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A Critical Review Of The Use Of Assistive Technologies In T he Education Of Children With Disabilities

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Abstract

Many researches on the use of assistive technology in the education of children with disabilities have been undertaken all around the world. The purpose of this thematic evaluation of literature was to look into the use of assistive technology in the education of children with disabilities. A total of 14 publications were reviewed and analyzed in this study utilizing a thematic literature review. The researcher's goal is to answer the question, "What are the challenges to using assistive technology in the education of disabled children?" What role does assistive technology play in the education of disabled children? What is the teacher's opinion on the use of assistive technology in the education of disabled children? It was utilized for Literature Identification Criteria, Inclusion Criteria and Screening for Inclusion, Quality and Eligibility Assessment, and Literature Typology. Data Analysis: The thematic textual narrative synthesis outlined and exemplified by is characterized by having a standard data extraction format by which various study characteristics (quality, findings, context, etc.) Textual narrative synthesis is an approach which arranges studies into more homogenous groups in the review. The researcher used thematic synthesis. The major finding of this reviewed articles showed that there were many barriers and benefits on usage of AT, the forwarded recommendations gave directions for future researches.

Keywords: Assistive Technology, Critical Review, Disability.

Introduction:

In the education of disabled children, assistive technologies have been acknowledged as crucial tools for all children with impairments. Assistive technology (AT) has enormous promise for assisting persons with disabilities in leading independent and satisfying lives and participating fully in society. People with disabilities, on the other hand, in many countries have very limited or no access to AT for a variety of reasons. (World Health Organization, 2019).

According to Pell et al., (1999) during the last two decades, the use of technology in society has increased rapidly. While this is affecting the everyday lives of all people, the use of technology offers a number of additional advantages to those with disabilities. Technology can provide alternative means to do what a disability prevents: it can read for people with visual impairments, speak for those with speech impediments and aid movement for people with physical disabilities. Technology can be a means of helping achieve independence and equity for people with disabilities.

According to Senjam et al., (2020) an availability of assistive technologies and financial constraints were the major barriers faced by students who

knew about assistive technologies but were not using them. The need for professional development and training and the integration of appropriate technical devices are vital to enhance the development of children with Assistive technology as an important supportive device for improving the vital skills of reading and writing comprehension(Tony, 2019).

To implementing assistive technology, appropriate training is necessary for teachers to optimize the needs of each child and to motivate the children for using suitable apps. In this context, professional development is an imperative and a necessity factor in implementing assistive technologies. (Tony, 2019).The purpose of this review was to analysis the research published in recent years (2000-2020) about barriers, benefits and important recommendations on usage assistive technologies in educating children with disabilities.

So that, the research questions are given in this context:

- What are the barriers of assistive technologies in educating children with disabilities?
- What is importance of assistive technologies in educating children with disabilities?
- What teacher's recommendations towards assistive technologies in educating children with disabilities?

Methods of the Study:

The study after millennium (2000 up to 2020) is designed to appreciate uses of assistive technology across the world .To this end, the method of review, searching literatures, selection, and analysis procedures were described as follows:

Literature identification: The researcher started the literature search by using the keywords "how to conduct literature review", "review methodology," "literature review," "research synthesis," and "synthesis." For each manuscript, preliminary relevance was determined by title. From the title, if the content seemed to discuss the methodology of the literature review process, we obtained its full reference, including author, year, title, and abstract, for further evaluation.

Similarly, one of its strengths is its proposal to comprehend the diversities and pluralities of understanding around scholarly research topics and the opportunity to speak with self-knowledge, reflective practice and acknowledgement of shared educational phenomena (Xiao & Watson, 2019).In order to obtain relevant literatures, publications falling under the topic assistive technology for students with disability Journal articles were searched online system. (i.e., SAGE, Elsevier, b.africa. Ok (Z- library),Taylor and fransic, Jostor ,b.sch-hub, Google Scholar To conduct literature review; explicit literature searching criteria is required (Xiao & Watson, 2019).After download all materials from the internet put in the one folder according to the year of published. Perhaps when put journals in the Mendeley software it's simply to identify materials according publisher year, author, and title .etc. Totally around 20 published articles were found in relation to the topic under investigation; 14n article were Mendeley software.

Inclusion criterion and Screening for inclusion: According to Xiao & Watson, (2019) describe about inclusion criterion and screening for inclusion the researcher only the selected journal was included studies to conducting a literature review. Literature reviews on a specific topic were excluded from this study. The researcher included studies from all disciplines usages of assistive technology for students with disability. The researcher only included studies written in English**.**

According to Xiao & Watson, (2019) in thematic reviews, the search criteria and the criteria for inclusion described explicitly .The researcher read the abstracts of the **14 studies** to further decide their relevance to the research topic the methodology of literature review. Eight researches performed parallel independent assessments of the documents. Differences between the reviewers' findings were discussed and resolved. A total 20 journals were considered

relevant and he obtained the full text article for quality assessment.

Quality and eligibility assessment: According to Xiao & Watson (2019) to address Quality and eligibility assessment, the researcher scanned through the full text articles to further evaluate the quality and eligibility of the studies. He supposed journal articles published by reputable publishers as high quality research, and therefore, included them in the review. Most of the technical reports and online presentations are excluded from the review because of the lack of peer review process

Typology of Literature Reviews

Broadly speaking, literature reviews can take two forms: (1) a review that serves as background for an empirical study and (2) a standalone piece .Background reviews are commonly used as justification for decisions made in research design, provide theoretical context, or identify a gap in the literature the study intends to fill. (Xiao & Watson 2019)

In contrast, standalone reviews attempt to make sense of a body of existing literature through the aggregation, interpretation, explanation, or integration of existing research. (Xiao & Watson 2019).Ideally, a systematic review should be conducted before empirical research, and a subset of the literature from the systematic review that is closely related to the empirical work can be used as background review. (Xiao & Watson 2019)**.** For the purpose of this article, when we talk about literature reviews, the researcher is referring to the systematic review.

Data Analysis:

The first category of review, whose aim is descriptive, is the most common and easily recognizable review. (Xiao & Watson 2019) .The researcher used analyzed the thematic textual narrative synthesis out lined and exemplified by is characterized by having a standard data extraction format by which various study characteristics (quality, findings, context, etc.) (Xiao & Watson 2019.) Textual narrative synthesis is an approach which arranges studies into more homogenous groups(Barnett-Page & Thomas, 2009) A realist review is commonly used to evaluate policy in practice and looks to answer the question of what works for whom, under what circumstances/conditions, and how(Xiao & Watson 2019.)

The researcher was use thematic synthesis. The method was developed out of a need to conduct reviews that addressed questions relating to intervention need, appropriateness and accept ability as well as those relating to effectiveness without compromising on key principles developed in systematic reviews. (Barnett-Page & Thomas, 2009) In relation to this, (Xiao & Watson 2019.) stated that the results of thematic literature analyzed qualitatively.

Inductive analysis strategy was used for the analysis of the collected data. In supporting this idea, the APA (2020) guideline specified that the analysis of narrative literature review could be arranged based on the similarities in the concepts of reviewed articles.

The main feature in the mixture of research is the interpretation of concepts between studies. Thematic synthesis was made in two stages. Stage one involves the reading of selected articles; in the second stage was grouped literature according to their objectives and created themes that represent the findings of the study. Consequently, the results of this study categorized in to two different themes: describes the barriers, benefits and perspective to wards teachers about assistive technology for students with disabilities.

Results:

The primary focus of this review was to investigate research conducted on describes the barriers, benefits and recommendation to wards teachers about assistive technology for students with disability.

Under this section it is aim to address how the writes look this tittle and their finding in relation to the title. It begins with presenting the findings of the study in to two themes and followed by analysis of data from the publications included in the review. The findings are presented below under emerged themes.

Reviewed Article: I

Aim: Exploring barriers to the use of computer assistive technology among students with visual impairment at Akropong School for the Blind.

Methods: He used Case study design and purposive sampling technique used to select 35 participants for the study. He used qualitative data and in-depth interview**.**

Importance: He suggested that, for planning appropriate intervention for the optimum utilization of assistive technology there by improving the quality of life in Students with visual impairment.

Barriers: He addressed that Individual response to the training and familiarity in developing their competencies in using computer assistive technology and Lack of usages keyboarding skills.

Recommendations: Should be made to stock the laboratory with additional computers, More practice time should be created for the students to maximize use of computers. **(Ampratwum, 2016)**.

Reviewed Article: II

Aim: To understand the barriers faced in using ATs by students who have heard of ATs and reported needing them, but were not using (acquainted students), at schools for the blind in Delhi**.**

Methods: Two hundred and fifty students were selected randomly from ten schools for the blind in Delhi and screened for presenting and pinhole binocular distance vision using a modified 'E' chart and multiple pin holes occludes. Students were divided into two groups; 1/60 or better vision (likely to benefit from vision-based AT) and <1/60 vision, (likely to benefit from tactile/sound-based AT). Awareness of, and need for, ATs was investigated for each student with a questionnaire. Then information on barriers to using AT was obtained from students who knew about AT, felt they needed AT, but were not using them. This information was collected for a total of 42 ATs.

Importance: they writers suggested that Children with visual disability benefit from various types of assistive technology to improve their academic learning**.**

Barriers: They stated that Lack of Trained person on usage of this assistive technology.

Recommendations:-The need for assistive technologies will increase in low- and middle-income countries over time; each school for the blind should be equipped with relevant and sufficient assistive technologies for various educational activities, and appropriately trained teachers of assistive technology. **(Senjam et al., 2020)**

Reviewed Article III

Aim: reviewed in order to identify current barriers to its effective integration within schools.

Method: A team model for assistive technology assessment and planning is proposed to optimize the educational goal achievement of children with multiple disabilities.

Importance: This paper stated that to improve access and participation of children with disabilities in their school and home environments.

Barriers: lack of appropriate staff training and support, negative staff attitudes, inadequate assessment and planning processes, insufficient funding, difficulties procuring and managing equipment, and time constraints.

Recommendation: A team model for assistive technology assessment and planning is proposed to optimize the educational goal achievement of children with multiple disabilities. **((International Therapy ,2004)**

Reviewed Article IV

Aim/Research question: How can AT be effectively used for IE in developing countries?

Methods: Case study approaches to gather data. Interviews and observation were conducted in two selected developing countries, three experts in the field and 18 informants of the two selected

countries were interviewed in person, by phone or by email.

Importance: - Effective use of assistive technologies (AT) can help governments in developing countries achieve inclusive education by helping children with disabilities in schools.

Barriers:-Lack of attention to five management establishment and maintenance of professional networks: identification and maintenance of knowledge and expertise; funding management; coordination among ministries, and implementation, maintenance, and monitoring of a national program.

Recommendation:-Governments in developing countries adopt a systematic approach in tackling obstacles at each level and pay attention to five management challenges development drawing on incentives-based cooperation from all stakeholders. **(Åke Grönlund, 2010)**

Reviewed Article V

Aim:-To determine the types and the effectiveness of educational preparation and experiences regarding assistive technologies; identify concerns, barriers, and additional education experiences that are considered important for effectively accessing, evaluating, and implementing assistive technology services; and determine the extent of family involvement in the selection and use of appropriate assistive technologies.

Methods: systematic sampling procedure was employed. ECSE professionals from North Carolina were selected randomly from the 1995 North Carolina Preschool Handicapped Training and Technical Assistance Directory. From this directory list of approximately 270 names, 88 (33%) names were randomly selected by geo-graphic area.

Finding

Importance:-Assistive technology is increasingly being used by young children with disabilities to enhance their quality of life**.**

Barriers:-lack of family involvement in assistive technology decision making suggest that many frontline service providers lack preparation in family-centered practices, Availability of and funding for assistive devices.

Recommendations: State assistive technology service delivery systems and local policymakers should provide more training to service providers and families, In addition, the development and implementation of strategies to overcome barriers regarding access to, provision of, and funding for assistive technology devices and services needs to be addressed. **(Lesar, 2015)**

Reviewed Article VI

Aim; aim is to increase access to high-quality affordable assistive products (AP) for everybody in need**.**

Methods: A systematic literature search was carried out to identify barriers and potential facilitators for access to AT for people with Intellectual Disabilities globally.

Finding

Importance:-Technology is being used to help foster physical fitness and wellness. Various devices are being used successfully to provide visual and auditory prompts (on palmtop computers or lower tech recorders) that foster task completion, Assistive technology (AT) is essential for all individuals.

Barriers:-costs and funding, information about the devices, availability of alternatives, the complexity of designing devices for people with Intellectual Disabilities.

Recommendations: Education and training programs for health professionals. **(Boot et al., 2018)**

Reviewed Article VII

Aim: To summarize current knowledge on assistive technology for low- and lower-middle-income countries published in 1995 or later, and to provide recommendations that facilitate implementation of the UN Convention on Rights of Persons with Disabilities(CRPD).

Methods: Literature was searched in web-based databases and reference lists. Studies carried out in low- and lower- middle-income countries.

Finding

Importance; Creating opportunities assistive technology for people with disabilities to exercise human rights interference of Convention on Rights of Persons with Disabilities (CRPD) addresses this area

Barriers; Low income countries, it has been a missing bridge along the road to human rights and development**.**

Recommendation: According to UN governments should make assistive technologies for personal mobility available at affordable cost (Article 20). 164 J. Borg et al. Governments should take all appropriate measures to ensure the full development, advancement and empowerment of women (Article 6), Governments should take all necessary measures to ensure the enjoyment by children of rights and freedoms and provide them with disability and age appropriate assistance (Article 7),Governments should take all appropriate measures to eliminate discrimination on the basis of disability (Article 4),Non-discrimination, equality of opportunity and equality between men and women are three principles of the CRPD (Article 3). **(Borg, Larsson, et al., 2011).**

Reviewed Article VIII

Aim: This article defines the Environmental Factors of the ICF and describes how ATs can improve the functioning of individuals with disabilities in community environments. Emphasis is placed on the need for comprehensive assessment before selecting ATs, particularly of the individual's current goals, past experiences with the use of technologies and other supports, and predisposition to use the AT as well as alternative or additional supports**.**

Methods: Previous research identified correlates of successful AT use and other supports by persons with disabilities. Key studies are reviewed with a discussion of the implications of findings on the further development of the ICF**.**

Importance: A person with disability by using AT can function more independently (i.e., perform Activities) is the support of ATs, which make it possible for them to pursue employment and education and become involved in civic affairs

Barriers: Environmental barriers (including the lack of appropriate AT) detract from people's ability to participate in society and perform desired activities.

Recommendation: Technologies are most effective when they are collaboratively selected and shaped to meet and enhance a consumer's particular functional and social needs, not when they are prescribed as an isolated means of addressing a physical limitation**. (Scherer & Glueckauf, 2005)**

Reviewed Article IX

Aim: to analyze assistive technology literature for students with disabilities**.**

Methods .from published journals 57 literature and n = 17 manuscripts were identified in the special education technology field studies**.**

Findings:

Importance:-Assistive technology devices and software are available that, with careful planning and guidance, can benefit students with disabilities

Barriers: cost, lack of teacher training; support and maintenance and lack of adequate curricula.

Recommendation: Special needs education teachers are given increased responsibilities for students with disabilities in their classroom. **(Sze, 2009)**

Reviewed Article X

Aim:-To identify consumer perspectives regarding barriers and facilitators to optimal mobility for a heterogeneous population of impaired Victorians who use assistive technology in their daily lives

Methods:-An accessible survey investigated the impact of supports or facilitators upon actual and desired life outcomes and health-related quality of life, from 100 AT users in Victoria, Australia.

Finding

Importance - Enhancing the community awareness.

Barriers: - A range of barriers and enablers to community mobility were identified including access to AT devices, Environmental interventions, public transport, and inclusive community environs.

Recommendation:-Local government authorities, government departments dealing with such infrastructure as transport, or individual businesses. **(Layton, 2012)**

Reviewed Article XI

Aim: This article presents an overview of current AT services including service delivery models, universal design, effects of AT devices on students with disabilities, and issues and challenges in providing AT services**.**

Methods: An embedded preliminary case study that explored how some of the education and rehabilitation agencies deliver AT services indicated

Finding

Importance: - improves student ability to assimilate and communicate text in a longer perspective, it influences their motivation for schoolwork in general and reading in particular areas.

Barriers: - Lack of Training at the school on AT**.**

Recommendation; Schools better facilitate training for Teachers on Assistive Technology in school **(Lee & Templeton, 2009)**

Reviewed Article XII

Aim:- Assistive technology can provide a key tool to enabling independence, greater inclusion and participation in society for individuals with chronic conditions

Methods: A systematic literature search of five scientific databases (PubMed, SCOPUS, PsycINFO, CINAHL and Medline) was conducted to identify relevant qualitative studies.

Finding

Importance: Enable students with VI can learn their education in easy way.

Barriers: No availability AT, Lack of trains in school for blind and financial constant.

Recommendation: Trains educators and allocate adequate budget regularly. **(Howard et al., 2020)**

Reviewed Article XIII

Aim: Assistive technology (AT) may enable people with dementia to live safely at home for longer, preventing care home admission

This systematic review assesses the effectiveness of AT in improving the safety of people with dementia living in the domestic setting, by searching for randomized controlled trials, nonrandomized controlled trials and controlled before-after studies which compared safety AT with treatment as usual**.**

Methods: Seven bibliographic databases, the Social Care Institute for Excellence website and the Alzheimer's Society website were searched for published and unpublished literature between 2011– 2016. Search terms related to AT, dementia and older people. Common outcomes were meta- analyzed**.**

Finding

Importance: Assistive technology (AT) may enable people with dementia to live safely at home for longer, preventing care home admission

Barriers:-Limited evidence is available regarding the effectiveness of AT in improving the safety of people with dementia (PwD) in the domestic setting.

Recommendation:-Practitioners working with (PwD) in such a situation, such as occupational therapists, social workers and doctors should consider providing or referring for the safety AT items or packages tested in this review. **(Brims & Oliver, 2018)**

Discussion

According to Ampratwum (2016), preparing suitable intervention for the optimal usage of assistive technology increases the quality of life in students with visual impairment, which is in line with the importance of employing AT for students with various impairments. Children with visual impairments benefit from a variety of assistive devices to help them learn more effectively in school (Senjam et al., 2020).

It is critical to promote access and engagement in their school and home situations, according to International, O. T. (2004). Using assistive technology (AT) effectively in underdeveloped countries can help governments achieve inclusive education by assisting students with impairments in classrooms (ke Grönlund, 2010). According to Lesar (2015), young children with impairments are increasingly using assistive technology to improve their quality of life.

Physical fitness and wellbeing are being promoted through the use of technology. Various gadgets (on palmtop computers or low-tech recorders) are being effectively employed to deliver visual and aural reminders that encourage job completion (Bryant et al., 2010). All people require the use of assistive technology (AT) (Boot et al., 2018). The Convention on the Rights of Persons with Disabilities (CRPD) entitles its beneficiaries with rights to assistive technology to ensure their full and equal enjoyment of all human rights and fundamental freedoms. (Borg, Lindström, et al., 2011). Creating opportunities assistive technology for people with disabilities to exercise human rights interference of Convention on Rights of Persons with Disabilities (CRPD) addresses this area(Scherer & Glueckauf, 2005).

According to Sze (2009), assistive technology equipment and software are available that can aid kids with impairments with appropriate planning and coaching. Increasing public awareness (Layton, 2012). In addition, AT can help students understand and express content in a more long-term context. It has an impact on their drive to do education in general and reading in particular (Lee & Templeton, 2009).

As Brims & Oliver (2018) mentioned, students with visual impairment can easily gain their education, according to Howard et al. (2020). Assistive technology (AT) may allow persons with dementia to live comfortably at home for extended periods of time, avoiding placement in a care centre.

AT usage difficulties for students with multiple disabilities: in connection to AT usage barriers Keyboarding talents aren't being used to their full potential (Ampratwum, 2016). The lack of availability or restricted possession of ATs, as well as cost restraints, were the most significant obstacles. People were taught how to use assistive technology. Poor staff training and assistance, unfavorable employee attitudes, insufficient evaluation and planning procedures, insufficient budget, challenges buying and maintaining equipment, and time restrictions are all issues that need to be addressed (International, O. T. 2004).

According to ke Grönlund (2010), a lack of of attention to five management functions: establishment and maintenance of professional networks; identification and maintenance of knowledge and expertise; funding management; coordination among ministries; and implementation, maintenance, and monitoring of a national program. The lack of family involvement in assistive technology decision making suggests that many frontline service providers lack preparation in family-centered practices. Lack of availability of and funding for assistive devices (Lesar, (2015). According to Bryant et al.,(2010)costs and funding, information about the devices, availability of alternatives, the complexity of designing devices for people with ID, the complexity of devices themselves, staffing concerns, device upkeep, and quality assessments. Lack of funding/costs ‘technology have access to it ,Lack of awareness about are factors for availability AT(Boot et al., 2018)The World Health Organization (WHO)

estimates that in low and middle-income countries only 5–15% of people requiring assistive technology have access to it. (Borg, Lindström, et al., 2011).Environmental barriers (including the lack of appropriate AT detract from people's ability to participate in society and perform desired activities(Scherer & Glueckauf, 2005) ,Cost and obsolescence, teacher training, support and maintenance and adequate curricula (Sze, 2009). A range of barriers and enablers to community mobility were identified including access to AT devices, environmental interventions, public transport, and inclusive community environs. (Layton, 2012).

According to Lee & Templeton, (2009) the lack of Training at the school on AT .No availability AT ,Lack of trains in school for blind Financial constant . (Howard et al. 2020).Limited evidence is available regarding the effectiveness of AT in improving the safety of people with dementia (PwD) in the domestic setting. (Brims & Oliver, 2018)

The forwarded Recommendation on the reviewed journals usage Assistive Technologies for students with multiple disabilities

According to Ampratwum, (2016) should be made to stock the laboratory with additional computers. More practice time should be created for the students to maximize computer use.

According to Senjam et al., (2020) The need for assistive technologies will increase in low- and middle-income countries over time. Each school for the blind should be equipped with relevant and sufficient assistive technologies for various educational activities, and appropriately trained teachers of assistive technology.

According to International, O. T. (2004) A team model for assistive technology assessment and planning is proposed to optimize the educational goal achievement of children with multiple disabilities.

According to Åke Grönlund, (2010) Governments in developing countries adopt a systematic approach in tackling obstacles at each level and pay attention to five management challenges development drawing on incentives-based cooperation from all stakeholders.

According to Lesar, (2015) State assistive technology service delivery systems and local policymakers should provide more training to service providers and families. In addition, the development and implementation of strategies to overcome barriers regarding access to, provision of, and funding for assistive technology devices and services needs to be addressed.

According to Bryant et al.,(2010) AT specialists have long argued that devices and services can help people with a variety of disabilities compensate for functional challenges and increase lifelong learning, foster independence, enhance mobility, augment communication, enrich control over the environment, and expand choices

According to Borg, Lindström, et al., (2011). Evidence to guide development of effective policies and legislation is needed as such evidence is scarce, Research and development on design, evaluation, production and use of assistive technologies are still required, particularly in areas not already addressed, e.g. for cognitive and visual impairments, Research on assistive technology to facilitate work and education is required from a human rights perspective as well as to reduce poverty, Research is needed to guide the development of cost effective strategies that ensure assistive technology is equitably available, accessible and affordable, To prevent a lack of adequately trained personnel to staff new services, suitable training programs need to be developed, To guide the utilization of available resources, good quality studies of outcome and cost-effectiveness are greatly needed.

According to Scherer & Glueckauf, (2005)Technologies are most effective when they are collaboratively selected and shaped to meet and enhance a consumer's particular functional and social needs, not when they are prescribed as an isolated means of addressing a physical limitation.

According to Layton, (2012)Local government authorities, government departments dealing with

such infrastructure as transport, or individual businesses.

According to Sze, (2009) Special education teachers are given increased responsibilities for students with disabilities in their classroom.

According to Boot et al., (2018) Education and training programs for health professionals and service and technology developers to the design, use and adoption of new and existing access product (AP)

According to Brims & Oliver,(2018)Practitioners working with PWD in such a situation, such as occupational therapists, social workers and doctors should consider providing or referring for the safety AT items or packages tested in this review.

According to Howard et al.,(2020)Trains educators and Allocate budget regularly

According to Lee & Templeton, (2009) School should facilitate train on AT and Access AT in school.

Evaluation:

By observing thoroughly the foresaid research articles, it is evaluated as follows.

A. Strength

- Some of them were they motivated to change the problem on usages AT in their paper

some of were used APA style

- All writers address issues that go with their title in the body of the journal.
- They cited all people who used in their papers some of them used a good sentence which divert the people's attention

B. Weakness

i. Most writers were focused on their view rather than supported by educational theory.

ii. Most writers focused on developed country, however, these cause /problem varies according to the country.

Future direction on usage of Assistive Technologies for students with multiple disabilities

According to these peer-reviewed journals, there were many directions and agreements for technological intervention for people with disabilities after the Millennium (2000 to 2020), particularly the use of assistive technology (AT) for people with disabilities as a good mechanism to support them, but there are still unsolved problems that policymakers must address in relation to AT for people with disabilities. Again, more study on the hurdles and advantages of employing assistive technology for individuals with disabilities is needed.

Conclusion:

As observed from this journal review AT has may advantages to support a person with disability, however, as World Health Organization (WHO) estimates that in low and middle-income countries only 5–15% of people requiring assistive technology have access to it. (Borg, Lindström, et al., 2011).

Perhaps Assistive technology important tools to support a person with disability there are major the problem across the world. It is due to lack of appropriate staff training and support system, negative attitudes of staff, inadequate assessment and planning processes, insufficient funding, difficulties procuring and managing equipment, and time constraints. (International, O. T. 2004).

To give up all this researchers gave the future direction to prevent a lack of adequately trained personnel to staff new services, suitable training programmes need to be developed, To guide the utilization of available resources, good quality studies of outcome and cost-effectiveness are greatly needed. (Borg, Lindström, et al., 2011).Need for assistive technologies will increase in low- and middle-income countries over time. Each school for the blind should be equipped with relevant and sufficient assistive technologies for various educational activities,

and appropriately trained teachers of assistive technology. (Senjam et al., 2020) To this end, Action research shall be appropriate to improve the usage of Assistive Technology of persons with disabilities.

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