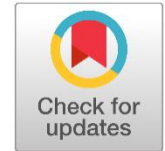




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Measuring the Impact of Capacity Building Workshops for Ensuring Inclusive Education Practices Using Kirkpatrick's Evaluation Model in Sindh, Pakistan

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ABSTRACT

The study examines the failure of implementing inclusive education programs in Sindh province schools. It developed a unique training scheme for special and general education teachers, incorporating learning modules, instructional resources, and a virtual platform. The project was initiated in 2022, and 423 participants were trained in inclusive education practices. The study found that competency-based inclusive education workshops significantly boost teachers' positive attitudes towards inclusive education, confirming previous findings on integrating students with disabilities into mainstream classrooms. The study emphasizes the importance of continuous professional development for teachers in the face of rapid technological advancements.

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1. INTRODUCTION

Capacity Building Workshop

Workshops are short, intensive educational programs for a small group focused on techniques and skills in a specific field. They provide a space for discussing questions, brainstorming ideas, identifying problems, making decisions, and developing solutions (Essien, Akpan & Obot, 2016). Unlike courses that need considerable reading and classroom exercises, workshops are self-contained, with presentations designed to stand on their own. Workshops

are compelling learning experiences because participants control the direction and practice methods and skills (Mansfield, 2020).

According to Brooks-Harris & Stock-Ward (1999), the discourse explores following three workshop types, which are established for proper referencing and standard nomenclature.

- Exploratory workshops are in-depth investigations designed to improve understanding of a subject, including difficulties, solutions, and potential roadblocks. They can feature keynote speeches, flash lectures, small workshops, and discussion sessions to describe steps for furthering a topic and receive feedback from expert communities (Whittaker, Pegorie, Read, Birt & Foldspang, 2010; Chen & Wang, 2012, Chiaradonna & Trabattoni, 2009; Witteman, Stahl & Interdisciplinary Solutions in Health Care Group, 2013; Singh et al., 2018).
- Learning workshops are instructional events that teach specific skills or approaches to improve

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competency or self-assurance in a certain topic (Tate, 2009; Preszler, 2009; Ahadi et al., 2021).

- Workshops are collaborative undertakings in which persons with similar interests work together in interdisciplinary teams. Software programs and textual articles are examples of end products. Humanities workshops, in which academics transcribe or explain historical texts, resemble industrial workshops more than traditional inquiry or instructional workshops (Li, Zhang, Hui, Lang, 2020; Gottesdiener, 2002; Bloomer et al., 1997).

Change in education often entails the development of four forms of capacity: human, organizational, structural, and material (Century, 1999). Human capacity includes the ability to think and willpower to make changes, whereas organizational capacity includes interaction and communication. Policies, processes, and practices are examples of structural capability that is not dependent on employees. Material capacity covers all resources and equipment required. These capacity kinds are interrelated, and expansion in one area is contingent on expansion in another. To achieve organizational transformation goals, capacity-building activities should align and target all four categories (Harsh, 2010).

According to Bullen (2022), a capacity development workshop is not the ideal approach to master complicated technical skills or create new ways of thinking. A thorough training course, long-term coaching, and practical experience may be preferable. Longer-term activities such as mentorship or exchange trips are required to create new ways of thinking, such as from a diversity or human rights viewpoint. Small group discussions are unlikely to be effective in solving an issue like this.

Kurbalija (2022) stresses the importance of digitalization in capacity development and training, asking institutions to make informed policy decisions in the areas of cyber security, data, and artificial intelligence. He proposes adapting current training programs in the food, migration, human rights, and commerce sectors to address digitalization concerns, with an emphasis on transdisciplinary elements of digital policy.

In brief, a workshop is a short educational session that offers participants practical skills, techniques, or concepts that they may apply in their job or daily life. Most participants have seen substantial transformations by the conclusion of the program, creating interpersonal ties, diving into unfamiliar subjects, and acquiring useful insights.

Studies on the Measuring Training Effectiveness

A workshop impact evaluation is essential for recruiting possible funders and boosting attendance. This aids in resolving complaints and establishing the worth and effectiveness of the activity. A consistent approach enables comparison analysis over time, indicating progress, flaws, and the requirements for altering the workshops to attain the best results for the intended participants. This aids in increasing attendance and establishing the worth of the seminars.

Overall training effectiveness (OTE) is the amount to which training objectives are met and benefits organizers and trainees, and it may be measured using a mix of satisfaction, learning performance, individual performance,

and organizational performance (Goldstein, 2000; Kirkpatrick, 1986 & 1996; Holton, 2005; Tai, 2006; Bersin, 2008; and Noe, 2010).

Kirkpatrick's educational evaluation standards model (1959a, 1959b, 1960a, 1960b) is well known and widely used. This paradigm proposed his four "levels" of training evaluation criteria: Reaction, Learning, Behavior, and Results (Griffin, 2010). Donald Kirkpatrick's four-point evaluation model, introduced in 1959, is a widely used and admired evaluation model in training and development programs. It provides a logical framework for evaluating results and effectiveness in terms of individual and organizational performance, according to Ibrahim (2008).

Kirkpatrick's theory of training evaluation consists of four levels: response, learning, job performance, and organizational impact. These levels are complex and time-consuming, but they provide valuable information. The first level assesses the learner's reaction to the program, influenced by comments on content, materials, instructors, facilities, and delivery techniques (Kirkpatrick, 1959a; Kirkpatrick & Kirkpatrick, 2005, 2006). Positive feedback encourages involvement, while negative feedback discourages it. Both positive and negative feedback can be used to improve the program and gain organizational support.

Level 2 content evaluation assesses workers' learning outcomes from a training program, focusing on attitudes, knowledge, and abilities. Although studies do not always show that learned information leads to behavioral changes or improved work performance (Kirkpatrick & Kirkpatrick, 2006), Level 2 assessments are popular. Evaluating learning is crucial as without it, no behavioral change occurs.

The third level examines employee job performance, addressing learning transfer. Behavioral evaluations are more complex and time-consuming than response and learning tests at Levels 1 and 2 (Kirkpatrick and Kirkpatrick, 2006).

Level 4 is the most important and difficult to analyze, as it measures and values genuine organizational changes as a result of training (Werner & DeSimone, 2005; Kirkpatrick, 1960b; Kirkpatrick, 1998; Phillips, 1996a). This level is particularly significant for programs aimed at increasing sales, reducing accidents, lowering turnover, lowering expenses, or increasing output, as they can be measured in terms of results.

Despite its simplicity and ease of understanding, the model has faced criticism for its limitations, such as limited correlation between levels, insignificant correlation between evaluation stages and training objectives, potential oversimplification, and lack of a hierarchical structure (Alliger and Janak, 1989) & Alliger et al., 1997). As a result, researchers have developed different theoretical frameworks to explain the effectiveness of training programs, emphasizing the need for more comprehensive and effective training methods.

This study focuses on the failure in implementing inclusive education programs in mainstream schools in the Sindh province. The main challenge is providing effective training and capacity development programs for in-service teachers in urban and rural areas. The study examines the efficacy of capacity-building workshops focused on

inclusive education in Sindh, aiming to develop a distinctive in-service training scheme that includes learning modules, instructional resources, and a virtual platform. The expected outcomes include changes in teachers' perception, comprehension, and demeanor, along with the availability of accessible professional development programs for educational establishments. The study explores the use of capacity building workshops by educators and discusses the core concepts of Kirkpatrick's theory of training evaluation.

2. METHODOLOGY

Research Design

The project was executed using the 'Capacity Building workshops' method, and participants' understanding was assessed using the pretest-posttest design. Kirkpatrick's evaluation model is used to assess training effectiveness.

Phases of Impact Assessment

This study evaluates the effectiveness of capacity building workshops for special and mainstream teachers using three methods. The first method is the pre-post-workshop impact assessment using the Scale for Diversity, Disability, and Inclusive Education Awareness [SDDIEA]. The second method evaluates participants' comprehension level using multiple-choice questions. The third method assesses the workshop's overall effectiveness using evaluations at Kirkpatrick levels 2 (Pre-post workshop Knowledge gains) and 3 (Post workshop feedback analysis).

Apparatuses

Pre- post-workshop impact assessment

The study analyzed literature and developed the Pre- and Post-Test Scale for Diversity, Disability and Inclusive Education Awareness (SDDIEA), which focuses on three domains: awareness of fundamental human rights, familiarity with disability-related issues, and sensitivity towards diversity. The scale includes fifteen items derived from the Convention on the Rights of Persons with Disabilities. The tool was analyzed by six academic staff members and 20 pre-service teachers, and scale items were modified through face-to-face interviews.

Pre- post workshop Knowledge gains

The study used Kirkpatrick's Evaluation Model to assess participant knowledge at Kirkpatrick level 2, using multiple-choice questions (MCQs) for impartial assessment. The examination focused on understanding diversity, disability awareness, and inclusive education. The study avoided unfamiliar terms to avoid distractions. The examination consisted of twenty questions on three themes: diversity awareness, disability awareness, and inclusive education. The advantages of the study include ease of assessment, quick scoring, and the ability to assess a wide range of subjects and educational goals. Table 1 presents the numerical representation of the weightage assigned to each theme.

Table 1
Weightage given to themes in MCQs test

S. #	Theme	No. of Questions	Percentage
Understanding about diversity			
1	[The study focused on "Ability Diversity," recognizing variations from ethnicity, gender, age, race, religion, and disability, with disability as a subset].	05	25
Awareness about Disability			
2	[Disability awareness involves understanding and accepting the unique experiences of individuals with disabilities, moving beyond comfort levels to gain a deeper understanding].	08	40
Inclusion and Inclusive Education			
3	[Inclusive education, as outlined in UNESCO's Convention against Discrimination in Education and Sustainable Development Goal 4, aims to eliminate all barriers to education, promoting equity and quality].	07	35
Total		20	100

Post workshop feedback analysis

The study used the Workshop Evaluation Form Rating Scale, a standardized evaluation tool, to assess teachers' knowledge and skills post-workshop. The 20-item scale had

five options and included written comments and critiques from participants. The aim was to identify areas for improvement and enhance the facilitators' contributions' value. Following indicators are considered in constructing the scale (Table 2):

Table 2
Indicators considered in constructing the workshop evaluation scale

Parameter	Indicators
1] Content of the workshop	1.1 The intended outcome of the workshop 1.2 The workshop's outline and order of topics to be covered 1.3 The workshop short and simple to understand 1.4 Each participants received personalized attention and care 1.5 The duration of the workshop 1.6 The format for teaching during a workshop
2] Facilitator	2.1 The presence of the facilitator assisting the process 2.2 The methodology adopted by the facilitator 2.3 The way facilitator helps participants do something 2.4 The imparting of knowledge or guidance skills of the facilitator 2.5 Being aware of and caring about how participants feel and are treated. 2.6 Being able to give answers to questions 2.7 Mastery of subject matter expertise. 2.8 The ability to organize and control tasks and processes. 2.9 Doing things at the right time or being punctual.
3] Instructional materials used	3.1 The overall look and feel of the educational resources applied. 3.2 The components of educational resources utilized. 3.3 The quality of educational resources utilized for instruction. 3.4 The suitability of the teaching materials utilized. 3.5 The ease of comprehending the materials.

Procedure

A consultation meeting at the University of Karachi focused on refining a capacity-building training program for in-service teachers. The meeting involved ten general education teachers and ten Regional Directors. Five modules were approved and disseminated through an eight-hour workshop. The program included special education teachers and required proficient trainers in Braille, sign language, mobility, orientation, and literacy instruction. The 423 participant teachers who attended the capacity-building workshops provided valuable input. The following is a comprehensive compilation of these events.

- Karachi: August 26, 2022
- Karachi: September 11, 2022
- Karachi: September 26, 2022
- Karachi: October 07, 2022
- Karachi: October 27, 2022
- Karachi: November 10, 2022
- Karachi: November 24, 2022
- Karachi: December 04, 2022
- Karachi: January 12, 2023
- Karachi: January 27, 2023
- Hyderabad: February 10, 2023
- Mirpur Khas: February 17, 2023
- Shaheed Benazirabad: March 03, 2023
- Sukkur: March 10, 2023
- Larkana: March 17, 2023

The research was divided into three stages: pre-post-workshop impact evaluation, pre-post-workshop knowledge gains, and post-workshop feedback analysis. To enhance individual scores, the pre-post-workshop impact evaluation included pre-test, competency-based activities, and a post-test. An initial session was followed by a customized

multiple-choice assessment in the pre-post workshop knowledge gains phase. A quantitative study approach was employed for the post-workshop feedback analysis.

Analysis

The study used various academic activities such as instructional delivery, case studies, competency-based exercises, group discussions, and individual presentations. Data was collected through a meticulously constructed pretest/post-test survey administered within the targeted subject domain. The cohorts were assessed for compliance with the training modules. The data analysis used descriptive statistics, including mean and standard deviation, to interpret the workshop outcomes. The collected data was then analyzed using paired t-tests to draw valid and reliable conclusions. The study aimed to achieve immediate impact through various academic activities.

3. FINDINGS

Demographic information about the participants

The study found that 57% of participants were female, with 43% being male. The majority of participants were aged 40-59 years, with 69% being from Karachi districts. The majority were from Shaheed Benazirabad and Mirpur Khas. Only 7% were from Sukkur or Larkana. 40% of the participants identified as special educators, while 31% were general education teachers. Pre-service teachers constituted the third largest cohort (26%). Only 3% of the trainees were affiliated with institutes that prioritize inclusive education. The demographic characteristics of the participants are presented in Table 3.

Table 3

Demographic information about the participants (N = 423)

Variables	Frequency (N)	Percent (%)
1] Gender		
Male	196	43
Female	227	57
2] Age (in years)		
20 – 29	58	14
30 – 39	72	17
40 – 49	190	45
50 – 59	103	24
3] District		
Karachi	268	63
Hyderabad	45	11
Mirpur Khas	40	09
Shaheed Benazirabad	41	10
Sukkur	15	04
Larkana	14	03
4] Education system		
General education	131	31
Special education	168	40
Inclusive education	14	03
Pre-service teachers	110	26

Pre- post-workshop impact assessment

Table 4 exhibits that the composite mean scores for the fifteen items in question exhibited a slight upward trend, rising from +0.65 during the pretest phase of the workshop

to the posttest phase. As a collective, the participating teachers exhibited a positive increase in certainty regarding their comprehension of the concepts pertaining to 'Diversity, Disability, and Inclusive Education Awareness.'

Table 4

Overall analysis of pretest – posttest results related to the three domains (n=423)

Domain	Before Workshop [Average of Domain Items]	After Workshop [Average of Domain Items]	Difference
1] Understanding and acknowledgement of fundamental human rights	3.46	3.84	-0.38
2] Understanding of disability	3.40	3.90	+0.5
3] Understanding and appreciation of diversity	3.68	4.75	+1.07
Average of all fifteen [15] items	3.51	4.16	0.65

To ascertain distinctions within the group, the researcher conducted a paired t-test. In order to assess disparities between groups, a one-way ANOVA was performed. A post hoc test was subsequently conducted to ascertain the presence of any dissimilarity observe among the groups. Following the establishment of homogeneity of variance and equality of regression coefficient assumptions,

ANCOVA was performed to control for any pretest covariance effects between groups. The present study revealed a statistically significant mean difference of 8.5 between the pretest score of 9.96 (SD=0.974) and post-test score of 18.46 (SD=1.205), with $t(138) = 92.24$ and $p < 0.01$ (as shown in Table 5). Moreover, a significant positive correlation ($r = 0.520$) was observed between the pretest and post-test scores.

Table 5

Change in pretest and post-test score before and after interventional instructions (n=423)

Variable pretest and post-test scores	Pretest score mean (SD)	Post-test score mean (SD)	Mean score difference (95% CI)	t-statistic (df)	p value
	9.96 (0.974)	18.46 (1.205)	-8.5 (-8.67,-8.31)	92.24 (138)	<0.001

Pre- post workshop Knowledge gains

According to Table 6, the analysis of the multiple-choice questions included 87% of the participants who completed both pre- and posttests. In the context of the multiple-choice definition test, a score of 1 was assigned to each accurate response, while a score of 0 was allocated to each inaccurate response. An examination of the quantitative

data of the workshop was conducted through the utilization of descriptive statistical analyses. The voluntary engagement of individuals in the pre- and post-surveys was accompanied by coding mechanisms that did not disclose personal information, effectively ensuring anonymity in data collection. The data pertaining to all participant teachers was scrutinized solely for the purpose of the project's reporting.

Table 6
Number of participants included in final analysis

Valid Respondents	Frequency	Percentage
Included those respondents who completed both pre- and posttests	366	87
Dropped those respondents who either attempted pre or posttest only	57	13
Total	423	100

During the pre- and post-assessment, a noticeable increase in knowledge regarding the concepts was observed in 60 percent of the questions among the participants. Conversely, no discernible changes in knowledge regarding

the concepts were detected in the remaining 40 percent of the questions. The workshop has effectively accomplished its stated objectives (see Table 7).

Table 7
Increase in knowledge regarding the concepts (n=423)

Theme	Q. No.	Survey Scores for MCQs Test						Responded by = N	Changes observed
		Pre		Post		Post-Pre			
		Mean	SD	Mean	SD	Mean	SD		
1] Understanding about diversity	1.	0.95	0.22	1.00	0.01	0.05	0.22	305 (82%)	No changes
	2.	0.53	0.51	1.00	0.08	0.45	0.50	356 (97%)	Increased
	3.	0.95	0.22	1.00	0.01	0.05	0.22	305 (82%)	No changes
	4.	0.33	0.48	0.88	0.33	0.64	0.49	366 (100%)	Increased
	5.	0.62	0.49	0.93	0.26	0.31	0.52	366 (100%)	Increased
2] Awareness about Disability	6.	0.48	0.51	0.62	0.49	0.14	0.68	360 (98%)	No changes
	7.	0.71	0.46	0.97	0.17	0.21	0.42	366 (100%)	Increased
	8.	0.88	0.33	1.00	0.02	0.07	0.40	358 (98%)	Increased
	9.	0.48	0.51	0.62	0.49	0.14	0.68	360 (98%)	No changes
	10.	0.53	0.51	1.00	0.08	0.45	0.50	356 (97%)	Increased
	11.	0.95	0.22	1.00	0.01	0.05	0.22	366 (100%)	No changes
	12.	0.90	0.30	0.90	0.29	0.00	0.38	366 (100%)	No changes
	13.	0.71	0.46	0.97	0.17	0.21	0.42	366 (100%)	Increased
3] Inclusion & Inclusive Education	14.	0.88	0.33	1.00	0.02	0.07	0.40	358 (98%)	Increased
	15.	1.00	0.00	1.00	0.00	0.00	0.15	366 (100%)	No changes
	16.	0.53	0.51	1.00	0.08	0.45	0.50	356 (97%)	Increased
	17.	0.33	0.48	0.88	0.33	0.64	0.49	366 (100%)	Increased
	18.	0.98	0.15	0.98	0.15	0.00	0.00	360 (98%)	No changes
	19.	0.62	0.49	0.93	0.26	0.31	0.52	366 (100%)	Increased
	20.	0.95	0.22	0.86	0.35	-0.09	0.31	305 (82%)	No changes

Table 8 presents a summary of the mean scores pertaining to the multiple-choice questions that were administered in both the pretest and posttest. The total

sample size for this analysis ranged between 305 and 366 participants. The data underwent a paired t-test analysis.

Table 8

A complete picture of the findings presents

Q. No.	Survey Scores for MCQs Test						Responded by = N	P value	Changes observed	S. #
	Pre		Post		Post-Pre					
	Mean	SD	Mean	SD	Mean	SD				
4.	0.33	0.48	0.88	0.33	0.64	0.49	366 (100%)	0.000004	Increased	
17.	0.33	0.48	0.88	0.33	0.64	0.49	366 (100%)	0.000004	Increased	
5.	0.62	0.49	0.93	0.26	0.31	0.52	366 (100%)	0.0002	Increased	
19.	0.62	0.49	0.93	0.26	0.31	0.52	366 (100%)	0.0002	Increased	
2.	0.53	0.51	1.00	0.08	0.45	0.50	356 (97%)	0.0004	Increased	
10.	0.53	0.51	1.00	0.08	0.45	0.50	356 (97%)	0.0004	Increased	
16.	0.53	0.51	1.00	0.08	0.45	0.50	356 (97%)	0.0004	Increased	
7.	0.71	0.46	0.97	0.17	0.21	0.42	366 (100%)	0.0008	Increased	
13.	0.71	0.46	0.97	0.17	0.21	0.42	366 (100%)	0.0008	Increased	
8.	0.88	0.33	1.00	0.02	0.07	0.40	358 (98%)	0.02	Increased	
14.	0.88	0.33	1.00	0.02	0.07	0.40	358 (98%)	0.02	Increased	
1.	0.95	0.22	1.00	0.01	0.05	0.22	305 (82%)	0.02	Increased	
3.	0.95	0.22	1.00	0.01	0.05	0.22	305 (82%)	0.08	No changes	
11.	0.95	0.22	1.00	0.01	0.05	0.22	366 (100%)	0.08	No changes	
6.	0.48	0.51	0.62	0.49	0.14	0.68	360 (98%)	0.09	No changes	
9.	0.48	0.51	0.62	0.49	0.14	0.68	360 (98%)	0.09	No changes	
12.	0.90	0.30	0.90	0.29	0.00	0.38	366 (100%)	0.5	No changes	
20.	0.95	0.22	0.86	0.35	-0.09	0.31	305 (82%)	0.5	No changes	
15.	1.00	0.00	1.00	0.00	0.00	0.15	366 (100%)		No changes	
18.	0.98	0.15	0.98	0.15	0.00	0.00	360 (98%)		No changes	

Participants showed a significant increase in understanding concepts related to inclusion, difference among people based on ability, stigmatization, and marginalization. They also learned about the social and human rights model of disability, which explains why a person in a wheelchair cannot vote. They also learned about person-first terminology, which expressions are appropriate for different situations. They also learned about the concept of inclusion within a group or structure, and the importance of workplace accommodations for physically disabled individuals. They also learned about the role of visual deficiency in grade V students. The study highlights the importance of understanding and addressing these concepts in society.

The participants' understanding of concepts was consistent in pre and post assessments, with no notable differences observed in certain items. These included choosing the best description of diversity, identifying disability according to the WHO, identifying statements inconsistent with medical models, identifying primary characteristics of children with dyslexia, identifying methods not directly related to special needs children, and recognizing the success of inclusive education in accommodating children with intellectual disabilities.

The pretest participants demonstrated a strong understanding of concepts such as diversity, inclusion,

disability, dyslexia, special needs, and inclusive education. They had an estimated accuracy rate of 0.90 or higher for concepts such as diversity, disability, dyslexia, and accommodating children with intellectual disabilities. The primary characteristics of children with dyslexia include a lack of direct connection to special needs. The success of inclusive education depends on accommodating children with intellectual disabilities in the classroom.

Post Workshop Feedback Analysis

The study assessed teachers' proficiency and competence in a capacity-building training workshop. Teachers scored the training objectives proficiently at 4.80, with clear and comprehensive content. The program's scope and sequence received a rating of 4.64, indicating compatibility with the designated time frame. The program pattern elicited excitement at 4.64, but the time period had a significant impact at 4.36, suggesting a lack of adequate training time.

The study emphasizes the importance of quality and effectiveness in training programs, emphasizing the importance of content and reflective reflections for professional development. The workshop content was found to be highly effective, with a mean score of 4.67 and a standard deviation of 0.509. The investigators believe that collaboration between district supervisors, school administrators, and teachers is crucial for creating effective professional growth initiatives.

Table 9

Results of the evaluation about the participants learning and improvement in their abilities during the workshop

Indicators	Mean	SD	Qualitative explanation
1.1 The intended outcome of the workshop	4.80	0.408	Very effective
1.2 The workshop's outline and order of topics to be covered	4.64	0.638	Very effective
1.3 The workshop short and simple to understand	4.80	0.408	Very effective
1.4 Each participants received personalized attention and care	4.80	0.408	Very effective
1.5 The duration of the workshop	4.36	0.700	Effective
1.6 The format for teaching during a workshop]	4.64	0.490	Very effective
Overall	4.67	0.590	Very effective

Table 10 reveals the evaluation of a training initiative's facilitator's competence in relation to teachers' knowledge and skills. Key indicators showed high effectiveness, with a score of 5.00. The facilitator's presence and skilled techniques increased attendees' attentiveness and participation. The investigator expressed confidence in the facilitator's ability to captivate audiences, which significantly enhanced the training program's accomplishment.

The workshop's effectiveness was significantly influenced by the facilitator's delivery, participant sensitivity, and competence in responding to inquiries (mean score: 4.84). A facilitator should display a positive, supportive demeanor, use constructive feedback to identify areas for improvement, maintain an approachable demeanor, and provide responses to inquiries. The dynamic engagement of participants was crucial, contributing significantly to the knowledge acquisition during the training.

The facilitator demonstrated punctuality and proficiency in completing a workshop within the designated timeframe, demonstrating proficiency in inclusive education (4.68). Their expertise and effective time management techniques ensured seamless execution of all aspects of the workshop. Efficient mastery of knowledge and training strategies are crucial for achieving workshop objectives and ensuring unity in the achievement of objectives (4.64). This factor is critical in achieving timely task completion and continued proficiency in assigned duties (4.56).

The workshop facilitator's assessment was highly efficacious, with an average rating of 4.80, indicating their expertise and credentials. This indicates their potential for successful training. The study highlights the importance of engaging a qualified and skilled speaker for successful training sessions, as the effective implementation and execution of a training program are crucial for its functional realization.

Table 10

Results of the evaluation about the participants learning and improvement in their abilities in terms of the Facilitator

Indicators	Mean	SD	Qualitative explanation
2.1 The presence of the facilitator assisting the process	4.92	0.276	Very effective
2.2 The methodology adopted by the facilitator	5.00	0.000	Very effective
2.3 The way facilitator helps participants do something	4.92	0.277	Very effective
2.4 The imparting of knowledge or guidance skills of the facilitator	4.84	0.374	Very effective
2.5 Being aware of and caring about how participants feel and are treated.	4.84	0.473	Very effective
2.6 Being able to give answers to questions	4.84	0.374	Very effective
2.7 Mastery of subject matter expertise.	4.64	0.700	Very effective
2.8 The ability to organize and control tasks and processes.	4.56	0.507	Very effective
2.9 Doing things at the right time or being punctual.	4.68	0.476	Very effective
Overall	4.80	0.384	Very effective

Table 11 shows the assessment outcomes of teacher-participants' knowledge and skills acquisition through educational resources during a training workshop. The readability of materials received the least average score, with a mean score of 4.52, indicating high efficacy. However, there may be slight imprecision with the used materials. The optimal selection of font size and style in PowerPoint presentations can significantly impact its overall effectiveness.

A large group of teacher-participants in a workshop expressed dissatisfaction with the formatting and typographical choices used. The effectiveness of the study was determined by the components and suitability of the teaching materials. The mean score for these indicators was 4.64, indicating high effectiveness. The participants believed that the necessary components, including appropriate activities and academic content, were incorporated for the workshop's efficacy. The quality index of high effectiveness was also observed.

The evaluations of teacher-participants show that the use of instructional resources has been highly effective, with a mean score of 4.60 and standard deviation of 0.498. The pedagogical resources used in the workshop have enriched and supported the facilitator's execution of the five modules. Participants in the capacity of teachers

agreed on the efficacy of the instructional materials in terms of appearance, features, caliber, illustrations, and comprehension. The use of instructional materials during training was found to enhance the knowledge and competencies of the participants.

Table 11

Results of the evaluation about the participants learning and improvement in their abilities in terms of the Instructional Materials Used

Indicators	Mean	SD	Qualitative explanation
3.1 The overall look and feel of the educational resources applied.	4.60	0.500	Very effective
3.2 The components of educational resources utilized.	4.64	0.490	Very effective
3.3 The quality of educational resources utilized for instruction.	4.60	0.500	Very effective
3.4 The suitability of the teaching materials utilized.	4.64	0.490	Very effective
3.5 The ease of comprehending the materials.	4.52	0.510	Very effective
Overall	4.60	0.498	Very effective

According to Table 12, the assessment outcomes of the teacher-participants pertaining to their acquisition of knowledge and skills through the usage of educational resources during the training workshop were demonstrated. It is evident from the aforementioned data that readability of materials attained the least average score in comparison to the other indicators. Despite the fact that its mean score currently stands at 4.52, denoting a high level of efficacy, it may be postulated that there exists a slight degree of imprecision with the utilized materials. The optimal selection of font size and style within a PowerPoint presentation may have a significant impact on its overall effectiveness.

According to the findings, a sizeable group of teacher-participants seated at the back part of the hall expressed dissatisfaction with the formatting and typographical choices employed throughout the entirety of the workshop session. The indicators of (2) components and (4) suitability of the teaching materials utilized were found to be significant in determining the overall effectiveness of the study. The mean score obtained for these indicators was 4.64, with a corresponding quality index of high effectiveness. Based on the findings, it can be inferred that the teacher-participants held the belief that the requisite components for ensuring the efficacy of the workshop had been incorporated, including activities and academic content that were deemed appropriate for the topic in question.

Overall, the evaluations submitted by the teacher-participants indicate that the utilization of instructional

resources has yielded a highly effective outcome, as evidenced by the mean score of 4.60 and standard deviation of 0.498. This signifies that the pedagogical resources implemented throughout the course of the workshop have enriched and supported the facilitator's execution of the five workshop module. More specifically, the participants involved in the capacity of teachers exhibited a high degree of agreement regarding the efficacy of the instructional materials with respect to their overall appearance, constituent features, caliber, suitability of illustrations, and ease of comprehension. The utilization of instructional materials during the training was found to be highly effective in augmenting the knowledge and competencies of the participating individuals.

The study suggests that the use of effective pedagogical resources can significantly enhance the academic proficiency of trainees, regardless of whether they are in academic or non-academic settings. The researchers believe that instructional materials significantly contribute to the positive outcomes of training, regardless of the learning mode. They also emphasize the importance of having tangible objects for demonstration purposes to effectively convey the subject matter and facilitate greater comprehension among learners. Therefore, careful development and evaluation of pedagogical resources are crucial to assess their suitability for the intended educational program. Additionally, the use of visually appealing, user-friendly, and resilient pedagogical resources is essential for a successful learning experience.

Table 12
Comments and Feedbacks

<p>1] The workshop components that were require enhancements:</p> <ul style="list-style-type: none"> • General presentation a bit long • A few small adjustments on exercises and case studies could be improved • The combinations of presentations and exercises • Short time for exercises • Time to read the exercise was not enough
<p>2. The workshop components that was particularly beneficial: aspects of the workshop that were the most useful</p> <ul style="list-style-type: none"> • All aspects especially the interactive learning activities • Facilitators were excellent • Workshop material well designed and appropriate • The participants were also engaged and provided useful insights • Diversity of the group • Balance between lectures and activities • Content/workshop modules • Facilitation • Practice • Group work • Presentations
<p>3] Suggestion to enhance the overall value of the facilitators' contributions:</p> <ul style="list-style-type: none"> • Change some activities (exercises to include good practices) • Adjust time needed for certain sessions • More time to interactive learning activities • Would be interesting to have a two-day workshop

Discussion

The study investigates the failure of implementing inclusive education programs in mainstream schools in the Sindh province. It aims to develop a unique in-service training scheme for special and general education teachers, incorporating learning modules, instructional resources, and a virtual platform. The project was initiated during the 2022 floods in Karachi city, which caused significant destruction to residential, transportation, farming, irrigation, and communication facilities. The remaining workshops were conducted in various districts of Sindh province, training 423 participants in inclusive education practices. The majority were aged 40-59, from Karachi districts, with a small minority from Hyderabad. The workshops were divided into three phases: pre-workshop, during, and after. The study uses Kirkpatrick's evaluation model to assess training effectiveness, and participants' responses are assessed using the Scale for Diversity, Disability, and Inclusive Education Awareness. The overall effectiveness of the workshop is measured using evaluations at levels 2 and 3, focusing on initial reaction, knowledge acquisition, behavioral changes, and overall results.

The investigation revealed that some participants did not follow the recommended training modules, but an unexpected difference in scores was observed between the pretest and post-test. This could be due to attendees exerting more effort during the workshop. The post-test results showed a significant impact on participants' comprehension, indicating the effectiveness of the training exercise. The outcome of this is congruous with previous investigations carried out by Baral and co-researchers (2012) and the study conducted by Dhungana et al. (2015).

The study used a quantitative research method, but future workshops suggest a blended approach involving both quantitative and qualitative data analysis, including focus groups. This approach enhances understanding of research problems by incorporating qualitative data, as suggested by Creswell and Plano Clark (2011).

The research indicates that teachers, regardless of their educational background, have average knowledge about different disabilities. This may be due to insufficient training for teaching children with disabilities. Previous studies suggest teachers may have limited knowledge about different disability classifications (Saravanabhavan & Saravanabhavan, 2010). The B.Ed. program's professional development curriculum lacks a module on recognizing and handling disabilities in children which is also reported by Shukla and Agrawal (2015).

Research shows that meeting the needs of children with disabilities is challenging due to the lack of qualified personnel with the necessary knowledge and skills. Studies by Hameed and Manzoor et al., (2013), Shari and Vrandra (2015), and Ghouri et al., (2010) highlight the limited understanding among educators about disabilities and the necessary accommodations needed to support them. This lack of understanding is a major obstacle for students with disabilities in Pakistan (Hameed and Fazil (2012).

Saravanabhavan and Saravanabhavan (2001) suggest that negative attitudes towards people with disabilities stem from a lack of understanding about the additional support needed for children with disabilities. Romera (2022) emphasize the importance of teacher training in identifying disabilities, implementing pedagogical techniques, and effectively addressing the educational needs of students with disabilities. Group work

orientations, formal programs, informative discussions, seminars, and workshops can educate teachers about disabilities. Compulsory education on disabilities is recommended, especially for mainstream classrooms with special needs students. Special education teachers should support instructors in managing children with disabilities.

This study found that although educators understand inclusive education, they struggle to effectively implement it. Despite having a comprehensive understanding of inclusive education, they lack knowledge on teaching learners with additional support needs. Workshop attendees emphasized the importance of workshops in providing up-to-date insights and understanding disability-inclusive education, highlighting the need for more comprehensive implementation strategies.

Luningo (2015) highlights challenges teachers face in training, including lack of understanding, insufficient resources, differentiated instructions, supportive technology, and universal design principles, necessitating mandatory workshops for inclusive education. Inclusive education theory emphasizes the importance of teacher support and knowledge in managing learners with learning challenges in mainstream educational settings, as per Engelbrecht et al. (2001). Swart et al. (2002) highlight the challenges educators face in training, emphasizing the importance of adequate time, support, workshops, and in-service training for successful inclusive education implementation.

The study reveals that although teachers acknowledge the policy's existence, they lack understanding of its meaning and actions within their instructional setting. Inclusive education involves integrating all students into mainstream schools. Mittler (2003) reveals that teachers, while knowledgeable about policy texts, struggle to understand inclusive education policies and the existing curriculum, hindering their ability to effectively meet diverse classroom needs. Donald (2002) highlights the need for teachers to improve their understanding and expertise in inclusive education, stating that workshops and training are insufficient. Continuous skill development is crucial for successful implementation.

The study suggests that inclusive education policymakers should enhance the effectiveness of workshops by providing teachers with the necessary skills and knowledge to effectively implement these strategies. Avramidis et al. (2000) research reveals a strong link between inclusive education teacher training and effective knowledge attainment, subsequently enhancing professional development positively.

Teacher participants believe the capacity-building training sessions are insufficient, typically lasting eight hours and not frequently provided. They suggest extending the workshops to two consecutive days to cover all aspects of inclusive education, including differentiated instruction, adaptations, accommodation, co-teaching, and assistive technology use. The majority believe the workshops are insufficient. Garet et al. (2001) highlight that effective professional development for teachers are limited due to the prevalent one-time content-focused workshops. Nghipondoka (2020) found teachers' professional development time insufficient for inclusive education, hindering their ability to enhance understanding of key principles and practices.

Workshop participants highlight time constraints as the primary challenge in inclusive education, emphasizing the need for ample time for individuals to fully understand relevant knowledge, suggesting organizers allocate more time for trainees and well-trained teachers. The study participants agreed on the importance of workshops, despite extensive professional growth initiatives for teachers to understand inclusive education principles, highlighting the ongoing situation in the field. Faller and Feldmüller (2015) underscore the significance of educational competence in service provision, highlighting the necessity of comprehensive education and training systems, requiring teachers to possess inclusive knowledge and skills.

This study highlights the correlation between well-structured training sessions and the effectiveness of inclusive education practices, highlighting the importance of contextual variables in influencing teacher professional development. Prinsloo (2017) highlights that teachers often experience frustration, demotivation, and inadequacy due to their lack of knowledge and skills in promoting inclusive education. Bothma et al. (2016) recommend that both pre-service and in-service teachers should undergo workshops to acquire essential knowledge, skills, and values for effective student management.

The study highlights the importance of partnering with mainstream and special education teachers to develop an innovative pedagogical framework that improves their proficiency and future collaboration. It emphasizes the need for continuous effort and assessment of collaborative initiatives. The project aims to enhance professional growth and promote a constructive mindset, aligning ideas with the needs of both teachers. Research shows training significantly enhances teachers' sensitivity toward students with disabilities, positively impacting their attitude (Davies et al. 2013). Participants reported increased drive and awareness towards accommodating these students.

To summarize, it is stated that implementing a competency-based inclusive education workshop significantly boosts teachers' positive attitudes towards inclusive education, confirming Worthy et al. (2012) study's findings on the impact of such workshops on integrating disabled students into regular classrooms. This study, supported by Mathis's (2003) research, indicates that training or workshops aim to achieve a certain level of proficiency, which can positively influence one's mindset.

Siswono (2014) emphasizes the role of teachers in schools, who must possess pedagogical, personality, social, and professional competence. With rapid technological advancements, teachers must continuously enhance their knowledge and skills to adapt to evolving demands. Resources like competency-based workshops are available for continuous professional development. Inclusive education knowledge may have been acquired through personal experience or modules. The participants were offered an online course based on andragogy principles to address the deficiencies in previous workshops, which they agreed to participate in during the post-workshop stage.

The project's sustainability will be addressed through the following initiatives:

- This initiative's continued success and advancement necessitate the involvement of important stakeholders, including policymakers from the Departments of

Empowerment of Persons with Disabilities and Literacy and Education, Government of Sindh.

- An important step in this approach is the introduction of service training to the Sindh province's divisional headquarters, which is meant to boost the professional growth and capacities of education sector personnel.
- In order to proceed toward the creation of some new project proposals at the national level, an extra work is required to continue with this project.
- A strategy is in place to introduce a variety of educational programs focused on the inclusion, equity, and accessibility of children with disabilities in our society, such as courses, seminars, discourse analysis, and workshops.
- The strategy calls for the continuous dissemination of information via the project website.
- Finally, the project's sustainability would be assured by the distribution of its findings through various professional channels. These may entail, among other things, attending conferences, publishing articles, and recruiting M. Phil. and Ph.D. students to do research in the subject of inclusive education.

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Data Availability Statement

Due to privacy concerns, the data is not publicly available. But, certain de-identified data is accessible upon request.

Conflict interests

The authors declare that they have no conflicts of interest. The funders had no say in the study design, collection, analysis or interpretation of the data, preparation of the manuscript, or decision to publish the results.

References

- Ahadi, A., Bower, M., Lai, J., Singh, A., & Garrett, M. (2021). Evaluation of teacher professional learning workshops on the use of technology-a systematic review. *Professional Development in Education*, 1-17.
- Alliger, G. M., & Janak, E. A. 1989. Kirkpatrick's level of training criteria: Thirty years later. *Personnel Psychology*, 42, 331-342.
- Alliger, G. M., Tannenbaum, S. L., Bennett, W. Jr., Traver, H., & Shetland, A. (1997). A meta-analysis of the relations among training criteria. *Personnel Psychology*, 50, 341-358.
- Avramidis, E., Bayliss, P., & Bureden, R. (2002). A survey into mainstream teachers' attitudes towards the inclusion of children with special education needs in the ordinary school in one local education authority. *Educational Psychology* 20(2),191-211.
- Baral, N., Gautam, A., Lamsal, M., Paudel, B. H., Das, B. K. L., & Aryal, M. (2012). Effectiveness of teachers' training in assessment techniques: Participants' perception. *Kathmandu University Medical Journal*, 9(3), 189-192. <https://doi.org/10.3126/kumj.v9i3.6303>
- Bersin, J. 2008. *The training measurement book*. San Francisco: Pfeiffer/John Wiley & Sons.
- Bloomer, S., Croft, R., & Wright, L. (1997). Collaborative design workshops: A case study. *interactions*, 4(1), 31-39.
- Botha, J., & Kourkoutas, E. (2016). A community of practice as an inclusive model to support children with social, emotional and behavioural difficulties in school contexts. *International journal of inclusive education*, 20(7), 784-799.
- Brooks-Harris, J. E., & Stock-Ward, S. R. (1999). *Workshops: Designing and facilitating experiential learning*. Sage Publications.
- Bullen, P. B. (2022). Three questions to ask before organizing a capacity building workshop.
- Century, J. R. (1999, April). Determining capacity within systemic educational reform. Paper presented at the annual meeting of the American Educational Research Association, Montreal, Quebec, Canada.
- Chen, P. C., & Wang, X. (2012, August). Design for well-being in China: lessons learned from exploratory workshops. In *Proceedings of the 12th Participatory Design Conference: Exploratory Papers, Workshop Descriptions, Industry Cases-Volume 2* (pp. 81-84).
- Chiaradonna, R., & Trabattoni, F. T. (Eds.). (2009). *Physics and Philosophy of Nature in Greek Neoplatonism: Proceedings of the European Science Foundation Exploratory Workshop (Il Ciocco, Castelvecchio Pascoli, June 22-24, 2006)* (Vol. 115). Brill.
- Creswell, J. W., & Plano Clark, V. L. (2011). *Designing and conducting mixed methods research*. (2nd ed.). Sage Publications Inc.
- Davies, R. S., Dean, D. L., & Ball, N. (2013). Flipping the classroom and instructional technology integration in a college-level information systems spreadsheet course. *Educational Technology Research and Development*, 61, 563-580.
- Dhungana, G. P., Piryani, R. M., Chapagain, M. L., & Neupane, M. (2015). Effectiveness of teacher training conducted at Chitwan Medical College, Bharatpur, Nepal. *Journal of Chitwan Medical College*, 5(2), 1-5. <https://doi.org/10.3126/jcmmc.v5i2.13147>
- Donald, J. G. (2002). *Learning To Think: Disciplinary Perspectives*. The Jossey-Bass Higher and Adult Education Series. Jossey-Bass, Inc., 989 Market St., San Francisco, CA 94103.
- Engelbrecht, P., Forlin, C., Eloff, I., & Swart, E. (2001). Developing a support programme for teachers involved with inclusion in South Africa.

- Essien, E. E., Akpan, O. E., & Obot, I. M. (2016). The Influence of In-Service Training, Seminars and Workshops Attendance by Social Studies Teachers on Academic Performance of Students in Junior Secondary Schools In Cross River State, Nigeria. *Journal of Education and practice*, 7(22), 31-35.
- Faller, C., & Feldmüller, D. (2015). Industry 4.0 learning factory for regional SMEs. *Procedia Cirp*, 32, 88-91.
- Garet, M. S., Porter, A. C., Desimone, L., Birman, B. F., & Yoon, K. S. (2001). What makes professional development effective? Results from a national sample of teachers. *American educational research journal*, 38(4), 915-945.
- Ghouri, A. M., Abrar, N., & Baloch, A. (2010). Attitude of secondary schools' principles & teachers toward inclusive education: Evidence from Karachi, Pakistan. *European Journal of social sciences*, 15(4), 573-582.
- Goldstein, L. (2000). *Training in organizations: Needs assessment, development and evaluation* (2 ed.). Monterey, CA: Brooks/Cole.
- Gottesdiener, E. (2002). *Requirements by collaboration: workshops for defining needs*. Addison-Wesley Professional.
- Griffin, R. P. 2010. Means and ends: Effective training evaluation. *Industrial and Commercial Training*, 42(4), 220-225.
- Hameed, A., & Fazil, H. (2012). Sustainable quality education for the children with disabilities in Pakistan. *SAARC Journal of Educational Research*, 9(2), 14-24.
- Hameed, A., & Manzoor, A. (2016). Defeating inequalities in school access: A case of children with disabilities in Pakistan. *Journal of Research in Special Educational Needs*, 16, 345-350.
- Hameed, A., & Manzoor, A. (2019). Similar Agenda, Diverse Strategies: A Review of Inclusive Education Reforms in the Subcontinent. *Bulletin of Education and Research*, 41(2), 53-66.
- Harsh S. (2010). Chapter 1: Gaining perspective on a complex task: A multidimensional approach to capacity building. In S. Harsh, K. Bradley, K. Good, & J. Ross (Eds.). (2010), *Capacity building technical assistance: Change agent analyses* (pp.1-19). Charlestown, WV: Edvantia, Appalachia Regional Comprehensive Center.
- Holton, E. F., III. (2005). Holton's Evaluation Model: New evidence and construct elaborations. *Advances in Developing Human Resources*, 7(37), 37-54.
- Ibrahim, A. (2008). *Evaluating training effectiveness in the Malaysian public service* (Doctoral dissertation, Durham University).
- Kamala, R., & Ramganes, E. (2013). Knowledge of specific learning disabilities among teacher educators in Puducherry, Union Territory in India. *International Review of Social Sciences and Humanities*, 6(1), 168-175.
- Kirkpatrick DL. (1959a). Techniques for evaluating training programs. *Journal of ASTD*, 75 (11), 3-9.
- Kirkpatrick DL. (1959b). Techniques for evaluating training programs: Part 2-Learning. *Journal of ASTD*, 13 (12), 21-26.
- Kirkpatrick DL. (1960a). Techniques for evaluating training programs: Part 3-Behavior. *Journal ofASTD*, 14 (1), 13-18.
- Kirkpatrick DL. (1960b). Techniques for evaluating training programs: Part 4-Results. *Journal ofASTD*, 14 (2), 28-32.
- Kirkpatrick DL. (1967). Evaluation of training. in RL Craig, LR Bittel (Eds.), *Training and development handbook* (pp. 87-112). New York: McGraw-Hill.
- Kirkpatrick DL. (1976). Evaluation. in RL Craig (Ed.), *Training and development handbook*. (pp. 301-319). New York: McGraw-Hill.
- Kirkpatrick DL. (1977). Evaluating training programs, evidence vs. proof. *Training and Development Journal*, 31 (11), 9-12.
- Kirkpatrick DL. (1978). Evaluating in-house training programs. *Training and Development Journal*, 32 (9), 6-9.
- Kirkpatrick DL. (1979). Techniques for evaluating training programs. *Training and Development Journal*, 33 (6), 78-92.
- Kirkpatrick DL. (1985). Effective training and development, Part 2: In house approaches and techniques. *Personnel*, 62 (1), 52-56.
- Kirkpatrick, D. L. & Kirkpatrick, J. D. (2005). *Transferring learning to behavior: Using the four levels to improve performance*. San Francisco, CA: Berrett-Koehler Publishers.
- Kirkpatrick, D. L., & Kirkpatrick, J. D. (2006). *Evaluating training programs: The four levels* (3rded.). San Francisco, CA: Berrett-Koehler Publishers.
- Kurbalija, J. (2022). What is the difference between training and capacity development?
- Li, X., Zhang, F., Hui, E. C. M., & Lang, W. (2020). Collaborative workshop and community participation: A new approach to urban regeneration in China. *Cities*, 102, 102743.
- Luning, M. (2015). *Professional development for supporting teachers in implementing inclusive education: a case study of six schools in Butterworth and Dutywa districts, Eastern Cape* (Doctoral dissertation).
- Mansfield, S. (2020). Changing the face of academic skills workshops. *Journal of Learning Development in Higher Education*, (17).
- Mathis, W. J. (2003). Financial challenges, adequacy, and equity in rural schools and communities. *Journal of Education Finance*, 29(2), 119-136.

- Mittler, P. (2012). Working towards inclusive education: Social contexts. David Fulton Publishers.
- Mittler, P. (2017). International experience in including children with disabilities in ordinary schools. Paper prepared for a meeting organised by UNICEF on possibilities of inclusion.
- Nghipondoka, T. N. (2020). Exploring linguistic "creativity" on social media: A case of selected posts by Namibians on Facebook, Twitter and WhatsApp (Doctoral dissertation, University of Namibia).
- Noe, R. A. 2010. Employee training and development (5 ed.). Boston: McGraw Hill.
- Phillips, P. P. (2003b). Training evaluation in the public sector. (Doctoral dissertation, The University of Southern Mississippi, 2003). Dissertation Abstract International, A64/09, 215.
- Preszler, R. W. (2009). Replacing lecture with peer-led workshops improves student learning. *CBE—Life Sciences Education*, 8(3), 182-192.
- Prinsloo, D. J. (2017). Analyzing words as a social enterprise: Lexicography in Africa with specific reference to South Africa. *Analysing words as a social enterprise: Celebrating*, 40, 1-16.
- Romera, J. (2022). Diversity, equity, and inclusion survey.
- Saravanabhavan, S., & Saravanabhavan, R. C. (2010). Knowledge of learning disability among pre-and in-service teachers in India. *International Journal of Special Education*, 25(3), 132-138.
- Setaro, J. (2001, June). Many happy returns: Calculating e-learning ROI.
- Shari, M., & Vranda, M. N. (2015). Knowledge of primary school teachers in identifying children with learning disabilities. *Disability, CBR & Inclusive Development*, 26(3).
- Shukla, P., and Agrawal, G. (2015). Awareness of Learning Disabilities among Teachers of Primary Schools. *Online Journal of Multidisciplinary Research*, 1(1): 33-38.
- Singh, S., Lotz, N., & Sanders, E. B. N. (2018). Envisioning Futures of Design Education: An Exploratory Workshop with Design Educator. *Dialectic*, 2(1), 15-42.
- Siswono, T. Y. E. (2014). Developing teacher performances to improving students creative thinking capabilities in mathematics. In *Proceeding International Conference on Research, Implementation, and Education of Mathematics and Sciences*, May (pp. 18-20).
- Swart, R. E., Engelbrecht, P., Eloff, I., & Pettipher, O. R. (2002). Implementing inclusive education in South Africa: Teachers' attitudes and experiences. *Acta Academica*, 34(1), 175-189.
- Tai, W.-T. 2006. Effects of training framing, general self-efficacy and training motivation on trainees' training effectiveness. *Personnel Review*, 35(1), 51-65.
- Tate, M. L. (2009). Workshops. *The Learning Professional*, 30(1), 44.
- Whittaker, P. J., Pegorie, M., Read, D., Birt, C. A., & Foldspang, A. (2010). Do academic competencies relate to 'real life'public health practice? A report from two exploratory workshops. *European Journal of Public Health*, 20(1), 8-9.
- Witteman, H. O., Stahl, J. E., & Interdisciplinary Solutions in Health Care Group†. (2013). Facilitating interdisciplinary collaboration to tackle complex problems in health care: report from an exploratory workshop. *Health Systems*, 2, 162-170.
- Worthy, J., Consalvo, A. L., Bogard, T., & Russell, K. W. (2012). Fostering Academic and Social Growth in a Primary Literacy Workshop Classroom: "Restorying" Students with Negative Reputations. *The elementary school journal*, 112(4), 568-589.