THE EFFECT OF COMMUNICATION SKILLS TRAINING PROGRAMME ON THE ATTITUDE AND PERCEPTIONS OF THE RESIDENTS OF PHYSICAL MEDICINE AND REHABILITATION

Reeba Mary Mani1, Sreedevi Menon P2, Asma Rahim3, Geeta Govindaraj4, Laila K. V5, Anitha P. M6, Mohanraj M7, Hemalataa

1Assistant Professor, Department of Physical Medicine and Rehabilitation, Government Medical College, Kozhikode.
2Professor, Department of Physical Medicine and Rehabilitation, Government Medical College, Kozhikode.
3Additional Professor, Department of Social and Preventive Medicine, Government Medical College, Kozhikode.
4Additional Professor, Department of Paediatrics, Government Medical College, Kozhikode.
5Associate Professor, Department of Pharmacology, Government Medical College, Kozhikode.
6Additional Professor, Department of Microbiology, Government Medical College, Kozhikode.
7Associate Professor, Department of Physical Medicine and Rehabilitation, Government Medical College, Kozhikode.
8Assistant Professor, Department of Physical Medicine and Rehabilitation, Government Medical College, Kozhikode.

ABSTRACT

BACKGROUND
Communication skills are essential for all practicing doctors, which can be taught and assessed by a structured programme. Hence, a specialty-based communication skills training programme was conducted among the residents of the Physical Medicine and Rehabilitation (PMR) Department.

The aim of the study is to assess the change in attitude and perception among the residents of PMR by a communication skills training programme.

MATERIALS AND METHODS
It comprised of a data collection procedure. Here, a semi-structured questionnaire was administered to the subjects. It was given as a pre-intervention, post-intervention and as a second phase post-intervention questionnaire. The communication skills training programme (n=16) was conducted after a pre-test evaluation using the validated questionnaire tool. A half-day training programme using composite Teaching-Learning methods (lectures/role play/videos/check list) were included. The post-test-1 (n=16) was conducted after the training programme and the post-test-2 (n=16) was conducted after 6 weeks. All the tests used the same validated questionnaire tool with scores allocated to each item.

Settings- Physical Medicine and Rehabilitation (PMR) Department among the residents.
Study Design- Educational Intervention- A communication skills training programme using composite teaching learning methods.
Statistical Analysis- Analysed using SPSS-16 package software.

RESULTS
The median pre-test score of the sixteen PMR residents was noted to be 33. The median post-test-1 score of the group was noted to be 37. A significant difference was noted between the pre- and post-test-1 score, which was statistically significant Wilcoxon Signed Rank Test z=-3.249 and p value <0.0001. The post-test-2, which was done after 6 weeks of the programme yielded a score of 36, a similar value of post-test-1. The comparison of pre-test score with post-test-1 and post-test-2 scores showed a highly significant improvement in the communication skills of the residents following the training - p value <0.0001
This shows that there is an immediate improvement in the perceptions of the communication skills following the training, which has got a long-term impact too.

CONCLUSION
The communication skills training programme is useful for specialty residents. Immediate and short-term impact is possible with such programmes.

KEYWORDS
Communication Skills, Residents, Rehabilitation Medicine.

HOW TO CITE THIS ARTICLE: Mani RM, Menon PS, Rahim A, et al. The effect of communication skills training programme on the attitude and perceptions of the residents of physical medicine and rehabilitation. J. Evid. Based Med. Healthc. 2016; 3(103), 5681-5684. DOI: 10.18410/jebmh/2016/1175

BACKGROUND
Communication skills are essential for all practicing doctors1 and all medical graduates should be able to demonstrate effective communication skills.2-3 When the practicing doctors use communication skills effectively, both the doctor and the patient benefit.4 In the terms of understanding their problems, the patients get more satisfaction with the care they receive.5,6

In the field of physical medicine and rehabilitation, when the concerned doctors are dealing with patients with many challenges especially, physical challenges, which could be temporary or permanent. It is important that this core skill is emphasised.6
Communication skills training programme should be able to equip the doctors/residents in a better way and more so a specialty specific training programme should be beneficial with specialty-based objectives in mind. Furthermore, the perception, attitudes and practices of rehabilitation residents with regard to doctor-patient communication can be improved.

The effect of teaching communication skills can improve the ability of the doctor’s communication skills to a certain extent. It has been noted by Dave Davis et al that formal continuing medical education, which includes workshops and other continuing education activity can improve the professional performance of the treating physician and thus the health of the patients they serve. Thus, communication skills training programme can be considered as a part of continuing medical education to enhance the communication skills of the physician. As stated by Gabrielle et al, comprehensive communication skills training maybe more beneficial rather than assessment methods like objective structured clinical examinations. Thus, the need of the hour has to focus on emphasising the importance of communication skills just like clinical examination skills.

In the present curriculum of postgraduate residents of physical medicine and rehabilitation, communication skills have to be given a better emphasis and these skills need to be taught. There needs to be a good reliability in communication skills assessment. So, a structured communication skills teaching programme will help to enhance the specialty doctor’s communication skills.

Effective communication is an important tool of the medical graduate. According to the article by Geeta M G et al, communication is an art that can be acquired and can be improved by experience. Good communication skills help to improve patient satisfaction and care at the same time. It also helps to alleviate complaints and malpractice. It has been stated that communication skills can be taught and assessed by means of structured programmes.

In the rehabilitation scenario where communication forms the essential link between the doctor and the patient especially when dealing with physical impairments, be it temporary or permanent- it is important that this skill be introduced early and reviewed periodically for the benefit of the overall patient care. In the present curriculum for the residents of physical medicine and rehabilitation, communication skills training needs a special and separate emphasis. Thus, specialty-based communication skills workshop can help in improving communication in difficult areas like breaking bad news and expressing empathy professionally as stated by Jane et al. Thus, specialty-based communication skills training is of utmost importance and more so in the field of rehabilitation medicine.

Hence, this educational research has been embarked on in order to assess the attitude and perceptions of the rehabilitation residents by conducting communication skills programme.

AIMS AND OBJECTIVES
To evaluate the effectiveness of a structured Communication Skills (CS) training programme on the attitudes and perceptions of the residents of Physical Medicine and Rehabilitation Department, Government Medical College, Kozhikode.

MATERIALS AND METHODS
The attitudes and perceptions of the residents with regard to doctor-patient communication was evaluated using a validated structured questionnaire. This was administered before and after the communication skills training (pre-post-1). Each question was rated using a 5-point Likert type scale- 1. Almost never; 2. Not very often; 3. Sometimes; 4. Most of the time; 5. Always. An informed consent was taken from all. The same tool was administered at the end of six weeks after the CS training (post-test-2).

Data Collection Procedure
The structured questionnaire was designed and validated after consultation with other faculty members of PMR Department on the most common daily clinical medical conditions encountered in the department with suggestions taken from the medical education unit faculty members who were well versed in communication skills training. This questionnaire was given as a pretest prior to the communication skills training programme proper.

Structured training utilised a composite mix of teaching-learning methods. These included lectures, role play, audio visual demonstration and simulated demonstrations on doctor-patient communication skills. Process was facilitated by faculty experts in communication skills and faculty from PMR.

Clinical scenarios identified were breaking bad news, approach to a patient who was agitated, dealing with angry carers/bystanders approach to a parent of a differently-abled child.

The residents were then divided into groups and were given chosen clinical scenarios to enact as role play. Within each group, while one half enacted, the other half watched the role plays using standardised checklists provided, following which the groups interchanged and the same process carried out. Evaluation of communication skills was done at the end of the whole session (post-test-1).

Repeated evaluation was done at the end of six weeks using the same tool (post-test-2).

Data Analysis
Variables were analysed using SPSS. Mean, median and standard deviations of the scores were calculated. Paired t
test, Wilcoxon signed rank test was used for comparison of pre- and post-test values.

**ETHICS**

This study was conducted only after the approval of the Institutional Research Committee and the ethics committee and included written consent of the residents.

**RESULTS**

A measurable improvement in the attitude and perceptions of communication skills of the residents of Physical Medicine and Rehabilitation Department was expected after a structured communication skill training programme.\textsuperscript{14}

**OBSERVATIONS**

The median pre-test score and post-test-1 score of sixteen PMR residents was noted to be 33 and 37, respectively, (Table-1).

<table>
<thead>
<tr>
<th>Test Attempt</th>
<th>N</th>
<th>Minimum</th>
<th>Maximum</th>
<th>Percentiles</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>25th</td>
</tr>
<tr>
<td>Total score 1 (pre-test)</td>
<td>16</td>
<td>29</td>
<td>41</td>
<td>31.00</td>
</tr>
<tr>
<td>Total score 2 (post-test-1)</td>
<td>16</td>
<td>31</td>
<td>50</td>
<td>35.00</td>
</tr>
<tr>
<td>Total score 3 (post-test-2)</td>
<td>16</td>
<td>31</td>
<td>46</td>
<td>34.00</td>
</tr>
</tbody>
</table>

*Table 1. Comparison of Pre- and Post-Test Scores (Median) Following Communication Skills Training*

A repeat evaluation done at the end of 6 weeks on the same group of students yielded a median score of 36 (post-test-2), which was almost similar to the median of post-test-1 (37) as shown in Table-1. This goes to show that there is an immediate improvement in the perception of the communication skills training, which has got a long-term impact too. The comparison of the pre-test-score-1 with post-test-1 and post-test-2 score showed a highly significant improvement in the attitudes of the communication skills of the residents.

A statistically significant difference was noted between the pre- and post-test scores, (p<0.0001) as shown in Table-2. Non-parametric test for comparison of median scores on repeated measurements was used (Wilcoxon Signed Ranks), which revealed a statistically significant improvement (z=-3.249, p<0.0001).

<table>
<thead>
<tr>
<th>Test Attempt</th>
<th>N</th>
<th>Minimum</th>
<th>Maximum</th>
<th>Median</th>
<th>Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total score 1 (pre-test)</td>
<td>16</td>
<td>29</td>
<td>41</td>
<td>33.00</td>
<td>P&lt;.0001*</td>
</tr>
<tr>
<td>Total score 2 (post-test-1)</td>
<td>16</td>
<td>31</td>
<td>50</td>
<td>37.00</td>
<td></td>
</tr>
<tr>
<td>Total score 3 (post-test-2)</td>
<td>16</td>
<td>31</td>
<td>46</td>
<td>36.00</td>
<td></td>
</tr>
</tbody>
</table>

*Wilcoxon signed rank test, Z=-3.249.

An immediate improvement in the perceptions of the communication skills is noted following the training, which is statistically significant, which has got a long-term impact too as depicted in Figure 1. The improvement of perception across multiple test attempts could be demonstrated effectively in this educational intervention.

**DISCUSSION**

It has been noted in the article by Wright KB et al\textsuperscript{15} that variables such as attitudes towards communication skills training, attitudes towards the value of medical communication skills, medical student experiences within the clinical setting and demographic variables may all influence the success of communication. The article also cites that the relationship between attitudes towards communication skills training and the effective learning of these skills is consistent with several models of learning including the Bloom’s taxonomy of educational objectives,\textsuperscript{15} but most studies of medical education deal more with the psychomotor domain rather than the affective domain. Thus, this educational intervention has been taken up to explore the relationship among the resident’s attitudes towards communication skills training, perceptions of the importance of medical communication, knowledge of appropriate medical communication skills and their perceived confidence in their ability to communicate effectively with patients.

The available curriculum of physical medicine and rehabilitation has yet not given a specific emphasis in communication skills training to the residents of physical medicine and rehabilitation. The specialty deals with physical disability both temporary and permanent, which has to be conveyed and communicated to both the patient and the carers in a professional and scientific way. When compared to the physical medicine and rehabilitation syllabus of the west, a separate section in the curriculum pertains to the teaching of communication skills to the residents of physical...
medicine right from the beginning of the first year onwards. Thus, a gap was identified and this educational intervention was conducted in order to address the same. In the article by Silwa, James et al., it has been highlighted that specialty-specific communication training can improve physician communication skills. This study was conducted in the physical medicine and rehabilitation department of the hospital with an in-house residency training programme. Thus, the importance of communication skills training is highlighted especially in the physical medicine and rehabilitation setting for residents. In another article by Janel et al., specialty-based communication skills workshop was conducted among the nephrology fellowship group and this programme significantly increased the perceived preparedness especially in areas of breaking bad news and expressing empathy. Thus, specialty-based communication skills training is of utmost importance and more so in the field of rehabilitation medicine. In the article by Wright KB, Bylund C et al., it has been pointed out that the improvement in the attitude and perception of communication skills among the residents will help to improve the physician-patient relationship.

In addition, it also improves compliance, satisfaction with care along with improved psychological health. This article also points out that good provider communication skills have been linked to effective healthcare delivery, provider and patient satisfaction with fewer incidents of malpractice and other negative facets of health delivery system. Thus communication skills training is an important part of medical education, especially medical residents.

CONCLUSION
The communication skills training programme is useful for specialty residents. It is possible to have immediate and short-term impact with communication skills training programme.

IMPLICATIONS
Specialty-based communication skills training programme is useful for residents in training. Communication skills training programme could be recommended at the beginning of the residency course, but more of educational research is required in this field.

LIMITATIONS
This was a small study group and only a short time for the training course could be allotted. This programme could not be conducted at the beginning of the residency programme. There is more scope for educational interventions in this field.

ACKNOWLEDGEMENT
To the residents of the Physical Medicine and Rehabilitation Department.

REFERENCES