

Module Title:	Quality Management for Pharmacy
Language of Instruction:	English
Credits:	5
NFQ Level:	7
Module Delivered In	1 programme(s)
Teaching & Learning Strategies:	This module will be delivered in two one hour lectures and two one hour computer practical classes per week. Lectures will provide a structured framework for the learning outcomes and to explain concepts. The practical computing sessions will allow students compute statistics, produce quality control charts and use quality management digital solutions for the pharmacy.
Module Aim:	The aim of this module is to give students a thorough understanding of quality management systems which promote best practice in the provision of pharmacy services.
Learning Outcomes	
<i>On successful completion of this module the learner should be able to:</i>	
LO1	Describe the process model of quality, different quality management systems, standardisation and continuous quality improvement methodologies.
LO2	Select and use problem solving techniques, statistical process control tools and quality management principles.
LO3	Use software applications for data analysis, statistical quality control and quality management solutions for the pharmacy.
Pre-requisite learning	
Module Recommendations <i>This is prior learning (or a practical skill) that is recommended before enrolment in this module.</i>	
No recommendations listed	
Incompatible Modules <i>These are modules which have learning outcomes that are too similar to the learning outcomes of this module.</i>	
No incompatible modules listed	
Co-requisite Modules	
No Co-requisite modules listed	
Requirements <i>This is prior learning (or a practical skill) that is mandatory before enrolment in this module is allowed.</i>	
No requirements listed	

Module Content & Assessment

Indicative Content

Fundamental Quality Concepts

Definitions of Quality Control, Quality Assurance and Quality Management. Total Quality Management (TQM). Definition and classification of quality costs. Process model of quality and continuous quality improvement.

Quality Standards

Definition of standards and standardization. Rationale, development and structure of standards. Standards supporting innovation. ISO 9000 family of standards, ISO 9000 - Quality Management Principles, ISO 9001 - Quality Management Systems Requirements. National and international bodies including PSI, HSE, HPRA, NSAI, INAB, ISO, HIQA and EIQA. National Standards for Safer Better Healthcare. Development of PSI Standards. EFQM Model. Quality Audits and the Pharmacy Assessment System.

Management

Levels of management, roles and responsibilities. Pharmacy team, employee motivation, leadership and managing change. Safety, Health and Welfare at Work Act 2005. Operational Standards for Pharmacies. Employee training and certification schemes.

Quality Engineering

Problem solving techniques for process improvement including Pareto analysis, Vendor rating schemes, Flowcharting and Cause and effect analysis. Introduction to Six Sigma and Lean. The DMAIC process. Lean Toolbox.

Statistical Process Control

Data and measurement. Summary statistics and presentation of data. Acceptance Sampling. Principles of Statistical Process Control (SPC). Control Charts for Variables: average and range charts, pre-control chart, cumulative sum control chart (CUSUM) and multi-vari charts. Control charts for Attributes: np, p, u and c charts. Interpretation and design of charts. Process Capability Analysis.

Practicals

Software applications for data analysis, statistical process control and digital solutions to pharmacy quality management.

Assessment Breakdown	%
Continuous Assessment	50.00%
Practical	50.00%

Special Regulation

Students must achieve a minimum grade (35%) in both the CA and practical components of the course.

Continuous Assessment

Assessment Type	Assessment Description	Outcome addressed	% of total	Assessment Date
Other	Assignments and quizzes.	1,2	50.00	n/a

No Project

Practical

Assessment Type	Assessment Description	Outcome addressed	% of total	Assessment Date
Practical/Skills Evaluation	Practical assignments in Data Analysis and Statistical Process Control. Production of a Quality Management portfolio.	1,2,3	50.00	n/a

No End of Module Formal Examination

Continuous Assessment

Assessment Type	Assessment Description	Outcome addressed	% of total	Assessment Date
Other	Assignments and quizzes.	1,2	50.00	n/a

No Project

Practical

Assessment Type	Assessment Description	Outcome addressed	% of total	Assessment Date
Practical/Skills Evaluation	Practical assignments in Data Analysis and Statistical Process Control. Production of a Quality Management portfolio.	1,2,3	50.00	n/a

No End of Module Formal Examination

Module Workload

Workload: Full Time		
<i>Workload Type</i>	<i>Frequency</i>	<i>Average Weekly Learner Workload</i>
Lecture	12 Weeks per Stage	2.00
Practicals	12 Weeks per Stage	2.00
Independent Learning Time	15 Weeks per Stage	5.13
Total Hours		125.00

Workload: Part Time		
<i>Workload Type</i>	<i>Frequency</i>	<i>Average Weekly Learner Workload</i>
Lecture	12 Weeks per Stage	2.00
Practicals	12 Weeks per Stage	2.00
Independent Learning Time	15 Weeks per Stage	5.13
Total Hours		125.00

Module Delivered In

Programme Code	Programme	Semester	Delivery
CW_SAPHF_D	Bachelor of Science in Pharmacy Technician Studies	2	Mandatory