Graduate level Mathematics course) as Bridge Course.

*Note: It is essential to obtain atleast 50% marks in the qualifying examination (45% marks in case of candidates belonging to reserved category) for admission to MCA. Please refer to eligibility conditions for admission to MCA.*

Programme Coordinator  
**Dr. Sudhansh Sharma**  
 School of Computer &  
 Information Sciences  
 IGNOU, New Delhi  
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Course Code	Course Title	Theory / Practical	Credits
Semester I			
MCS-201	Programming in C and Python	Theory	4
MCS-202	Computer Organisation	Theory	4
MCS-203	Operating Systems	Theory	4
MCSL-204	WINDOWS and LINUX Lab	Practical	2
MCSL-205	C and Python Lab	Practical	2
Semester II			
MCS-206	Object Oriented Programming Using Java	Theory	4
MCS-207	Database Management Systems	Theory	4
MCS-208	Data Structures and Algorithms	Theory	4
MCSL-209	Data Structures and Algorithms Lab	Practical	2
MCSL-210	DBMS and Java Lab	Practical	2

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