Program-level "Student Learning Outcomes" Assessment Plan for Curricular Programs

Program: **Pharmacy Technology**

Department(s): **Health Science**

College: **Malcolm X College**

Degree(s): **Advance Certificate**

Plan Time Frame: **2016 - 2018 TO 2018-2021**

1. **Program Mission Statement:**
The program's mission is to provide quality and affordable academic and clinical training in the field of Pharmacy Technology in service to vulnerable communities, including the elderly children, and terminally ill

2. **Course Learning Outcomes (CLO):**

    1. Prepare computerize data entry, billing, purchasing and inventory management
    2. Practice technology in accordance with pharmacy laws, regulations and professional standards
    3. Use pharmaceutical and medical terms, abbreviations and symbols commonly used in the prescribing and dispensing of medications
    4. Apply critical thinking skills, creativity and innovation to solve problems
    5. Compare and contrast the roles of pharmacist & pharmacy technicians in ensuring pharmacy department compliance with professional standards.
    6. Demonstrate and describe standards of ethics maintain patient confidentiality in accordance with HIPPA.
    7. Describe the basic dosage forms and route of administrations for medications.
    8. Work collaboratively with pharmacy team in order to maintain the scope of practices

3. Pharmacy Technology Program - Assessment Plan and Curriculum Map

Key: I = Introduced; R = reinforced and opportunity to practice; M = mastery at the senior or exit level; A = assessment evidence collected; X= Student learning outcome

Courses	PSLO 1 pharmacy calculations	SLO 2 computer prescription processing	SLO 3 med safety	SLO 4 infect control	SLO 5 pharm knowledge	SLO 6 Med Dispensing Pharm laws & regs	SLO 7 Adjudicate third party	SLO 8 Excellent soft and interpersonal skills
Phar Tc 101	X, R, M		X, R		X, A, R	X, R		
Phar Tc 102	X, A, I		X, I		X, A, I	X, I		
Phar Tc 103	X, A, I	X, I	X, I	X, I	X, A, I	X, 1	X, I	X, I
Phar Tc 104	X, A, I				X, A, I			X, R
Phar Tc 113		X, A, I	X, R		X, A, I	X, R	X, I	X, I
Phar Tc 121		X,R	X, R		X, A, I	X, R		
Phar Tc 201			X, R		X, A, R	X, A, R		
Phar Tc 202	X, A, I	X, I	X, I	X, A, R, M,	X, A, I	X, I		X, I
Phar Tc 204	X, A, M	X, A, M	X, A, M	X, A, M	X, A, M	X, A, M	X, A, M	X, A, M
Phar Tc 205	X, A, M	X, A, M	X, A, M	X, A, M	X, A, M	X, A, M	X, A, M	X, A, M

Program Learning Outcome

Upon completion of this course, the student will be able to:

1. Graduate will perform pharmaceutical calculations
2. Graduate will illustrate computerized prescription processing.
3. Graduate will be able to practice medication safety,
4. Graduate will be able to articulate and apply the principles of infection control.
5. Graduates will possess a comprehensive knowledge of pharmacology
6. Graduates will adjudicate third party insurance with accuracy and honesty

7. Graduates will demonstrate excellent interpersonal/communication skills and professional behavior.
8. Graduate will practice medication dispensing in accordance with pharmacy law and regulations

Strategies to assess Program-level student learning. Gather evidence in the aggregate about how well students have mastered the learning outcomes.

Course	Course Description	Mapped to PLO/CLO Learning Objectives	Assessment Tool	Benchmark
PHAR-TC 101	Principles and characteristics of drugs, including physical and chemical properties, dosage calculations, effects and reactions, toxicity, emergency procedures and methods of administration. Writing assignments, as appropriate to the discipline, are part of the course.	PLO: 1,2,3,4,5,8 CLO: 3,4	Formative and Summative Assessment: Quiz, Discussion Board. Summative Assessment: Midterm and Final.	80% of student meet satisfactory or higher (70% is benchmark for national exam)
PHAR-TC 102	Fundamental biological and biochemical principles as applied to allied health personnel. Writing assignments, as appropriate to the discipline, are part of the course.	PLO: 2,3,4,5,8 CLO: 1,3,4	Formative and Summative Assessment: Quiz, Lab, Minute Paper, and Muddiest Point. Summative Assessment: Midterm and Final	80% of student meet satisfactory or higher (70% is benchmark for national exam)
PHAR-TC 103	This course introduces students to the field of pharmacy technology. Included is an overview of the Pharmacy Technician certificate program, definition of the pharmacy technician's role, and a review of opportunities open to the pharmacy technician. Writing assignments, as appropriate to the discipline, are part of the course.	PLO: 1,2,3,4,5,6,7,8 CLO: 1,2,3,5	Formative and Summative Assessment: Quiz, Discussion Board. Summative Assessment: Midterm and Final.	80% of student meet satisfactory or higher (70% is benchmark for national exam)
PHAR-TC 104	Designed to provide mathematical tools for students enrolled in the pharmacy technology program. Emphasis is on practical aspects of mathematics and less upon the theoretical. Topics include,	PLO: 1,3,8	Formative and Summative Assessment: Quiz,	80% of student meet satisfactory or higher (70% is benchmark for national exam)

	but are not limited to: fundamentals of measurement and calculation; interpretation of prescription or medication order; the metric system; calculation of doses; reducing and enlarging formulas; and percentage and ratio calculation. Writing assignments, as appropriate to the discipline, are part of the course.	CLO: 3,4	Discussion Board. Summative Assessment: Midterm and Final.	
PHAR-TC 113	Provides basic understanding of the person/pharmacy computer prescription processing software and the development of keyboarding skills. Learn to produce all requisite documentation for the pharmacy. Writing assignments, as appropriate to the discipline, and part of the course.	PLO: 2,3,5,6,7,8 CLO: 3,4,6	Formative and Summative Assessment: Quiz, Discussion Board. Summative Assessment: Midterm and Final.	80% of student meet satisfactory or higher (70% is benchmark for national exam)
PHAR-TC 121	Provides basic communication skills and pharmacy practice including verbal, nonverbal communication. Communication barriers, listening/empathic responding, assertiveness, interviewing assessment, patient outcomes, communications with special patients/children about medications are explored in this profession. Writing assignments, as appropriate to the discipline, are part of the course.	PLO: 3,7,8 CLO: 3,4,6	Formative and Summative Assessment: Quiz, Discussion Board. Summative Assessment: Midterm and Final.	80% of student meet satisfactory or higher (70% is benchmark for national exam)
PHAR-TC 201	Overview of legal aspects of the pharmacy practice, including a review of the Federal Controlled Substances, Act and Illinois statues, rules and regulations. Writing assignments, as appropriate to the discipline, are part of the course.	PLO: 3,4,6,8 CLO: 2,3,5	Formative and Summative Assessment: Quiz, Discussion Board. Summative Assessment: Midterm and Final.	80% of student meet satisfactory or higher (70% is benchmark for national exam)
PHAR-TC 202	Fundamentals and specifics of drug distribution in hospital and retail pharmacies, including bulk compounding, packaging, quality control, inventory control, drug storage and a variety of drug delivery systems. Mathematical calculations for basic pharmacy operations. Writing assignments, as appropriate to the discipline, are part of the course.	PLO: 1,3,4,5,8 CLO: 2,3,8	Formative and Summative Assessment: Quiz, Lab, Minute Paper, and Muddiest Point. Summative Assessment:	80% of student meet satisfactory or higher (70% is benchmark for national exam)

			Midterm and Final	
PHAR-TC 204	This course is designed to provide employment skills as a concurrent and integral part of a student's educational program in pharmacy technology. Supervised work experience in ambulatory care pharmacy practice is provided by applying the knowledge and training learned in related pharmacy technology courses. Training also involves progression from role of observer to assistant, then to relative independence under the direct supervision of a registered pharmacist and clinical coordinator. Writing assignments, as appropriate to the discipline, are part of the course.	PLO: 1,2,3,4,5,6,7,8 CLO: 1,2,3,5,6,7	Formative and Summative Assessment: Quiz, Discussion Board. Summative Assessment: Midterm and Final.	80% of student meet satisfactory or higher (70% is benchmark for national exam)
PHAR-TC 205	This course is designed to provide employment skills as a concurrent and integral part of a student's educational program in pharmacy technology. Supervised work experience in ambulatory care pharmacy practice is provided by applying the knowledge and training learned in related pharmacy technology courses. Training also involves progression from role of observer to assistant, then to relative independence under the direct supervision of a registered pharmacist and clinical coordinator. Writing assignments, as appropriate to the discipline, are part of the course.	PLO: 1,2,3,4,5,6,7,8 CLO: 1,2,3,5,6,7,8	Formative and Summative Assessment: Quiz, Discussion Board. Summative Assessment: Midterm and Final.	80% of student meet satisfactory or higher (70% is benchmark for national exam)

	RUBRICS		RESULTS			ACTIONS

ACTIVITY	NUMBER STUDENTS	BENCHMARK SCORE(90 QUESTIONS)	# THAT MET BENCHMARK	% PASSED	ACTION PLAN
PTCB PRACTICE EXAM(1) 12/16	#14	70%	#4	29%	REACCESS, REVIEW, GROUP STUDY SESSIONS
PTCB PRACTICE EXAM(2) 3/17	#12	70%	#9	75%	CONTINUE TO MONITOR