



F.G. Science Degree College

A Legacy of Excellence in Education



PROSPECTUS

Wah Cantt, Tel: 051-4531142

*Allah will raise those who have believed among
you and those who were given knowledge by
degrees.*

(Quran 58: 11)



Disclaimer: This Prospectus is informational and should not be taken as binding on the college. The college reserves the right to change the rules applicable to the students whenever it is deemed appropriate or necessary.

PROSPECTUS



WAH CANTT.

Tel: 051-4511032



Mission of FGEI

To provide purposeful and quality education to the wards of Armed Forces personnel as well as of civilians, residing in cantonments/garrisons throughout the country by nurturing fine citizen skills among the students and providing the healthy educational environment, so as to make them useful members of the society.

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INTRODUCTION Of FGEIs

Taken over by the Ministry of Education on 1st June 1975, the Cantonment Board Educational Institutions have their presence in almost every city and town of Pakistan. Due to this change in the chain of command, its employees became Federal Government employees who are civil servants working under Civil Servants Act 1973.

The control and management of these institutions were transferred to GHQ in September 1977. The FGEI(C/G) Directorate is an attached department of Federal Ministry of Defence and has a dual responsibility to deal, at one hand with the GHQ and Military Formations, on the other hand with the Ministry of Defence (MoD). The budget for pay and allowances etc. of the employees as well as for establishing new institutions is provided by the Ministry of Finance through MoD.

Federal Government Educational Institutions Directorate (Cantonments/Garrisons), headed by the Director General of FGEI(C/G), is one of the directorates of the IGT&E's Branch. The administrative structure of the directorate has been changed adding three Brigadiers in total of 12 subordinating Regional Offices to uplift the administrative standard of the overall organization, and to make it the most productive institutions of Pakistan.

The aim of this Directorate is to provide unparalleled educational facilities to the children of Armed Forces Personnel in particular, and the children of civilians residing in the cantonments, in general. The Directorate exercises complete administrative, academic, technical and financial control over all the educational institutions and their employees, in accordance with the policies of the Ministry of Defence/ Establishment Division.

FG Science Degree College, Wah Cantt

A Legacy of Excellence in Education

It was 1986 when on a visit to POF the then Prime Minister, Muhammad Khan Junejo, approached by the representatives of Wah Cantt residents, promised the establishment of another F.G. College to cater to the ever growing demand for a standard educational institution.

FG Science Degree College, located in the heart of Wah Cantt, Pakistan, has been a provider of quality education since 1993. With picturesque green grounds spanning approximately 60 canals, our college offers a serene learning environment. Students can pursue their sporting interests with access to various sports facilities. Our well-equipped science labs enable a practical understanding of scientific principles.

We offer HSSC classes in science groups(for boys only), along with BS Physics and BS IT programs (co-education). Graduates from our college have excelled in their fields, making valuable contributions to society. We are committed to upholding educational excellence and nurturing both academic and personal growth. Join us in achieving your academic and career aspirations.

ADMISSION POLICY

Admission of the HSSC Part-I starts after the declaration of the FBISE results. Exact dates of admission are notified through the national press. Students residing in Wah Cantt area can apply for admission.

Keeping in view the general admission policy as notified by the FGEI Directorate (Cantt & Garrison) admissions to HSSC Part-I (Morning and Evening shifts) shall be governed by the following rules:

1. As directed by the competent authority, all admissions shall be made in accordance with the following quota:

| | | | |
|-----------------------------------|-----|---------------------------------------|-----|
| a. Open Merit | 53% | d. POF/Serving Armed Forces Personnel | 25% |
| b. Retired Armed Forces Personnel | 10% | e. Defence Paid Employees | 10% |
| c. Disability quota | 2% | f. FGEI(C/G) Serving over and above | |
2. Candidates seeking admission are required to submit the following recent documents along with their admission forms:
 - a. Children of Civilians residing in Cantonment areas shall have to submit a residence certificate from the Cantonment Board, Wah.
 - b. Children of Serving Army Personnel/MES employees shall be required to attach a recent service certificate from concerned Fmn/Unit etc.
 - c. Children of Retired Armed Forces Personnel shall attach a copy of Pension Book and Discharge Certificate.
 - d. Children of serving FGEI (Cantt & Garrison) Employees shall submit a recent certificate from the Head of Office/Institution.
 - e. Children of Serving Civilians Paid out of Defense Estimates shall be required to furnish a recent certificate from the concerned office that they are being paid out of Defense Estimates. Expired certificates will not be entertained.

3. Re-admission to HSSC First Year will not be allowed except in cases where a student could not appear in first year examination owing to medical reasons. An intimation in this respect will be given to the college well in time.
4. Candidates of senior Cambridge, O/A Level examinations will be granted admission subject to the availability of seats .Admission will be confirmed only after the results are available.
5. Admission forms will not be issued /received after expiry of the stipulated date.
6. Only students with more than 60% marks in SSC Examination are eligible to apply in Pre-Medical, Pre-Engineering and General Science Group at HSSC level. Students who have appeared in Humanities group at SSC Level are not eligible for admission in General Science and Computer Science Groups.
7. Candidates who apply for Economics, Statistics and Computer Science groups must have secured 60% marks with Science Subjects in SSC.
8. Candidates with a minimum of 50% marks in SSC are eligible to apply in Humanities group with an exception of mentioned category in clause (h).("No. of seats available in a category to which a candidate belongs and his merit therein according to the marks obtained by him are the basic consideration for admission").
9. Migration from local colleges will not be allowed.
10. Candidates who appeared from any board other than FBISE will have to submit their migration certificate within a week after admission, otherwise College administration will not be responsible for any delay in Registration Card or Roll No. slips.
11. If the candidate get themselves admitted in two institutions simultaneously, they will have to get their admission terminated in any one and will have to provide related documents to the college office, otherwise Board/University will not issue Registration Card or Roll No. slip due to dual registration and College authorities will not be responsible for any delay.

12. Incomplete admission form or forms containing incorrect or false information shall stand rejected forthwith. If at any stage it comes to light that admission has been secured on fake documents, the admission shall stand cancelled forthwith.
13. Candidates, who wish to be considered for more than one group, shall have to submit separate forms for each group (Pre-Engg, Pre-Medical, G. Science etc.) within the stipulated period.
14. Acceptance of application form will not necessarily mean acceptance of a candidate for admission. In their own interest, candidates are advised to apply for admission to other local colleges as well.
- 15. FEE ONCE DEPOSITED WILL NOT BE REFUNDED.**
16. Maximum Age limit for HSSC-I is 18 years.

REQUIRED DOCUMENTS

1. Two copies of marks sheet duly attested by a gazetted officer.
2. Three recent photographs (1"x1" blue background).
3. Two copies of Character Certificate duly attested by the Principal of the school/college last attended.
4. College leaving certificate, in original, if the candidate is joining the college after migration from another college.
5. One copy of complete pension book in case of retired armed forces personnel.
6. Migration certificate in original, in case the applicant has passed his SSC examination from a board other than the Federal Board Islamabad is to be submitted at the time of admission.
7. **All Original documents, marks sheet, original pension book etc, must be provided at the time of interview for verification.**
8. Two copies of CNIC/ Form B of candidate and father.

ADMISSION PROCEDURE

1. Admission forms duly completed in all respects are received by the college till the stipulated date announced by the FGEI Directorate. Incomplete forms stand rejected forthwith.
2. Lists of names of candidate eligible for interview are displayed and dates of interviews are announced.
3. A candidate stands formally admitted to the college after his form has been signed by the Principal and he has paid all college dues by the stipulated date.

GENERAL INSTRUCTIONS FOR ADMISSION

1. Acceptance of an application form does not necessarily mean acceptance of a candidate for admission.
2. In their own interest, candidates are advised to apply for admission to other colleges as well.
3. Admission form containing incorrect or false information shall stand rejected even after a candidate has paid admission fee.
4. The college does not admit students on casual basis.
5. The college does not accept students under migration from colleges in Rawalpindi and Islamabad.
6. The Principal reserves the right to refuse admission to any candidate without any reason.
7. No forms will be shifted from one group/category to another in any case.

STUDENT MAY BE REFUSED ADMISSION IF

They do not fulfill the basic condition of merit/admission as prescribed by the FGEI Directorate or the college, for the year in which admission is sought. Admission in General Science and Computer Science Group will not be granted to an applicant appearing in Humanities group at SSC level.

SUBJECTS OFFERED/SCHEME OF STUDIES

Candidates must refer to the group of subjects while filling the admission form. They are warned that change in the subject, once offered, is not permitted except in very special circumstances within 15 days after admission. Due care, therefore, should be taken in the selection of subjects offered.

Note: Foreign students are offered Pakistan Culture in place of Urdu with Advance English, Pakistan Nationals who have stayed abroad for three or more years may take Salees Urdu with Advance English. Minorities are offered Ethics in place of Islamiyat.

ELECTIVE SUBJECT COMBINATION FOR HSSC CLASSES

COMPULSORY SUBJECTS (SCIENCE/ARTS)

| | | |
|------------------|--------------|-----------|
| English | Part I & II | 200 Marks |
| Urdu | Part I & II | 200 Marks |
| Islamic Studies | Part I Only | 50 Marks |
| Pakistan Studies | Part II Only | 50 Marks |

GROUP COMBINATIONS HSSC

- **ELECTIVE SUBJECTS (PRE-MEDICAL)**

- | | | |
|------------|--------------|------------|
| 1. Physics | 2. Chemistry | 3. Biology |
|------------|--------------|------------|

- **ELECTIVE SUBJECTS (PRE-ENGINEERING)**

- | | | |
|------------|--------------|----------------|
| 1. Physics | 2. Chemistry | 3. Mathematics |
|------------|--------------|----------------|

- **ELECTIVE SUBJECTS (COMPUTER SCIENCE)**

- | | | |
|----------------|-----------------------|----------------|
| 1. Mathematics | 2. Physics/Statistics | 3. Computer Sc |
|----------------|-----------------------|----------------|

UNDERGRADUATE PROGRAMS (CO-EDUCATION)

- **BS PHYSICS**

- **BS CS**

BS PROGRAMMES

INTRODUCTION TO BS PROGRAMME

BS four year programme is termed as undergraduate programme comprising eight semesters. In first two years, certain pre requisite courses of literature, Maths, Computer, etc., provide general knowledge and a foundation of variety of subjects prior to focusing on a specific field of study. In the third year, courses that lead to specialization are introduced. On the completion of four years and fulfillment of the university requirements, a student is awarded undergraduate degree.

UNDERGRADUATE STRUCTURE OF EDUCATION

The HEC has outlined major policy guidelines for the implementation of uniform semester system in the country. Following is the basic structure of undergraduate programme:

| | |
|---|--|
| Total No. of Credit Hours(Min) | 124 |
| Total No. of Credit Hours(Max) | 140 |
| Semester Duration | Min. 16 weeks of teaching excluding examination |
| Course Duration | Min. of 8 semesters / 4 years as per accreditation body |
| Extension of time limit | Max. time limit of 6 years, further extendable for one year with the approval of Statuary bodies |
| Semester Session | For Deficiency/failure/repetition of max. 2 courses of 3 CH each |
| Course Load Per Semester for r Reg. Full-Time Students | 15-18 Credit Hours |
| Min 160 and mx. 180 – above credit hours for five-year degree prog. Subject to meeting the req. of respective accreditation councils to meet the international standards. | |

CREDIT HOURS FOR UNDERGRADUATE AND GRADUATE DEGREES

1. A credit hour means teaching/ learning a theory course for one hour each week throughout the semester.
2. One CH in lab. or practical work/ project would require lab contact of three CRs per week.
3. The Credit hours are denoted by two digits within a bracket with a hyphen/plus in between.
4. The first digit represents the theory part while the second digit (right side digit) represents the practical work. Thus 4(3+1)/4(3-1) means a total of 4 CH, of which, 3 are of theory while one CH is for Lab./ Practical work.

COURSE LAYOUT FOR UNDERGRADUATE PROGRAMME (120-140 CH)

1. All undergraduate degree programmes are composed of 124-140 CH
2. Min. of 160 and Max. of 180 CH for 5-years degree programme subject to meeting the req. of respective Accreditation Council.
3. Courses are classified into two categories: Foundation or General Courses and Major or Core Courses (from area of specialization).
4. A total of 78-87 CH must be earned taking a sequence of introductory, intermediate and advanced level courses prescribed for the major area of concentration.
5. The courses for social and basic sciences disciplines will consist of seventy percent of general curriculum leading towards discipline specific areas.
6. Engineering/ Technology programme will consist of 70% of curriculum towards the discipline specific areas of concentration as req. by Accreditation Councils. All undergraduate programmes have a required component of 8-9 courses of 22-25 CH of general education.

7. All students can follow the HEC policy regarding weightage for foundation, elective, major and core courses available on HEC Website.
8. An undergraduate degree programme usually includes theory courses, community work/ thesis/ research report/ project and internship.
 - a. **THEORY:** A theory course is of 3 to 4 CRs as per requirement of the discipline.
 - b. **PROJECT:** Every student has to write a report thesis or complete a project in the final year up to max. 6 CRs .individually on a research topic approved by the faculty.
 - c. **INTERNSHIP:** students are encouraged to do internship in a relevant academic, research or business organization, relating to the discipline chosen for specialization, of maximum of 3 CH offered in any upper division semester as per requirement of the discipline.

REPEATING COURSES/ IMPROVEMENT OF CGPA

1. If a student gets 'F' grade, he/ she will be required to repeat the course or its recommended alternative, if any. However, "F" grade obtained earlier will also be recorded on the transcript.
2. Undergraduate students may be allowed to repeat a course in which he/she has obtained grade below "C". In such a case both the previous and new grades obtained will be recorded on the transcript; however, only the higher grade shall be calculated for CGPA. The institution may define maximum number (<6) of courses that a student may be allowed to repeat in an eight-semester degree programme.
3. A graduate student (MS/ M.Phil.) with a 'C' grade can repeat the course to improve the grade. Each institution may define the maximum number of courses (<3) that a student may repeat. In such a case, both the course and the grade obtained will be recorded on the transcript, however, only the better grade shall be calculated in the CGPA. In case of CGPA improvement, it would be recorded with (Imp) on the transcript.

ATTENDANCE

1. Attendance in classes is mandatory, especially in a semester system. Each institution may develop a policy for minimum attendance (>75%) in a course to complete the requirements of the university.
2. The instructor may report a student's absences and the student may be placed on attendance probation by his/ her dean/ HOD and it will be notified by the department.
3. A student may be dropped from the university for violating the terms of such probation.

EXAMINATION SYSTEM

1. In each semester, students may be required to appear in quizzes, tests, mid-terms, final examination, presentations. Group discussions and submit project/ assignments/lab reports.

The weightage may be determined on the basis of following guidelines:

| Nature of Examination | Weightage(Min/Max) |
|---|--------------------|
| Quizzes | 5-10% |
| Mid-Semester Examination | 20-25% |
| Assignments/Presentations/Practical | 5-25% |
| Sessional | 10-15% |
| Final Exams | 35-40% |
| In case of a course with the composition of 4(3+1), 3 CH theory and 1 CH practical, the weightage for the practical may be considered 25% | |

2. In a semester system, the faculty awards the grade according to the instructions provided in the syllabus. Each university will evolve an honor code for faculty to ensure objectivity and ethical authenticity of grades assigned.
3. There is no supplementary or special exam in a semester system; if a student fails in a course, he/ she is required to repeat it.

FRACTIONALIZED GRADING POLICY:

Following GPA/CGPA and percentage is recommended for adoption:

| Grade | Grade Points | Percentage |
|--------------|---------------------|-------------------|
| A | 3.67-4.00 | 85 and above |
| A- | 3.34-3.66 | 80-84.99 |
| B+ | 3.01-3.33 | 75-79.99 |
| B | 2.67-3.00 | 71-74.99 |
| B- | 2.34-2.66 | 68-70.99 |
| C+ | 2.01-2.33 | 64-67.99 |
| C | 1.67-2.00 | 61-63.99 |
| C- | 1.31-1.66 | 58-60.99 |
| D+ | 1.01-1.30 | 54-57.99 |
| D | 0.10-1.00 | 50-53.99 |
| F | 0.00 | Below 50 |

ALLOCATION OF SEATS:

A total of 50 seats are available with following distribution:

| Sr. No. | Category | Quota %age | Intake |
|----------------|----------------------------|-------------------|---------------|
| 1. | No. of Seats | | 50 |
| 2. | Open Merit | 80% | 40 |
| 3. | Reserved Seats | 20% | 10 |
| Details | | | |
| 1. | Serving Army Personnel/POF | 10% | 5 |
| 2. | Retired Army Personnel | 4% | 2 |
| 3. | Shuhada | 3% | 1 |
| 4. | FGEI Employees | 2% | 1 |
| 5. | Students with Disabilities | 1% | 1 |

BS PROGRAMMES

BS PHYSICS

BS Physics is a 4 Year Degree Programme designed to provide students with sound understanding of fundamental concepts in physics, including: classical mechanics and electromagnetism, thermodynamics and statistical physics, principles of waves and optics, and quantum mechanics.

DURATION

4 Year Programme with total of 8 Semesters. Each year will have 2 semesters i.e. Spring and fall semesters.

TOTAL CREDIT HOURS: 135

ADMISSION CRITERIA & ELIGIBILITY

An individual holding an HSSC certificate from a Pakistani board or any equivalent certificate from any recognized institute with at least 1st division or its equivalent grade is eligible for admission. Selection shall be merit based. However, preferences will be given to those candidates who have studied Maths and Physics as an elective subject at intermediate level.

Note: The College is affiliated with (NUP) National University of Pakistan) for BS Programmes.

***DG FGEL, (C/G) Major General Qaisar Suleman
during his visit to the college***



***RD Wah, Colonel Abdul Wali
during his visit to the college***



National and International Days Observance



National and International Days Observance



State-of-the-Art Facilities



IT Lab



Library



IT Lab



Physics Lab

State-of-the-Art Facilities



Biology Lab



Chemistry Lab



Smart Class Rooms



*Col Yasir
Addressing Annual Prize Distribution Ceremony*



*Muhammad Rehan, XII Pre-Engineering,
Winner of Inter-Directorates English Declamation*



*Fatima Sajid, Topper BS Physics Semester-I,
receiving cash prize from Principal Azhar Kaiser*



*Ahmad Ali, Topper BSCS semester-I,
receiving cash prize from Principal Azhar Kaiser*



*Position Holders of All Pakistan
Software Dev Competition organized by FGSDC*



*FGEIs Zonal Cricket Tournament
Organised by FGSDC*



Tree Plantation Drive at FGSDC



*Tug-of-War between FG Degree College
& FG Science Degree College*

Career Counseling



BS PHYSICS
SCHEME OF STUDIES FOR EIGHT SEMESTERS

| | Course Code | Course Title | CH | Course Type |
|---------------|---------------------|--|-----------|-------------|
| YEAR-I | SEMESTER-I | | | |
| | Gen 1001 | English-I (Reading and Writing Skills) | 3 | Comp-1 |
| | Gen 1002 | Pakistan Studies | 2 | Comp-2 |
| | Gen 1003 | Islamic Studies/Ethics | 2 | Comp-3 |
| | Math 1001 | Calculus-I | 3 | Comp-4 |
| | Phys 1001 | Mechanics | 3 | Found-1 |
| | Phys 1002 | Waves and Optics | 3 | Found-2 |
| | Phys 1601L | Physics Lab-I | 1 | Found-3 |
| | Credit Hours | | 17 | |
| | SEMESTER-II | | | |
| | Gen 1004 | English-II (Composition Writing) | 3 | Comp-5 |
| | Math 1002 | Calculus-II | 3 | Comp-6 |
| | Phys 1003 | Thermal Physics | 3 | Found-4 |
| | Phys 1004 | Electricity and Magnetism | 3 | Found-5 |
| | Phys 1602L | Physics Lab-II | 1 | Found-6 |
| | Math 1003 | Probability and Statistics | 3 | Gen-1 |
| | Credit Hours | | 16 | |

| | | | | |
|---------|---------------------|-----------------------------------|-----------|----------|
| YEAR-II | SEMESTER III | | | |
| | Phys 2003 | Chemistry/Natural Science | 3 | Gen-2 |
| | Phys 2001 | Quantum Physics | 3 | Found-7 |
| | Math 2003 | Differential Equations | 3 | Gen-3 |
| | Math 2004 | Analytical Geometry | 3 | Gen-4 |
| | Gen 2005 | Introduction to Computing | 3 | Comp-7 |
| | Phys-2603L | Physics Lab-III | 1 | Found-8 |
| | Credit Hours | | 16 | |
| | SEMESTER-IV | | | |
| | Phys 2002 | Modern Physics | 3 | Found-9 |
| | Phys 2003 | Basic Electronics | 3 | Found-10 |
| | Phys 2904 | Physics Lab-IV | 1 | Found-11 |
| | Math 2005 | Linear Algebra | 3 | Gen-5 |
| | Gen 2006/Gen 2007 | Humanities/ Social Science | 3 | Gen-6 |
| | Math 2004 | Applied Mathematics | 3 | Gen-7 |
| | Credit Hours | | 16 | |
| | SEMESTER-V | | | |
| | Phys 3101 | Classical Mechanics | 3 | Maj-1 |
| | Phys 3501 | Mathematical Methods of Physics-I | 3 | Maj-2 |
| | Phys 3401 | Solid State Physics-I | 3 | Maj-3 |
| | Phys 3701 | Electronics-I | 3 | Maj-4 |
| | Phys 3605L | Physics Lab-V | 2 | Maj-5 |
| | Phys 3502 | Computational Physics-I | 3 | Maj-6 |
| | Credit Hours | | 17 | |

| | | | | |
|---------|---------------------------|------------------------------------|------------|----------|
| YEAR-IV | SEMESTER-VI | | | |
| | Phys 3503 | Mathematical Methods of Physics-II | 3 | Maj-7 |
| | Phys 3402 | Solid State Physics-II | 3 | Maj-8 |
| | Phys 3301 | Quantum Mechanics-I | 3 | Maj-9 |
| | Phys 3504 | Computational Physics-II | 3 | Maj-10 |
| | Phys 3702 | Electronics-II | 3 | Maj-11 |
| | Phys 3606 L | Physics Lab-VI | 2 | Maj-12 |
| | Credit Hours | | 17 | |
| | SEMESTER-VII | | | |
| | Phys 4302 | Quantum Mechanics-II | 3 | Maj-13 |
| | Phys 4403 | Statistical Physics | 3 | Maj-14 |
| | Phys 4201 | Classical Electrodynamics-I | 3 | Maj-15 |
| | Phys 4303 | Nuclear Physics-I | 3 | Maj-16 |
| | Phys xxxx | Elective-I | 3 | Elective |
| | Phys xxxx | Elective-II | 3 | Elective |
| | Credits Hours | | 18 | |
| | Semester-VIII | | | |
| | Phys 4404 | Solid State Physics-III | 3 | Maj-17 |
| | Phys 4202 | Classical Electrodynamics-II | 3 | Maj-18 |
| | Phys 4304 | Nuclear Physics-II | 3 | Maj-19 |
| | Phys 4102 | Relativity and Cosmology | 3 | Maj-20 |
| | Phys xxxx | Elective-III | 3 | Elective |
| | Phys xxxx | Elective-IV | 3 | Elective |
| | Credit Hours | | 18 | |
| | Total Credit Hours | | 135 | |

LIST OF ELECTIVE COURSES

Elective courses will be offered from the following list by the Department of Physics in view of availability of instructors and related resources. More titles in the list of elective courses can be added from time to time subject to the approval by relevant academic bodies.

| Course Code | Course Title | CH | Course Type |
|-------------|--------------------------------|----|-------------|
| Phys 4305 | Introductory Particle Physics | 3 | Elective |
| Phys 4306 | Relativistic Quantum Mechanics | 3 | Elective |
| Phys 4405 | Topics in Solid State Physics | 3 | Elective |
| Phys 4406 | Advanced Solid State Physics | 3 | Elective |
| Phys 4308 | Quantum Information Theory | 3 | Elective |
| Phys 4703 | Introduction to Photonics | 3 | Elective |
| Phys 4309 | Quantum Solid State Magnetism | 3 | Elective |
| Phys 4310 | Quantum Electronics | 3 | Elective |
| Phys 4103 | Astrophysics | 3 | Elective |
| Phys 4607 | Medical Physics | 3 | Elective |

BS CS

BS CS is a 4-year degree program covering computer programming, database management, network security, web development, system analysis, and information systems. Students gain a comprehensive understanding of fundamental CS concepts, preparing them for careers in software development, cybersecurity, and more.

DURATION

4 Year Programme with total of 8 Semesters. Each year will have 2 semesters i.e. Spring and fall semesters.

TOTAL CREDIT HOURS: 130

ADMISSION CRITERIA ELIGIBILITY

An individual holding an HSSC certificate from a Pakistani board or any equivalent certificate from any recognized institute with at least 1st division or its equivalent grade is eligible for admission. Selection shall be merit based. However, preferences will be given to those candidates who have studied Mathematics as an elective subject at intermediate level.

Note: The College is affiliated with (NUP) National University of Pakistan) for BS Programmes.

BSCS
SCHEME OF STUDIES FOR EIGHT SEMESTERS

| Course Name | Term/ Semester/ Year # | Credit Hour / Marks |
|---------------------------------------|-------------------------------|----------------------------|
| Introduction to Computers | Semester 1 | 3 |
| Fundamentals of Algorithms | Semester 1 | 3 |
| Introduction to Economics | Semester 1 | 3 |
| Introduction to Calculus | Semester 1 | 3 |
| English Comprehension | Semester 1 | 3 |
| Pakistan Studies | Semester 1 | 1 |
| Introduction to Computer Programming | Semester 2 | 3 |
| Discrete Mathematics | Semester 2 | 3 |
| Calculus and Analytic Geometry | Semester 2 | 3 |
| Technical and Business Writing | Semester 2 | 3 |
| Financial Accounting | Semester 2 | 3 |
| Islamic Studies | Semester 2 | 1 |
| Data Structures | Semester 3 | 3 |
| Introduction to Computer Architecture | Semester 3 | 3 |
| Fundamentals of Management | Semester 3 | 3 |
| Introduction to Marketing | Semester 3 | 3 |
| Multivariable Calculus | Semester 3 | 3 |
| Communication Skills | Semester 3 | 3 |
| Operating Systems Concepts | Semester 4 | 3 |
| Data Communication | Semester 4 | 3 |
| Data Base Systems | Semester 4 | 3 |

| | | |
|--------------------------------|------------|---|
| Organizational Behavior | Semester 4 | 3 |
| Marketing Management | Semester 4 | 3 |
| Statistics and Probability | Semester 4 | 3 |
| Software Engineering I | Semester 5 | 3 |
| Object Oriented Programming | Semester 5 | 3 |
| Multimedia Technologies | Semester 5 | 3 |
| Telecommunication Systems | Semester 5 | 3 |
| Human Resource Management | Semester 5 | 3 |
| Business Finance | Semester 5 | 3 |
| Web Design and Development | Semester 6 | 3 |
| Software Engineering II | Semester 6 | 3 |
| Computer Networks | Semester 6 | 3 |
| Distributed Data Base Systems | Semester 6 | 3 |
| Entrepreneurship | Semester 6 | 3 |
| Financial Management | Semester 6 | 3 |
| Software Project Management | Semester 7 | 3 |
| Modern Programming Languages | Semester 7 | 3 |
| E-Commerce | Semester 7 | 3 |
| Elective I | Semester 7 | 3 |
| Elective II | Semester 7 | 3 |
| Quantitative Business Analysis | Semester 7 | 3 |
| Project | Semester 8 | 6 |
| Psychology | Semester 8 | 3 |

FEE RULES/STRUCTURE

1. **Fee once paid is not refundable.**
2. All official receipts must be kept in safe custody because they may be checked anytime.
3. College leaving certificate (CLC) is issued only after all dues have been paid. A student is expected to have paid fee up to the month during which CLC is issued. A student is required to collect security fee while taking the CLC.
4. A student is required to inform the college immediately if he decides to discontinue studies, failing which, she will continue to run in arrears of fee which will have to be cleared before CLC is issued and the security deposit refunded.
5. The security deposit shall stand lapsed, in favour of the college after one year of declaration of final examination results.

PAYMENT OF FEE / FINE

Until his name is formally withdrawn, a student is liable to pay the college fee and fines levied upon him. A student absenting himself without leave application for more than six working days is liable to have his name struck off from the college roll.

FEE COLLECTION DATES

Fee challan is issued by the college office and deposited in the bank at the time of admission. Fee is collected in advance for all disciplines.

FEE CONCESSION

1. The Principal has the power to remit only half of the tuition fee of a limited number of deserving students.
2. Good conduct and satisfactory progress in studies are essential requirements for the grant of financial assistance.
3. Fee concession may be withdrawn for misconduct, irregularity and poor academic performance.
4. Half tuition fee concession is granted to the students whose siblings are studying in the institution of FGEI (Cantt\Garrison).
5. Application for fee concession must be made on the prescribed form available from the college office and it must be countersigned by the father/mother of the applicant and duly verified by his/her employer in respect of monthly emolument.

FEE STRUCTURE AND SCHEDULE
(subject to reschedule from time to time as per rules)

a. HSSC

| Sr. No. | Detail | HSSC (Pre Engg/Med) | HSSC (FCS) | Remarks |
|--------------|--------------------|------------------------|----------------|--------------|
| | Admission Fee | 40/- | 40/- | On Admission |
| | Tuition Fee | 480/- | 480/- | Per month |
| | Inst Dev Fund | 3480/- | 3480/- | |
| | Exam Fund | 960/- | 960/- | |
| | IT | 840/- | 1200/- | |
| | CSF | 4200/- | 4200/- | |
| | RDF/CDF | 1200/- | 1200/- | |
| | RSF | 1200/- | 1200/- | |
| | Sec (R) | 210/- | 210/- | |
| | Board Registration | 1500/- | 1500/- | |
| Total | | 14110/- | 14470/- | |

FEE STRUCTURE AND SCHEDULE
(subject to reschedule from time to time as per rules)

b. BS

| BS PHYSICS | | |
|-------------------|---------------|----------------|
| Govt. Fee | | 490/- |
| University Dues | | 18000/- |
| College Fund | Admin Fund | 7600/- |
| | Student Fund | 670/- |
| | Academic Fund | 2870/- |
| Regional Fund | RDF | 390/- |
| | Security | 900/- |
| G. Total | | 30920/- |

| BS COMPUTER SCIENCE | | |
|----------------------------|---------------|----------------|
| Govt. Fee | | 490/- |
| University Dues | | 18000/- |
| College Fund | Admin Fund | 7600/- |
| | Student Fund | 670/- |
| | Academic Fund | 8870/- |
| Regional Fund | RDF | 390/- |
| | Security | 900/- |
| G. Total | | 36920/- |

COLLEGE RULES & REGULATIONS

ACADEMIC SESSION

The academic session of the college commences in August each year and ends in June the next year.

ATTENDANCE AND LEAVE

1. 75% attendance is mandatory for eligibility in the FBISE / The University of Punjab Examination.
2. A student absents himself from the college without permission / application will be fined @ Rs. 10 per Period.
3. Leave shall be granted on application duly signed by the parents. It must mention.
 - a. Roll No & Name of Student
 - b. Class
 - c. Section
 - d. Class Teacher
 - e. Subjects
 - f. Time Period
4. Government Hospital Medical Certificate (MC) should be attached to the application in the following cases:
 - a. Illness lasting for 5 days or more.
 - b. Illness immediately after admission and before and after the spring, summer and winter vacation.
 - c. Illness during exams, and monthly tests.

5. The name of the student who is irregular in attending the classes will be dropped from the roll after three warnings, even if it is an optional subject.

TESTS AND EXAMINATIONS

Tests are held at regular intervals every month and at the end of each term. Proper record of the performance of a student is maintained.

A student found using unfair means in tests/examinations shall stand disqualified forthwith and will be required to re-appear in all the papers in re-examination, if allowed by the Principal.

PROMOTION

The admission of a student will not be sent if he does not show progress in Pre-Board/University Exams.

1. From HSSC-I To HSSC-II
2. FBISE rules will be followed for promotion to HSSC-II

FEDERAL BOARD AND HOME EXAMS

Name of a student who fails to qualify in three or more than three subjects is detained and is not eligible for re-admission.

DISCIPLINE RULES

1. It is obligatory for students to abide by the rules of the college. A student may be dropped from the roll for any of the following reasons.
 - a. Nonpayment of fee.
 - b. Irregularity in class even if it is an optional class or games.
 - c. Misbehavior or general misconduct.
 - d. Showing no progress in studies.
 - e. Remaining absent for three consecutive tests.
 - f. Being without proper uniform.
 - g. Failing in 3 or more subjects in promotion exams.
 - h. Every member of the Faculty has the right to check the students for the maintenance of Discipline. Disciplinary cases will be fined.
2. Misbehavior spoils the prestige of the college and disrupts the smooth running of the college. A student showing such a behavior may be dropped from the roll or rusticated.
3. It is the responsibility of all the students to keep the College environment clean and tidy. Therefore, no littering or trash should be carelessly thrown or left in the college premises. The designated waste bins should be used for this purpose.
4. The students are advised to refrain from any damage to the college fixtures/furniture including venetian blinds, scribbling/carving/writing on desks/chairs, wall chalking and misusing lab equipment.
5. The students are advised to strictly follow the code of conduct on the field and off the field while taking part in sports and other co-curricular activities. Students are expected to exhibit exemplary behaviour, especially while representing the college in an activity/competitions.
6. College students are not allowed to leave the college premises before 1:30 pm except on Fridays.

7. A student desiring to leave the college must apply in writing. Such application must be duly signed by his parents or guardian.
8. No one will be admitted to the college unless he has signed the declaration printed in the admission form and has paid all dues.
9. Students whose names are dropped from the roll will not be re-admitted or allowed to enter the college.
10. Students of HSSC Part-II, who have failed in the final exams will not be re-admitted.
11. Students wishing to drop out should clear all the dues and get the college leaving certificate and security fee.
12. Students are not allowed to see visitors in the college.
13. Anybody who disturbs the educational environment of the institution by shouting, whistling, or howling is liable to disciplinary action under college conduct rules.
14. Those found guilty of disobedience, rudeness, to the principal, or members of the faculty or leaving the college without the permission of the Principal, will be rusticated without any notice to the parents.
15. Damage done to the college property is to be made up by the student responsible.
16. Visitors and Parents are not allowed to enter the class rooms.
17. Students are not allowed to bring mobile phones to the college.
18. Complaints must be lodged with the Principal and not with the faculty.
19. Parents can see the Principal from 10:00 am to 12:00 noon on working days.
20. Parents are requested not to make representation for admission and promotion. The policy for admission / Promotion laid down by the directorate of Federal Government Education Institutions (Cantt / Garrisons) is followed strictly.
21. It is hoped that the parents would co-operate with the Principal in the maintenance of the College discipline.

22. Students are not allowed any combination of subjects other than those given in the prospectus.
23. No personal functions are permitted to be arranged by the students in the college premises.
24. Students must carry the college identity card all the time in the college. It can be checked any time.
25. Registration card, result cards and other documents must be kept safe by the students.
26. No student of the college is allowed to be member of any political organization outside the college.
If a student is found active in any political organization, the college reserves the right to strike off his name from the college roll.
27. Students not appearing in Pre-Board / Pre-University send up exams will be fined @ Rs. 100 per paper. Fine for monthly test is Rs. 50 per test.

PARENTS' RESPONSIBILITIES

1. Parents are expected to share their part of responsibility by remaining in contact with the college administration through PTMs. The college is not bound to communicate to them every incident in which their son is involved.
2. Parents are expected to see the Principal whenever called upon to do so. Reports sent to them should not be treated as a matter of routine since they indicate symptoms which need to be cured before it is too late. It is always advisable to be in touch with the college administration personally or over the telephone, if a misconduct report is received by them.
3. Parents must inform the college about any change in their postal address, and telephone number, The college assumes no responsibility if letter sent to them is not delivered or is lost in transit due to change of postal address.

SERVICES

LIBRARY

1. College students are entitled to use the library books which are issued for seven days only. Unless otherwise permitted, a student who retains a book for more than 7 days will be fined Rupees 5 per day until the book is returned or re-issued.
2. A book if not required by others may be re issued to the same borrower. To get it re-issued the student must first present the book to the librarian for necessary entries.
3. Book specially reference books or periodicals and magazines are not issued. Not more than two books are issued at a time.
4. A student who damages or loses a book shall be liable to pay double the cost or replace the book or the whole set of the series as the case may be.
5. The library will be closed once for annual stock checking. All books must be returned at the time of stock checking.
6. Silence and Discipline must be maintained in the library and the reading room. Willful violation of library rules may result in the expulsion of the defaulter.

At the time of admission, every student is provided a library card. If the card is lost, it should be immediately brought to the notice of the librarian. A new card is issued on payment of Rs 20/-. The library card is nontransferable.

CAFETERIA

College provides the facility of cafeteria for students. Good quality food is available. Hygienic conditions are strictly observed for the wellbeing of students.

SPORTS & CO-CURRICULAR ACTIVITIES

Ample facilities are available for students to participate in both indoor and outdoor games including volley ball, basketball, badminton and table tennis. Students are encouraged to participate in Inter Class, Inter Collegiate, Inter Board and Inter University competitions.

SOCIETIES

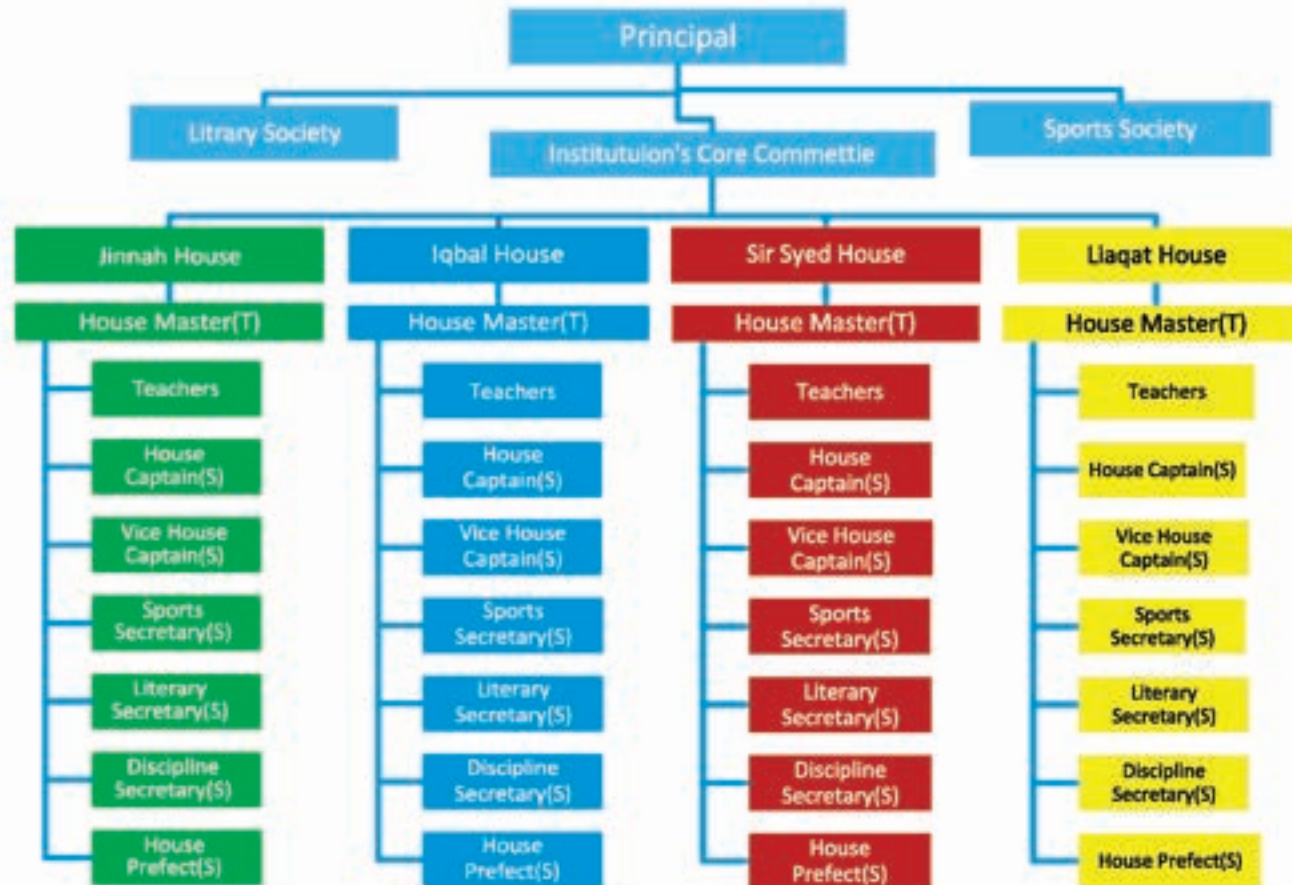
A number of societies exist in the college. These societies operate on academic lines and are purely for academic objectives. The societies voluntarily contribute to the activities of the college. Students acquire general knowledge, receive practical training and build up self-confidence through these activities.

1. Islamic Studies Society
2. English Literary Society
3. Urdu Literary Society
4. Computer/Modern Education Society
5. Sports Society

HOUSES SYSTEM

The aim of houses system is to conduct structured academics, co-curricular and extra-curricular competitions within institutions to explore and polish latent talent of the students and teachers through healthy and progressive competitions.

ORGANOGRAM OF HOUSES SYSTEM



STUDENT COUNCIL

The council members are selected by the Principal and Faculty of the college .A student who is not good in studies or indulges in political activities or does anything against the interest of the college will not be considered for selection.

College Student Council comprising students selected from all classes is charged with the responsibility to instill sense of discipline among college students. All cases of indiscipline and reports of misconduct are referred to the College Discipline Committee by the Student Council.

The council consists of senior most staff members with the Principal as its Chairman.

| | |
|-------------------|-----------|
| Mr. Azhar Kaiser | Chairman |
| Mr. Muhammad Riaz | Secretary |
| Mr. Zafar Iqbal | Member |
| Mr. Abul Bashar | Member |

COLLEGE UNIFORM

B) College Uniform

College uniform is a part of pledge signed by the student at the time of admission. The students after securing admission will prepare two pair of uniform to keep themselves neat and clean all the time in the college. The student shall present himself in complete uniform, along- with a spare set of uniform at the time of interview. The uniform of the college is as under:

I. Summer

| | |
|---|------------------------------|
| Grey Trousers | Black Belt with Plain Buckle |
| White Shirt | Black Shoes with Black Socks |
| HSSC Maroon tie with Aqua Blue Stripes (picture placed on www.fgei-cg.gov.pk) | |
| BS Black tie with Aqua Blue wide Lining (picture placed on www.fgei-cg.gov.pk) | |

II. Winter

| | |
|---|------------------------------|
| Grey Trousers | Black Belt with Plain Buckle |
| White Shirt | Black Shoes with Black Socks |
| Navy Blue Blazer or Jersey | without design |
| HSSC Maroon tie with Aqua Blue Stripes (picture placed on fgei-cg.gov.pk) | |
| BS Black tie with Aqua Blue wide Lining (picture placed on fgei-cg.gov.pk) | |

Note: Stylish jackets even of blue colour are not allowed; otherwise these will be confiscated and will not be returned

POINTS TO REMEMBER

1. Candidates shall have to submit separate forms for each group (Pre-Engineering, Pre-Medical, General Science, Computer Science etc.).
2. Forms will not be shifted from one group/category to another.
3. No change of subjects will be allowed after 15 days.
4. The students may be required to take an aptitude test if considered necessary.
5. Studying Science at SSC level is mandatory for admission in General Science & Computer Science Group.
6. Students not wearing prescribed uniform will be fined Rs. 20/- per day.
7. Absentee fine is Rs. 10/- per period.
8. Use of mobile phone in the college is strictly prohibited. Confiscated mobile phones will not be returned.
9. Admission fee once deposited will not be refunded.
10. Students not appearing in pre-Board / pre-University & send up exams will be fined @ Rs. 100/- per paper. Fine for monthly test is Rs. 50/- per test.

FACULTY

| | | | |
|---|--|---|---|
| Principal Mr. Azhar Kaiser | | Vice Principal Mr. Muhammad Riaz | |
| FACULTY OF ENGLISH | | | |
| 1 | Mr. Muhammad Riaz, Associate Professor MA (English) MA (Pol.Science) MA (Islamiyat) B.Ed, (M.Ed) Ph: 0300-5820171 | 2 | Mr. Himayat Ali Associate Professor MA English (Silver Medalist) Shah Abdul Latif University, Sindh B.Ed (University of the Punjab) |
| 3 | Mr. Shahzad Anser, Assistant Professor M.A (English) University of Punjab Ph: 0300-5113026 | | |
| FACULTY OF URDU | | | |
| 1 | Mr. Zafar Iqbal, Associate Professor MA Urdu (Punjab) M.Phil (AIOU) Ph: 0300-9180033 | 2 | Mr. Ahmad Rizwan (Lecturer) M.A Urdu (University of Sargodha) M.Phil Education (Southern Punjab University, Multan Ph. 0302-3568611 |
| 3 | Mr. Tasawar Abbas M.Phil Urdu (GCUF) Ph. 0344-0868283 | | |
| FACULTY OF ISLAMIC STUDIES | | FACULTY OF STATISTICS | |
| 1 | Dr. Abul Bashar, Assistant Professor B.Ed (AIOU), Fazil Arabic (Rwp Board) M.A Islamiyat (I.U.U.I), M.Phil Arabic (I.U.U.I) Ph.0333-5728041 | 1 | Mr. Ijaz Ahmed Mirza, Assistant Professor M.Sc. Statistics, I.U.B Ph: 0321-9546757 |

| FACULTY OF MATHEMATICS | | | |
|-----------------------------|---|---|--|
| 1 | Mr. Tahir Mehmood Associate Professor Msc Mathematics (P.U), B.Ed Ph. 0306-5757092 | 2 | Mr. Muhammad Rafique, Assistant Professor M.Sc Mathematics (Punjab), M.Ed Ph: 0301-5847286 |
| 3 | Dr. M. Husnain Shahzad Lecturer PhD Mathematics (P.U) Ph. 0342-8776115 | | |
| FACULTY OF COMPUTER SCIENCE | | | |
| 1 | Mr. Muhammad Umair, Assistant Professor, MCS, Comsats, MS, FAST Ph: 0345-9548262 | 2 | Ms. Rohama Javed Lecturer MSCS, Comsats, Wah |
| 3 | Mr. Muhammad Musa Lecturer MSCS, CUI, Wah Ph. 0332-5161090 | | |
| FACULTY OF PHYSICS | | | |
| 1 | Mr. Shabraiz Hussain, Assistant Professor M.Sc Physics, University of Balochistan M.Ed Ph: 0333-7941664 | 3 | Dr. Muhammad Farooq Assistant Professor MS Physics, Comsats Wah PhD Scholar Comsats Islamabad Ph: 0300-5780198 |
| 2 | Dr. Faisal Mehmood, Lecturer M.S.c Physics, PU, Lahore Ph.D Physics, IIU, Islamabad Ph: 0301-5224868 | | |
| FACULTY OF CHEMISTRY | | | |
| 1 | Dr. Muhammad Ashfaq Ahmad Lecturer, PhD University of Wah Ph: 0333-5532711 B.Ed (AIU), M.Ed (University of Sargodha) | 2 | Mr. Javed Iqbal, SST M Phil Chemistry, BZU, Multan Ph: 0340-7576551 |

| FACULTY OF BIOLOGY | | | |
|--|--|------------|---------------|
| 1 | Syed Khalid Hassan Kazmi, Assistant Professor MSc. Zoology, University of Balochistan B.Ed Ph: 0345-4464478 | | |
| FACULTY OF HEALTH & PHYSICAL EDUCATION | | | |
| 1 | Mr. Ghulam Mustufa, Assistant Professor MSc Physical Education, AIOU, Islamabad Ph: 0312-5417536 | | |
| LIBRARY STAFF | | | |
| 1 | Mr. Muhammad Inam Raja Ph: 0302-8981370 | Librarian | MLIS, MEd |
| OFFICE STAFF | | | |
| 1 | Mr. Sheeraz Khan Ph: 0300-9180955 | Accountant | BA Statistics |
| 2 | M. Khurram Javed Ph.: 0304-5108591 | LDC | BA Statistics |

ACHIEVEMENTS

PRIZES AND MEDALS

Medals are awarded to HSSC-II/BS students for all round achievement in

1. Academics
2. Extra-Curricular Activities
3. Regularity during the session.
4. Gold Medal for 1st Position in Board/University.
5. Silver Medal for 2nd Position in Board/University.
6. Bronze Medal for 3rd Position in Board/University.

BOOK PRIZES ARE AWARDED TO THE STUDENTS WHO

1. Stand first in college in the Board/University.
2. Stand first in the aggregate of the three exams during the two year HSSC and four year BS Programme.
3. Stand first in each subject on the basis of the aggregate of three examinations provided the student gets 60% or above marks in the specific subject and gets through in all the other subjects in each examination.
4. Merit Certificates are given for best performance in academics, Qirat, Naat, Debates, Dramas and Games.

RESULTS & DISTINCTIONS

Academic Excellence

Categorized as “GOOD” FBISE Islamabad for Academic Environment and overall Education System for 2018.

Winner of 3rd Position among all Pakistan F.G. Colleges (CAT-II) for HSSC.

HSSC Results 2022

| Roll Number | Name of Student | Group | Obtained Marks |
|--------------------|------------------------|-----------------|-----------------------|
| 509867 | Shaiz Jamil | Pre-Medical | 990 |
| 510058 | Adnan Butt | Pre-Medical | 951 |
| 509867 | Muhammad Talha | Pre-Medical | 949 |
| 520428 | Muhammad Anas Butt | Pre-Engineering | 965 |
| 521537 | Muhammad Usman | Pre-Engineering | 964 |
| 518092 | Zohaib Mazhar | Pre-Engineering | 963 |
| 533300 | Muhammad Ayaz | Science General | 924 |
| 537154 | Syed Zohaib Mazhar | Science General | 923 |

*Farewell Gathering in honour of
Professor Shabbar Nazir (Biology)*



