

**Executive Summary of Self-Assessment Report (SAR) of  
Bachelor of Science (MATH, STAT, ECO) Program  
Directorate of Quality Enhancement (DQE)  
Virtual University of Pakistan**

Virtual University of Pakistan established in 2002 with aim to provide extremely affordable world class education to aspiring students all over the country regardless of their physical location by alleviating the lack of capacity in the existing universities while simultaneously tackling the acute shortage of qualified professors in the country using free-to-air satellite television broadcasts and the Internet. To pursue this aim the department of management sciences is designated to initiate and implement Self-Assessment process designed by Quality Assurance Agency (QAA) of HEC. The current document summarizes the findings of self-assessment process of B.Sc. (MATH, STAT, ECO) program.

The department is committed to produce graduates who can lead organizations towards success and prosperity in global market place. The department follows its vision in all of its courses and areas of specialization that offered at both Masters and Bachelors levels. The department feels satisfied upon completion of the following list of tasks:

1. Development of **Self-Assessment Report (SAR)** by Program Team for B.Sc. (MATH, STAT, ECO) program
2. Conduct of critical review and submission of **Assessment Report (AR)** by Assessment Team for B.Sc. (MATH, STAT, ECO) program
3. Development of **Rectification Plan** by Head of Department

The tasks were completed according to the set methodology through Program and Assessment Teams nominated by the Rector on the recommendation of the Department.

### **Methodology**

The following methodology is adopted to complete the whole SAR cycle:

1. A Program Team (PT) was nominated for the program. Initial orientation and training sessions for all members were arranged by DQE. The composition of PT is given in Table 1:

**Table 1: Program Team**

Sr.#	Name	Designation
1.	Mr. Zulfiqar Ahmed Noor (Coordinator)	Lecturer (Mathematics)
2.	Mr. Syed Muhammad Muslim Raza	Instructor (Statistics)
3.	Ms. Munazza Ahmed	Lecturer (Economics)

2. All the relevant material such as SAR manual, survey forms, etc. was provided to PT.

3. Continuous support, guidance and feedback were provided to PT members to prepare the SAR for said program.
4. After completion and submission of the final SAR by PT, an Assessment Team (AT) was formed by the Rector on the recommendation of the Department. Accordingly, a Subject Specialist from other institution was also included. The composition of AT is given in Table 2:

**Table 2: Assessment Team**

Sr.#	Name	Designation
1.	Dr. Muhammad Noor ul Ameen	Assistant Professor, Department of Statistics, COMSATS, Lahore
2.	Ms. Samina Saghir	Lecturer (Management Sciences), Virtual University of Pakistan
3.	Mr. Mansoor Khurshid	Lecturer (Mathematics), Virtual University of Pakistan
4.	Mr. Javed Iqbad	Lecturer (Statistics), Virtual University of Pakistan

5. The SAR developed by PT was forwarded to AT for critical review.
6. After completion of critical review and assessment of the SAR, AT members visited the department and had a meeting with PT.
7. After the visit, AT submitted a report and feedback form (Rubric Form) to DQE.
8. DQE forwarded the observations & findings of AT report to the Head of Department for developing a rectification plan.
9. DQE will now monitor implementation of Rectification Plan.

#### **Parameters for the SAR:**

The SAR is prepared on the following eight (8) criteria prescribed by the HEC:

- Criterion 1: Program Mission, Objectives and Outcomes Criterion
- Criterion 2: Curriculum Design and Organization Criterion
- Criterion 3: Laboratory and Computing Facility Criterion
- Criterion 4: Student Support and Advising Criterion
- Criterion 5: Process Control Criterion
- Criterion 6: Faculty Criterion
- Criterion 7: Institutional Facilities Criterion
- Criterion 8: Institutional Support

#### **Key Findings of the SAR:**

Following is the summary of the key SAR findings:

##### **Academic Observations:**

1. Modification is required in the documented program mission, vision objectives, and outcomes of program to make these components clearer and measurable.

2. Surveys to collect feedback from graduating students are either not conducted or results are not reported.
3. There is no specific HEC curriculum for such program available at University level and most of the university converted this program into 4-years program, therefore, the compatibility and sustainability of this program is under question.
4. Formal career counseling is not sufficient. For the career counseling of students, seminars and workshops should be organized at least once in a semester and experts from industries and organizations should be invited.
5. Presently there are PhD faculty members available for Mathematics section but for other two section of program such faculty is not available.
6. The program is offered under the Faculty of Management Sciences. Technically, this program should fall under the Faculty of Basic Sciences.
7. The eligibility criteria need to revisit to include / exclude the students with F.A. or equivalent qualification background.
8. The order of offering of Economics courses needs to be reshuffled semester-wise. For example, Principles of Micro-Economics (ECO302) should be in first semester and Mathematical Economics (ECO406) in 2<sup>nd</sup> semester.
9. The criteria of the student faculty ratio should be clearly defined.
10. The documented outcomes and progress of program should be shared with PT and AT periodically, maybe after each semester.

#### **Administrative Observations:**

- Faculty development incentives are not sufficient; for instance, faculty should be encouraged with flexible timings or with half paid salaries to peruse Ph.D. programs
- Lack of time for research activities is identified as a main weak area of job description of faculty associated with Virtual university of Pakistan.

#### **Conclusion and Recommendations:**

While analyzing Criteria Referenced Self-Assessment, it has been found that performance of the department is satisfactory but still there many gray areas which keep it from performing well. However, it is reflected in terms of moderate overall assessment score (66/100) reported by AT. This average score demands that the rectification plan should be implemented immediately.

In the report, need improvement areas are identified by AT. Few criteria are rated low and become a major reason for this moderate score. The criterion rated low is about Institutional Support. The absence of enough PhD faulty members, least time for research

and limited access to digital resources and physical library are the areas where AT has great concerns.

The Need Improvement areas identified during self-assessment process have been reported to the Head of respective Department and the specific rectifications have also been requested. DQE will follow up the implementation plan as per the specific time-frame.

---

Rizwan Saleem Sandhu  
Deputy Director, DQE

Advisor QEC: \_\_\_\_\_

The Rector: \_\_\_\_\_