



Knowledge, Attitude, Perception of Dental under Graduates Towards Indian Dental Curriculum

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Research Article

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ABSTRACT

In recent years, there has been a growing need to evaluate and adapt the Indian dental curriculum to meet global standards and the evolving demands of the healthcare sector. This study aims to explore the knowledge, attitudes, and perceptions of dental students, educators, and professionals regarding the Indian dental curriculum, focusing on its relevance, effectiveness, and areas for improvement.

Aim: To assess the knowledge, attitude, and perception of dental undergraduates towards the Indian Dental Curriculum.

Objectives: To assess the knowledge, attitude, and perception of dental undergraduates towards the Indian Dental Curriculum based on gender.

To assess knowledge, attitude, and perception of dental undergraduates towards the Indian Dental Curriculum based on year of study.

Result: A total of 230 students took part with female of 81.8 %and male of 18.2%. The age of participants ranges from 19 -25. In this study, females have more knowledge than males. Interns have more knowledge than IV year students followed by II year students followed by III year students.

Keywords: Attitude, Assessment Methods, Competency-based, Curriculum, Clinical Skills, Knowledge, Perception, Teaching Methodologies.

Introduction

The knowledge, attitude, and perception of dental undergraduates towards the Indian dental curriculum play a crucial role in shaping the future of dental education and practice in the country. Dental undergraduates are expected to develop a comprehensive understanding of clinical and theoretical knowledge, along with the technical skills necessary for effective patient care. The curriculum in India, which follows a prescribed structure by dental councils and universities, includes basic sciences, clinical subjects, as well as practical and community-based education. However, the ever-evolving landscape of dental science and practice often raises questions about the relevance, effectiveness, and modernity of the current educational framework.

Methodology

A) Study design and area: A cross-sectional study was carried out at the tertiary care teaching hospital khammam.

B) Study population: The health care students including those of II, III, IV, Interns year and interns who responded to the online questionnaire sent through social media.

C) Study Instrument: A self-administered questionnaire was designed based on knowledge attitude and perception and had a total of 12 questions and through offline forms pro link. Each participant has to fill in their demographic data

like Name, age, and year of study. Participant has to select one option from the answers provided against questions. The questions were based on knowledge attitude and perception of the Indian Dental Curriculum among dental students.

D) Pilot Study: A pilot study was conducted on a group of students to assess the validity and reliability of the study.

E) Sampling Method: The sampling method used is the convenience method.

F) Inclusion Criteria: The students who were interested in the study and who were willing to participate.

G) Exclusion Criteria: students who are not willing to participate are excluded.

H) Organizing the study: The purpose of the study was explained in a short note participants were asked to select one option from the answers provided against the questions.

I) Statistical Analysis: Data from the filled questionnaire was collected in a tabular form in an Excel worksheet and evaluated for analysis. The analysis was performed by SPSS version 29.

Result

A total of 230 students took part with female of 81.8 %and male of 18.2%. The age of participants ranges from 19 -25. In this study, females have more knowledge than males. Interns have more knowledge than IV year students followed by II year students followed by III year students.

Descriptive Statistics

AGE					
	N	Minimum	Maximum	Mean	Std. Deviation
Age	230	19	50	23.29	3.076
Valid N (listwise)	230				

Gender	Frequency	Valid Percent
Male	42	18.2
Female	188	81.8
Total	230	100

Year of Study	Frequency	Percent
II BDS	50	21.7
III BDS	45	19.5
IV BDS	55	23.9
INTERNS	80	34.7
Total	230	100

Distribution and comparison of responses based on gender

Item	Response	Males		Females		Chi-Square value	P value
		n	%	n	%		
Q1	1	3	7.1	2	1.0	0.537	0.001*
	2	35	83.3	176	93.6		
	3	2	4.7	3	1.5		
	4	2	4.7	7	3.7		
Q2	1	2	6.4	37	53.6	8.172	0.573
	2	22	62.9	13	37.1		
	3	15	55.6	12	44.4		
	4	16	80	4	20		
Q3	1	5	5.9	59	54.1	13.200	0.004*
	2	38	53.5	33	46.5		
	3	3	8.9	8	21.1		
	4	14	13.6	8	36.4		
Q4	1	5	5.7	44	46.3	0.296	0.961
	2	4	5.3	34	44.7		
	3	31	55.4	25	44.6		
	4	8	6.5	5	38.5		

Q5	1	5	6.7	31	38.3	15.863	0.01*
	2	28	63.6	16	36.4		
	3	3	10.3	25	39.7		
	4	16	30.8	36	69.2		
Q6	1	7	6.4	4	36	11.752	0.038*
	2	12	12.4	11	48		
	3	21	66	11	34		
	4	5	6.5	33	40		
Q7	1	1	3.8	78	46.2	11.848	0.008*
	2	31	67.4	15	32.6		
	3	8	6.7	4	33.3		
	4	2	5.4	11	84.6		
Q8	1	5	6.9	40	38.1	21.504	0.001*
	2	47	66.2	24	33.8		
	3	16	28.6	40	71.4		
	4	4	5.0	4	50		
Q9	1	41	56.9	31	43.1	0.363	0.948
	2	6	54.1	51	45.9		
	3	22	56.4	17	43.6		
	4	9	10.5	9	50		
Q10	1	3	6.7	19	33.3	8.740	0.033*
	2	17	41.8	67	48.2		
	3	16	39.6	9	36		
	4	6	11.6	13	68.4		
Q11	1	5	5.7	63	43	13.635	0.03*

	2	26	52.3	24	48		
	3	19	43.8	8	30		
	4	2	13	13	87		
Q12	1	2	4.7	39	20.7	17.912	0.001*
	2	36	85.9	104	55.3		
	3	2	4.7	36	19.1		
	4	2	4.7	9	4.7		

P≤0.05 is statistically significant

Distribution and comparison of responses based on the year of the study

Item	Response	II BDS		III BDS		IV BDS		INTERN		Chi-Value	P-Value
		n	%	n	%	n	%	n	%		
Q1	1	8	16.0	2	4.4	1	1.8	0	0	39.582	0.001*
	2	36	72.0	38	84.4	47	85.4	75	93.7		
	3	2	4.0	2	4.4	2	3.6	2	2.5		
	4	4	4.0	3	6.6	5	9.0	3	3.7		
Q2	1	8	11.6	6	8.7	22	31.9	28	40.6	5.465	0.06
	2	35	31.4	7	20	6	17.1	7	20		
	3	2	7.4	6	22.2	5	18.5	11	40.7		
	4	5	25	2	10	3	4.7	9	45		
Q3	1	10	9.2	6	5.5	28	25.7	60	55	24.923	0.015*
	2	33	16.9	12	16.9	22	31	20	28.2		
	3	5	13.2	4	10.5	11	28.9	13	34.2		
	4	3	13.6	5	18.5	3	13.6	11	50		
Q4	1	32	12.6	6	6.3	24	25.3	49	51.6	10.549	0.568

	2	9	11.8	13	17.1	22	28.9	28	36.8		
	3	8	14.3	6	10.7	15	26.8	21	37.5		
	4	1	7.7	2	15.4	3	23.1	6	46.2		
Q5	1	25	6.2	8	9.9	21	25.9	44	54.3	24.393	0.018*
	2	11	25	7	15.9	13	29.5	9	20.5		
	3	11	17.5	6	9.5	16	25.4	24	38.1		
	4	3	5.8	6	11.5	14	26.9	27	51.9		
Q6	1	29	18.2	1	9.1	2	18.2	6	54.5	46.163	0.001*
	2	6	26.1	5	21.7	5	21.7	4	17.4		
	3	7	21.9	6	18.8	5	15.6	10	31.2		
	4	8	9.6	8	9.6	33	39.8	28	33.7		
Q7	1	15	8.9	12	7.1	51	30.2	84	49.7	50.454	0.001*
	2	13	28.3	8	17.4	9	19.6	10	21.7		
	3	2	16.7	6	50	0	0	3	25		
	4	20	0	1	7.7	4	30.8	7	53.8		
Q8	1	13	12.4	10	9.5	29	27.6	48	45.7	9.426	0.666
	2	13	18.3	10	14.1	19	26.8	25	35.2		
	3	3	5.4	6	10.7	14	25	27	48.2		
	4	21	12.5	1	12.5	2	25	4	50		
Q9	1	5	6.9	8	11.1	16	22.2	39	54.2	14.065	0.297
	2	20	18	9	8.1	31	27.9	42	37.8		
	3	4	10.3	6	15.4	12	30.8	16	41		
	4	21	5.6	4	22.2	5	27.8	7	38.9		
Q10	1	3	10.5	6	10.5	11	19.8	34	59.6	12.668	0.394
	2	20	10.8	7	10.8	42	30.2	52	37.4		

	3	3	12	30	11.1	7	28	10	40		
	4	24	15.8	3	15.8	4	21.1	8	42.1		
Q11	1	17	11.5	15	10.1	39	26.4	69	46.6	6.718	0.876
	2	7	14	7	14	15	30	16	32		
	3	5	18.5	4	14.8	6	22.2	11	40.7		
	4	21	6.7	1	6.7	4	26.7	8	53.3		
Q12	1	17	16.7	8	7.8	6	15.5	47	46.1	17.195	0.142
	2	10	14.3	12	17.1	18	35.7	23	32.9		
	3	3	5.4	5	8.9	18	35.7	6	6.4		
	4	20	41.5	20	46.7	8	16.7	4	4.7		

$P \leq 0.05$ is statistically significant

Discussion

The results of this study indicate significant disparities in knowledge attitudes and perceptions among undergraduate dental students regarding Indian Dental Curriculum. This curriculum is designed to equip students with the necessary theoretical knowledge, clinical skills, and professional attitudes required for their practice. However, there has been ongoing discussion and research on how effectively this curriculum meets the educational needs of students, as well as its relevance to current dental practices and patient care. When responses were analysed by gender, females demonstrated higher levels of correct answers than males with a correct response rate of 81.8% and 18.2% respectively.

Conclusion

This study concludes that students are generally aware of the standards of the Indian Dental Curriculum and generally appreciate the depth of the theoretical depth of curriculum and more hands-on training and focus on patient-centered care. The curriculum can prepare the students for the future challenges of the profession ensuring

not only technicality but also compassionate which not only improves student satisfaction but also shapes a dynamic dental education system in India.

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