Role of Communication Skill and Good Documentation Practice in the Overall Development of the Pharmacy Graduates in India: An Observational Study with Classroom Record-Daily Laboratory Record-Human Resource Record (CR-DR-HR) Model

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ABSTRACT

Objective: The aim of this observational research study was to bring up the issues related to Communication skill (CS) and Good documentation practice (GDP) in one of the pharmacy college in India and its impact on the students in their overall personality development and job perspectives. These skills are like an accelerator which is required to facilitate the smooth sailing of the business. **Methods:** The new study model was developed and employed to conduct this observational research study for final year B. Pharm and M. Pharm students which is called as Classroom Record-Daily laboratory Record-Human resource Record (CR-DR-HR) model. Classroom data collected through continuous learning activity from everyday class assessment, Daily laboratory data collected through the practical records and laboratory assessments and Human resource (HR) feedback was collected, analysed and then conveyed by HR department to the investigators. A course end evaluation was conducted through the administration of a questionnaire to all participants. **Results and Discussion:** The result clearly suggested that the students who are effectively communicating and efficiently marshalling the documents have been enjoying their positions better than those who did not acquire this quality in college level. The findings of the study suggested that the curricula should adopt CS and GDP as the main line practice where students should be allowed to learn these practices right from the beginning of the semesters. **Conclusion:** Teaching and learning curriculum programs should emphasis on to create the proper environment to enhance communication and interpersonal skills that help students to develop personal effectiveness which ultimately empowers them with the feeling of employability

Key words: Communication skill, Good documentation practice, B. Pharm, M. Pharm, Human resource, Curriculum.

INTRODUCTION

Pharmacy education system is experiencing a significant and swift change which is, of course, stimulating novel approaches to teaching and learning.[1] All the professional courses including pharmacy course in India is running in the English language, as the English language is considered to be the professional and international language in most part of the world. Therefore, the pharmacy graduates in India should be well used to the English language. English CS consists of four different components i.e. reading, writing, listening and speaking.[2-3] But unfortunately neither curriculum designers

nor students give much emphasis on communication skills.[4] Therefore, this could be one of the possible reasons why pharmacy graduates in India are not able to cope with the international standards. If this practice inculcates right from the beginning of the course then definitely students can perform much better in their professional outings. If the student's communication is effective, then both the students and the teachers can enjoy the teaching and learning process effectively and due to this student can achieve their desired goals easily.[5-6] From the student's point of view another important aspect is to communicate effectively with special attention to body language and mannerism, gestures, presentations, tone, pitch, poise/grace and also his/her knowledge and ability during interviews in order to grab a job. Another area of concern for pharmacy graduates in India is lack of good documentation practices. A GDP is a systematic procedure of the preparations, corrections, verifications and reviewing of the documents. GDP plays a vital role in the functioning of the pharmaceutical industry, clinical settings as well in the pharmacies. But unfortunately, students are not aware of the importance of GDP in college level in India. If the student community starts practising good documentation practice and quality culture from their college level, then probably they will not be facing problems in preparing and maintaining the documents in their professional settings especially in the beginning of their professional carrier. GDP is an essential component of the pharmaceutical industry which is of course minimize the risk of misinterpretation, errors in communication and ultimately ensures the quality of the product and these practices ultimately impact consumer's health.[7] CS and GDP play a significant role in the overall development of the students and hence, this is high time to introduce the CS and GDP in the main curriculum of the pharmacy course in India. Through this probably the student community will be able to cope with the problems like procrastination, indecisiveness, indiscipline, laid-back attitude because these are sure shot contributors to the failure at the professional level.[8]
Therefore, CR-DR-HR study model was developed and employed to understand the role of CS and GDP in the overall development of the pharmacy graduates in the professional settings.

MATERIALS AND METHODS

The study was conducted at NGSM Institute of Pharmaceutical Sciences, NITTE (Deemed to be University) in India from 2014-2016. The research study was conducted for final year B. Pharm and M. Pharm stu-

dents. CR-DR-HR model was developed based on the experience and observations from the daily assessment to the students. CR-DR-HR model was divided into three categories in order to assess the communication skill and documentation practices of students from a broad angle.[9] The study protocol was approved by the Internal Quality Assessment Committee (IQAC) and Institutional Review Board (IRB) at NGSM Institute of Pharmaceutical Sciences and also informed consent was obtained from the students prior to their participation. The first part of the study belonged to everyday theory class where students were observed from the class and data was taken from their ability to answer the questions raised by the teachers. Speaking, writing, reading and listening skills were considered for screening. Apart from this, students were participated in group discussions, developing interpersonal communication skills, social skills, team building, writing bio-data and application and in interviews. Based on these themes initial screening was done and after initial screening 25 students were selected for the study from each of final year B. Pharm and M. Pharm. Selected 50 students were subjected to an everyday assessment from the theory and the practical classes. And also data was taken through the teachers from the respective subjects. All the subject teachers were asked to provide information about the selected student's performance and behavior in their respective subjects. The study model was divided into three categories in which CR and DR study was conducted as in process assessment and HR study was based on the feedback provided by the HR department after the interview and the completion of probation period of the selected candidates in their respective companies.[10-11]

Class Room Record (CR)

Classroom record tests were basically designed to test the communication skills of the students. Formal talks, group discussions, exit talks, brief quizzes were the methods used to collect the data from the students. Writing and listening skills were also considered in the overall assessment of the class room record test. Students were divided into 5 batches as per the structure of the program and later they were mixed and divided into different groups according to the type of the activity conducted. Each student was individually observed and feedback was given on his or her participation in the activities. An assessment of the performance of each of the students in the test was done by the investigator and they were rated on a scale of '01 to 09' with '01' as poor and '09' as excellent communicators.[12] Categories of the students were observed on the basis of their ability to communicate in below-given scores:

- Excellent communication- A category (07-09)
- Medium level communication- B category (04-06)
- Poor communication- C category (01-03)

Daily Laboratory Record Assessment (DR)

Daily laboratory records were assessed on the basis of the student's performance in the laboratory especially in their glassware arrangement habits, record writing habits and maintaining abilities. An assessment of the performance of each student was done by the laboratory in charge and subject teacher and were rated on a scale of '01' to '09' with '01' as 'Poor' and '09' as 'Excellent'.[13] Then the students were categorised on the basis of their documentation skills in a given below scores:

- Excellent Record- A category (07-09)
- Partially Good Record- B category (04-06)
- Poor Record- C category (01-03)

Human Resource Record Assessment (HR)

HR managers from various pharmaceutical companies, educational institutions and clinical and retail pharmacy outlets provided all the required information based on their observation to the investigators. During the first round of their interview, we were provided with the information regarding students communication skills i.e. writing, speaking and listening skills. Selected students were tracked for one year by their managers and later graded by Performance-based appraisal system (PBAS).[14] PBAS was developed by the IQAC, placement cell along with the investigators of NGSM Institute of Pharmaceutical Sciences and also based on the information collected by the different recruitment agencies. PBAS were applied to gauge the performance of the employees in a given year and data were analysed.[15] The parameters broadly covered "Job satisfaction", "professional practices", "colleagues feedback", "quantitative and qualitative analysis of the performance" and "perception". Each parameter was allotted 20 marks and total 100 marks was set to observe the performance of the selected employees and which is presented in Table 1. After the completion of the interview, marks obtained by the employees were converted into a percentage and as per the rating scale is given in Table 2 and then they were categorised in given below categories:

- Not struggling at a workplace
- Partially struggling at a workplace
- Completely struggling at a workplace

RESULTS

As per the data shared by the placement cell of the college, most of the B. Pharm students were selected for production and quality assurance in firms namely Micro labs limited and Lotus labs private limited, Bengaluru, India. Amongst the students, 5 students were selected for the production and quality assurance. Out of 5 students 1 from category A, 2 from category B and C were selected. Category C students were found to be technically sound but poor in communication and average in maintaining documents, they were selected because of their technical skills whereas category B students were found to have average communication skills and practised medium level documentation in college level and had average technical skills. Category A student was found to be good in documentation and excellent in communication but poor in technical skills, however, their excellent communication skill was given preference. (Figure 1)

As per the information provided by the placement officer, M. Pharm students were selected for the production and manufacturing, quality assurance, research and development, regulatory affairs and academia. According to the placement officer, all 25 M. Pharm students were selected and recruited in different setups. Out of 25 students 6 students from category A, 7 students from category B and 12 students from category C were selected for different positions in academia and industry. Category C students were found to be technically sound and therefore they were selected whereas category B students were good in communication skills but had average technical skills. Category A students were found to have excellent communication skills but poor in technical skills, however, again their excellent communication skills were given preference. (Figure 1)

Performance-based appraisal system (PBAS) was implemented to gauge the performance of the selected employees and data were analysed as per the parameters provided in Table 1. According to PBAS, feedback was collected and analysed by the HR managers of the
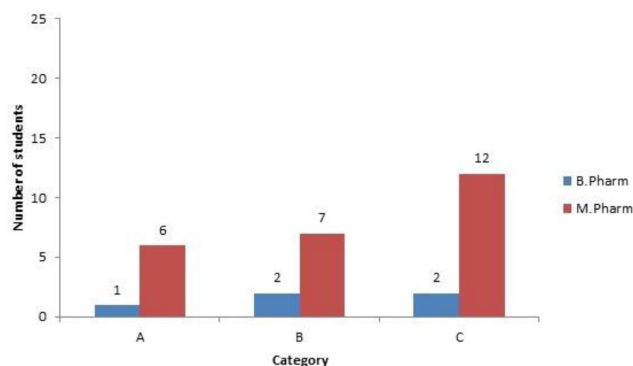

Figure 1: Category of the selected students.

Sr. No.	Parameters		Score
	Table 1: Performance Based Appraisal System (PBAS).		
	Job satisfaction		**20**
	Salary		5
	Work Culture/Environment		5
	Work Interest		5
	Eager to grow		5
	Professional practices		**20**
	Post training assessment of the knowledge.		5
	Have they applied their training to performance of the work?		4
	Completion of the work on time		5
	Ability to handle/complete multi tasks		3
	Accuracy in work		3
	Colleagues feedback		**20**
	Co-operation with colleagues		4
	Leadership quality		4
	Problem solving and decision making		4
	Keeping knowledge and skills up to date		3
	Reviewing and reflecting on own performance.		2
	Effective time management.		3
	Qualitative and Quantitative performance		**20**
	Punctuality		5
	Technical ability and quality		5
	Handling of the project		4
	Communication skills		3
	Commitment		3
	Attitude		3
	Perception		**20**
	Compared with your expectations, how do you rate the quality of our students?		5
	How do you rate our students' performance in the company?		5
	How do you rate our students in their communication skills?		5
	Compared with your other employers, how do you rate our students work in your company?		5
Total			**100**

selected candidates from their respective different firms and compiled result was conveyed to the investigators. Results indicated that the maximum score approximately 50 % was obtained by category A students, 30 % and 20 % marks were obtained by category B and C students respectively as it is clearly depicted in Figure 2.

DISCUSSION

According to the survey conducted category A students scored decently in job satisfaction, professional prac-

tices and in the perception parameters, as a result, they scored nearly 50 % which was considered to be satisfactory as per the feedbacks provided by the HR managers. Category A students scored exceptionally well in the parameters like the ability to handle or complete multiple tasks on time, leadership quality and communication skills. However, they could not score much in the quantitative and qualitative analysis. The trend which was identified by the observers from category A is that the technical skills play an important role in the functioning but if the employee's communication skill is excellent then sooner
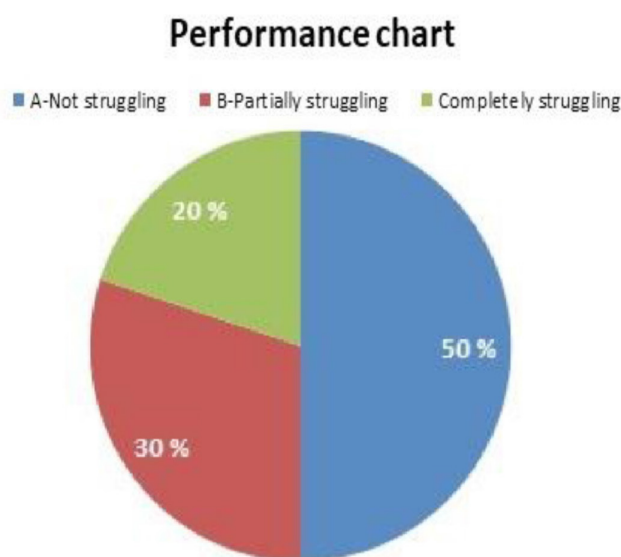
Performance chart

■ A-Not struggling   ■ B-Partially struggling   ■ Completely struggling

Figure 2: Performance of the selected candidates.

Table 2: Rating scale.			
Score	**0-30 %**	**30-50 %**	**50-100 %**
Category	Completely struggling	Partially struggling	Not struggling

or later they can pick up the performance.[16] However, the numbers of students were found to be less in this category but the success rate was high compared with the other two categories.

On the other side category B and C students scored scarcely in almost all the parameters except quantitative and qualitative analysis because these students were found to have sound technical skills. The important point was noted that the students who have got good technical skills still struggling with their working setups which clearly indicated that it is due to lack of CS and GDP.[17]

The last parameter perception was concluded by the investigators where direct questions were asked from the HR managers based on the questions given in Table 1. HR managers clearly revealed that the students who are efficient in communication are partially struggling with the daily activities at the workplace. The set of students were not satisfactory both in communication and documentation practices completely struggling in their working setups. The category of the students was good in both communication and documentation practices were enjoying his/her job efficiently. Ratings are clearly depicted in Table 2.

In a nutshell, PBAS revealed that the students having good communication skills enjoying the workplace with

better success rate.[18] CS and GDP are like additives as in pharmaceutical operations which certainly do not play a main role in the functioning but facilitates smooth running of the business which eventually adds quality to the work. It was an attempt here to identify the weakness of the students and once the students identify their weakness they will be able to focus their energy more on to overcome the weaknesses.[16]

CONCLUSION

This observational study explores the importance of CS and GDP in the curricula because pharmacy graduates need to communicate on a different level in different work settings. The habit of communicating effectively should instill into the students right from the beginning of the semesters. If documentation plays a pivotal role in the pharmaceutical settings then why we don't start infusing GDP into the students from the college level. Pharmaceutical industry believes in a famous saying, "If it isn't documented, it didn't happen" which really express the importance of the documentation in the pharmaceutical industry. Therefore, it can be concluded from this brief research is that there is a lot of scope of change in the curricula which needs to be revised and updated as per the needs of the pharmaceutical industry and clinical settings. The authors also feel that all pharmacy colleges in India should have faculty specialized in communication skills and also good documentation practice should be strongly encouraged.

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CONFLICT OF INTEREST

Declared None.

ABBREVIATIONS

CS: Communication skill; **GDP:** Good documentation practice; **CR:** Classroom Record; **DR:** Daily laboratory record; HR: Human resource record; **IQAC:** Internal quality assessment committee; **IRB:** Institutional Review Board; **PBAS:** Performance-based appraisal system

SUMMARY

The serious concern of job recruiters today is employability skills i.e soft skills. It has become a key requirement

for the applicant because it helps in not only getting good employment but also helps in vertical mobility. Indeed, it calls for rethinking in formulating the curriculum. There is an urgent need to ensure that the students have excellent communication and technical skills to face the challenges in their professional life. Unfortunately, the syllabus of almost all professional programmes allot very little weightage to soft skills. If we were to believe the feedback from the industry captains and there is no reason why we should doubt their observation, it is the time for the colleges to address the problems of poor communication skills among the graduates to be internationally competitive. I feel an effective learning course to improve reading, writing, listening, speaking and comprehension skills should be a part of the syllabus with substantial weightage. Though in some of the universities/institutions such programmes are running, but they remain partially effective mainly due to lackadaisical approach to the problem. A well-defined syllabus spreading across the entire duration of the programme in communication skills and good documentation practice should be introduced in all the programmes. Every institution must have a teacher/trainer to help the student to excel in these critical areas. To the best of my knowledge this is the unique study first of its kind that was conducted to investigate the importance of soft skills at the college and professional level.

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