



A STUDY ON THE AWARENESS AMONG THE PHYSIOTHERAPY INTERNS AND POSTGRADUATES ON POST-STROKE COGNITIVE IMPAIRMENTS

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Abstract :

This study investigates the awareness of physiotherapy interns and postgraduates regarding cognitive impairments following a stroke. Cognitive deficits post-stroke are common yet often under-assessed in physical rehabilitation. A cross-sectional survey was administered to 80 participants from Bangalore. Data analysis revealed substantial knowledge among participants about the nature and impact of cognitive dysfunction, with tools like MoCA and MMSE commonly recognized. Despite overall awareness, gaps remain in clinical integration and patient-family education. Results suggest the need for enhanced training modules and inclusion of cognitive rehabilitation strategies in physiotherapy curricula.

Index Terms - Post-stroke cognition, cognitive impairment, physiotherapy, MoCA, MMSE, awareness, rehabilitation.

INTRODUCTION

Stroke is a major public health issue, known for causing significant neurological and cognitive disabilities. Post-stroke cognitive impairment (PSCI) affects memory, attention, and executive functions. Physiotherapists, as key members of the stroke rehabilitation team, often face challenges in assessing and managing these cognitive aspects. Understanding their awareness and clinical preparedness is essential to improving patient outcomes.

METHODOLOGY

This cross-sectional study targeted 80 physiotherapy students (interns and postgraduates), the interns and postgraduate students were approached in person and were requested to fill out and submit the Google Form on the spot. Participants were selected based on their clinical exposure to stroke patients. The questionnaire included demographics, awareness about PSCI, use of cognitive assessment tools, and perspectives on family involvement and rehabilitation approaches.

RESULTS

Analysis showed that 86% of participants felt knowledgeable about post-stroke cognitive deficits. The MMSE and MoCA were the most commonly used assessment tools. 83% identified stroke location as a major factor in cognitive decline. Among respondents, 58% from acute stroke units and 52% from rehabilitation units reported that up to 40% of their patients exhibited cognitive impairments. Additionally, 97% supported routine cognitive assessments, and 93% stressed the importance of involving families in care. 75% acknowledged the physiotherapist's role in managing cognitive issues.

Questions	Unit/Department	Options					
		yes	no	I'm not sure			
Do you consider yourself knowledgeable regarding cognitive deficits after stroke?	Acute stroke unit	86.30%	5%	8.70%			
	Stroke rehabilitation unit	81.30%	8.70%	10%			
		MMSE	MoCA	SIS	ACA	RBA	BIT
What validated tools do you use to assess cognition in patients with stroke?	Acute stroke unit	52.50%	42.50%	2.50%	2.50%	0	0
	Stroke rehabilitation unit	47.50%	47.50%	1.20%	2.50%	1.30%	0
		Location of the stroke	Delirium	History of cognitive decline	Age related cognitive decline	not answered	
In your opinion, what are the reasons for post-stroke cognitive deterioration?	Acute stroke unit	82.50%	6.20%	8.80%	2.50%	0	
	Stroke rehabilitation unit	83.80%	8.80%	3.80%	2.50%	1.10%	
		up to 20 %	up to 40 %	up to 60 %	up to 80 %	> 80 %	
In your experience, approximately what proportion of patients under your care have cognitive decline post-stroke?	Acute stroke unit	15%	58.70%	21.30%	5%	0	
	Stroke rehabilitation unit	23.80%	52.50%	20%	2.50%	1.20%	
		up to 20 %	up to 40 %	up to 60 %	up to 80 %	> 80 %	
What proportion of post-stroke cognitive decline is reversible?	Acute stroke unit	18.80%	46.30%	26.30%	8.60%	0	
	Stroke rehabilitation unit	16.30%	43.60%	31.30%	7.50%	1.30%	
		6 weeks	12 weeks	24 weeks	Not necessary	I don't know	
When do you think cognition should be assessed after discharge?	Acute stroke unit	65%	26.30%	1.30%	1.10%	6.30%	
	Stroke rehabilitation unit	67.50%	22.50%	1.30%	2.40%	6.30%	
		yes	no	I don't know			
Do you think cognitive function should be routinely assessed annually thereafter?	Acute stroke unit	97.50%	2.50%	0			
	Stroke rehabilitation unit	96.30%	1.30%	2.40%			
		yes	no				
Do you routinely discuss the potential impact of post-stroke cognitive deficits with patients and their families?	Acute stroke unit	93.80%	6.20%				
	Stroke rehabilitation unit	93.80%	6.20%				
		Doctor	PT	OT	SLT	Nurse	
In your opinion, which discipline is best placed to assess cognition after stroke?	Acute stroke unit	16.30%	70%	8.70%	5%	0	
	Stroke rehabilitation unit	12.50%	75%	7.40%	3.80%	1.30%	

DISCUSSION

The findings reflect moderate to high awareness among future physiotherapists regarding PSCI. Despite knowledge of common tools like MoCA and MMSE, there appears to be a gap in practical application. The role of physiotherapists in addressing cognitive health needs reinforcement through curriculum updates and continuous professional development. Patient-family communication was widely endorsed as vital for successful outcomes.

CONCLUSION

Awareness of post-stroke cognitive impairment among physiotherapy students is promising, but training remains inadequate. Integrating neurocognitive modules into physiotherapy education will enhance patient-centered care. More empirical research and clinical exposure are needed to bridge the remaining gaps in knowledge and application.

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