

## ORIGINAL RESEARCH

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# Social Inclusion and Mental Health of Children with Physical Disabilities in Gaza, Palestine

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### ABSTRACT

**Purpose:** *Social inclusion of children with physical disabilities is essential for their mental health. The long-standing conflict and political instability in Palestine since 1948 has resulted in an unprecedented number of children with disabilities. This study aimed to assess social inclusion and mental health of children with physical disabilities in Palestine.*

**Method:** *A mixed methods research design was used. The 12-item General Health Questionnaire and the Brief Assessment of Social Inclusion for Children with Disability (BASIC-D) were administered to 100 children with amputations, 12-18 years of age, in the Gaza Strip. Ten semi-structured interviews were also conducted with personnel working across civil society rehabilitation services in the area, particularly in services that focussed on the physical rehabilitation of children who had lost a limb.*

**Results:** *Quantitative findings indicated that 88% of children's disabilities were caused by war-related incidents. While the sample of children showed on average relatively low levels of psychological distress, males reported feeling more socially included and having better mental health than did females. Furthermore, there was a strong positive correlation between mental health and social inclusion, and a moderate positive correlation between psychological distress and social inclusion. The qualitative data identified different factors that hinder social inclusion, mainly: political instability; under-resourced disability organisations; lack of coordinated efforts; and negative societal attitudes towards disability.*

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**Conclusion:** *A new questionnaire for social inclusion was developed, named the Brief Assessment of Social Inclusion for Children with Disability (BASIC-D), which can now be used as a tool to assess social inclusion in similar contexts; as well as a culturally-adapted form of the General Health Questionnaire-12 to assess mental health. There is a clear need for service-providers to move beyond a medical model of care to one that embraces community-based rehabilitation and the realisation of rights, in order to promote the social inclusion and mental health of children with disabilities in Palestinian society.*

**Key words:** *Children with disabilities, Palestine, social inclusion, mental health, human rights, community-based rehabilitation, General Health Questionnaire, the Brief Assessment of Social Inclusion for Children with Disability (BASIC-D).*

## INTRODUCTION

Many persons with disabilities are denied equal access to healthcare, education, employment opportunities or political participation due to their disability (World Health Organisation and World Bank, 2011), thereby undermining their social inclusion. Disability is also a development issue with an increasing body of evidence indicating that persons with disabilities experience worse socioeconomic outcomes and poverty than persons without disabilities (MacLachlan and Swartz, 2009; United Nations, 2011). Persons with disabilities continue to experience barriers with regard to participation as equal members of society and violations of their human rights in all geographical regions of the world (United Nations, 2006). Unlike the past, disability is now increasingly understood as a human rights issue (Amin et al, 2011; United Nations Enable, 2007). The most recent estimate of global disability prevalence provided by the World Report on Disability (WHO and World Bank, 2011) is 15% of the world's population, or approximately one billion people. Accordingly, it is now widely recognised that disability should be foremost on the agenda of governments globally, particularly in low-and middle-income countries.

### Context of the Occupied Palestinian Territories

The Palestinian territories or occupied Palestinian Territories (oPT) are comprised of the West Bank (including East Jerusalem) and the Gaza Strip, which is a narrow strip of land on the eastern coast of the Mediterranean sea, approximately 64 kilometres southeast of the West Bank. It is bordered by Israel on the north and east, and Egypt on the south, under whose rule the area fell between 1950 and 1967 (United Nations Development Programme - UNDP, 2012). The estimated size

of the population in Palestine in mid- 2016 was 4.816 million, with a distribution of 2.935 million in the West Bank and 1.881 million in the Gaza Strip (Palestinian Central Bureau of Statistics, 2016). The Palestinian territory has a young population; youth (0–14 years) constituted 39.4% of the total population of Palestine in mid-2015, while the 60 years and above age group was 4.5% (Palestinian Central Bureau of Statistics, 2015). In Gaza, unemployment is estimated to be the highest globally; poverty is very high, despite almost 80% of the Gaza population receiving some aid (World Bank, 2015). The Gaza Strip has been deprived of development opportunities as a result of repeated wars with Israel over several decades and an economic blockade by that country since 2007. This has resulted in colossal development and reconstruction needs and restrictions relating to governance, livelihood, environment and infrastructure (UNDP, 2012).

### **Community-Based Rehabilitation in Palestine**

Community-based rehabilitation (CBR) is a development strategy that empowers persons with disabilities to access health, education, employment, and social services; and it is implemented through the unified efforts of persons with disabilities, their families and communities, as well as relevant government and non-government health, education, social and other services (WHO, 2016). According to the CBR Guidelines published in 2010 (WHO, UNESCO, ILO, IDDC, 2010), CBR has evolved into a “multisectoral strategy to address the broader needs of people with disabilities, ensuring their participation and inclusion in society and enhancing their quality of life”. A CBR Matrix was developed in 2004 to provide a common framework for CBR practitioners. It consists of five key components – health, education, livelihood, social and empowerment components (WHO, UNESCO, ILO, IDDC, 2010) CBR is currently the major service delivery system for the majority of persons with disabilities in low-income settings, and is currently implemented in over 90 countries to address the needs of persons with disabilities and their family members (WHO, UNESCO, ILO, IDDC, 2010). CBR has been adopted as a national strategy in Palestine with the aim of strengthening the rehabilitation sector as a whole to address the needs of persons with disabilities, and it is widely implemented by local non-governmental organisations or NGOs (Nilsson and Qutteina, 2005; Qutteina et al, 2012).

### **Disability and Mental Health in the Palestinian Context**

Mobility impairments are the most prevalent type of impairment in Palestine, accounting for approximately 49% of persons with disabilities (WHO, 2014). The

political and economic situation in the oPT amplifies already significant difficulties for persons with disabilities. War-related activities have necessitated follow-up treatment for people suffering from multifaceted injuries and permanent disabilities, creating a colossal burden for a health system debilitated by shortages of facilities, equipment and drugs (United Nations, 2009). Many of those who have suffered war-related injuries have sustained permanent disabilities as a result of their injuries and/or lack of efficient medical attention and rehabilitation (United Nations General Assembly, 2009). Internal divides and Israeli restrictive measures obstruct access to services and efforts to implement policy and legislative change; one-fourth of people are living in poverty, intensifying the burdens of disability on families (Qutteina et al, 2012). In a study by Thabet and colleagues (2015), 42.6% of adults with physical disabilities and 37.3% of participants with other types of disabilities in the Gaza Strip were assessed as psychiatric morbidity cases.

Life in any environment exposes individuals to an array of perceived threats (Walsh-Daneshmandi and MacLachlan, 2000). However, living in a chronic war-torn region can be expected to take a greater toll, perhaps even more on children who have grown up in this environment. The consequences for children living in Palestine include a variety of behavioural and psychological problems, such as violence, post-traumatic symptoms, fear and hyperactivity (Gaza Community Mental Health Programme, 2009). A study conducted with adults and children from the Gaza Strip and West Bank (Espíe et al, 2009) found that 51.8% of the children ( $\leq 15$ years;  $n=650$ ) had witnessed murder or physical abuse; 36.6% had their property destroyed or lost; 26.9% had a close family member who had been killed; 22.3% had received a threat; 15.5% had suffered physical injury; 23.8% had been forced to flee; 10.3% had been incarcerated; 9.5% had experienced a breakup of the nuclear family; 6.5% had a close family member die from illness; and 0.9% had suffered sexual violence. In light of such figures, the mental health of children with physical disabilities in Palestine needs to be addressed and special psychosocial programmes should be targeted at them.

## **Objective**

This study aims to assess the social inclusion and mental health of children with physical disabilities, specifically those with amputations, in Palestine. The research was conducted in conjunction with a related project assessing psychosocial aspects of adjusting to limb loss, which is known to be a particular

psychological challenge (Desmond and MacLachlan, 2002a,b). However, in this paper the focus is on social inclusion and mental health, explored through questionnaires administered to children with physical disabilities, and Key Informant (KI) interviews with service-providers in Gaza, Palestine.

## METHOD

In order to investigate the extent to which children with physical disabilities were socially included and enjoyed mental health, mixed methods research was adopted (Bryman, 2001), namely both quantitative and qualitative data collection.

### Participant Selection and Sampling

Both probability and non-probability sampling approaches were used in the study.

#### 1) Quantitative Sampling

Systematic sampling was used to select 100 children, 12-18 years of age, with physical disabilities, specifically amputations. Children were selected from lists prepared by 10 disability organisations - 2 organisations from each of the 5 governorates of the Gaza Strip. Children who met the study requirements in terms of age and type of disability were randomly selected by picking every 10th name on their alphabetically arranged list of clients; across sites this represented approximately 10% of the clients from the organisations sampled. Table 1 outlines the approximate number of children who met the selection criteria and the number selected for each governorate. Invitations were forwarded to the children's fathers through the head of the organisation where they received medical and rehabilitation services.

**Table 1: Children who Met the Selection Criteria and the Number of Children Selected for Each Governorate**

Governorate	Population	10%
North	≈400	40
Gaza city	≈200	20
Middle camps	≈150	15
Khan Yunis	≈150	15
Rafah	≈100	10
<b>Total</b>	<b>≈1000</b>	<b>100</b>

## **2) Qualitative Sampling**

A purposive sampling approach was used to select 10 Key Informants (KIs), who were managers of service provision organisations working in the field of disability and rehabilitation. They belonged to the same 10 disability organisations from which the sample of children with disabilities were selected. KIs were well-known as advocates for persons with disabilities with amputations, and were aware of services provided to them. The informants were therefore a credible reference on social inclusion activities as well as mental health services.

### **Ethics**

Ethical approval was granted from the Health Policy and Management and Centre for Global Health Research Ethics Committee of Trinity College Dublin, Ireland. Approval was also granted from the Assalama Charitable Association, which represented the 10 disability organisations from where the data was collected. Written informed consent was provided by children, parents, and KIs.

## **Procedure for Questionnaires and Interviews**

### **1) Quantitative Questionnaires**

One Hundred children with physical disabilities completed two questionnaires - the General Health Questionnaire and the Brief Assessment of Social Inclusion for Children with Disability (BASIC-D). The children did not require any assistance from the researcher, parents or staff of the disability organisations and completed all questionnaires on the site of the organisation that provided services.

### **2) Qualitative Interviews**

Ten KIs were interviewed. One interview was scheduled with each one of the informants after confirming the appointment a week earlier. The schedule was created to facilitate a semi-structured interview and no further questions were added to those sent a week in advance to informants. Both the researcher and KIs agreed to create an open discussion over the course of the interview and also to address the open-ended questions in the semi-structured interview guide. When technical questions were asked during the discussion, clarifications were provided by the primary researcher. Interviews lasted between 30 and 45 minutes, and were recorded using a digital Dictaphone. Interviews were conducted in Arabic and subsequently translated and transcribed into English.

## Data Collection Tools

### 1) Quantitative Research Tools

i) General Health Questionnaire-12 (GHQ-12) – The GHQ-12 is a standardised tool that has been used extensively (Donath, 2001). It is designed as a measure of current mental health, but is not a tool for specific diagnosis (Montazeri et al, 2003). While initially designed for adults, a review identified 82 studies in which it has been used with adolescents (Tait et al, 2002). The standardised GHQ-12 was originally divided into three main factors: anxiety; social dysfunction; and loss of confidence (Graetz, 1991). The GHQ-12, which consists of 12 items, has mixed responses such as “0” for “better” and “3” for “much less”, and other responses such as “0” for “not at all” and “3” for “much more”. Higher scores reflect more psychological distress. Individuals with scores above a certain threshold are considered to be experiencing mental stress; Goldberg et al (1997) recommend a threshold of 11/12 for the GHQ-12 (Likert scoring method).

ii) The Brief Assessment of Social Inclusion for Children with Disability (BASIC-D) - The BASIC-D was designed to measure social inclusion of children with disabilities, specifically those with amputations. While the primary researcher reviewed extensive literature for this purpose, it was primarily designed based on the Regional Framework on Community-Based Rehabilitation (WHO, 2010), and the International Classification of Functioning, Disability, and Health (Children and Youth Version - ICF-CY) (WHO, 2007). The scale for the BASIC-D ranged from “1” for “strongly agree” to “5” for “strongly disagree”. Higher scores indicated lower social inclusion. The questionnaire was comprised of 20 items and divided into 5 factors: attitudes towards disability; inclusion in education; inclusion in transportation; community participation; and social welfare.

### 2) Qualitative Research Tools

Outlined in Table 2 are the semi-structured interview questions, which were designed based on the semi-structured interview questions were designed based on the CBR Guidelines (WHO, UNESCO, ILO, IDDC, 2010), the social model of disability, Convention on the Rights of Persons with Disabilities (United Nations, 2006), and other international social inclusion frameworks such as the report ‘Disability and social inclusion in Ireland’ (Gannon and Nolan, 2005).

**Table 2: Key Informants' Semi-Structured Interview Guide**

<p><b>About the Organisation:</b></p> <ol style="list-style-type: none"> <li>1. Would you please talk briefly and give me an overview about your organisation?</li> <li>2. Who are you serving in terms of age, sex, and type of disability?</li> <li>3. What type of services does your organisation deliver to persons with disabilities?</li> <li>4. Do you provide any services other than CBR?</li> <li>5. Do the children with disabilities you work with feel that your services are charity to them, or their right?</li> <li>6. What type of rehabilitation services does your organisation provide?</li> <li>7. What types of health services does your organisation provide?</li> <li>8. Do you feel that the services that your organisation provide currently meet all of the needs of the children with disabilities that come to you?</li> </ol>
<p><b>About Inclusion:</b></p> <ol style="list-style-type: none"> <li>9. What does the term inclusion mean to you?</li> <li>10. What type of inclusion strategies does your organisation adopt, if any?</li> <li>11. To what extent do you think that the children with disabilities who you serve are socially included in society outside of your organisation?</li> <li>12. Do you think that greater inclusion would improve the wellbeing of children with disabilities, or not?</li> </ol>
<p><b>About Inclusion and the CBR Matrix:</b></p> <ol style="list-style-type: none"> <li>13. What do you see as the main challenges for promoting the inclusion of children with disabilities in healthcare? [HEALTH]</li> <li>14. What do you see as the main challenges for promoting the inclusion of children with disabilities in education? [EDUCATION]</li> <li>15. What do you see as the main challenges for promoting the inclusion of children with disabilities in terms of them achieving a desirable livelihood? [LIVELIHOOD] (What assistance from your organisation, the government, the United Nations Relief and Works Agency for Palestine Refugees in the Near East (UNRWA), or any other NGO is currently given, if any?)</li> <li>16. What do you see as the main challenges for promoting the inclusion of children with disabilities in the broader community? [SOCIAL] (Also, are they invited on a regular basis to national or religious ceremonies?)</li> <li>17. What do you see as the main challenges for promoting the inclusion of children with disabilities so that they have a voice and influence within society? [EMPOWERMENT]</li> </ol>

## **Pilot Testing**

Both the GHQ and BASIC-D were piloted to obtain feedback in terms of potential emotional distress caused to the sample of children with disabilities, and the applicability of the tools in terms of timing and administration. Ten children were randomly selected to complete the questionnaires. Findings from the pilot testing indicated that the questionnaires were culturally appropriate and acceptable, with no evidence of them being distressing.

## **Data Analysis**

### **1) Quantitative Data Analysis**

All responses for both the GHQ and BASIC-D were entered into SPSS. Descriptive analyses were conducted, such as frequencies, cross tabulations, means and standard deviations. Inferential statistical tests were conducted especially for the GHQ, given that it had not been used before in Gaza. Factor Analysis was conducted for both the GHQ and BASIC-D.

### **2) Qualitative Data Analysis**

To assess the accuracy of the translation of interview transcripts from Arabic to English, an English teacher checked the English translation in relation to the transcribed Arabic data, and confirmed that the translation was approximately 85% accurate. The primary researcher examined the qualitative data several times, including notes recorded during interviews, in order to identify the main themes. Main themes that emerged were noted in the left-hand margins. On further reading of the data and the main themes, new sub-themes emerged; these were recorded in the right-hand margins. This cyclical process of reading and generation of themes continued until the primary researcher devised clustered and prioritised themes, which were finally coded and edited. This procedure was based on Interpretative Phenomenological Analysis (Smith and Osborn, 2008).

## **Reliability and Validity**

To ensure reliability and validity, the interview questions were carefully translated and back-translated into English and then Arabic, as outlined above. Interviews were recorded and transcribed, and notes that were documented during the interviews enriched the data and generated valuable additional data. As exemplified in Table 3, the reliability of the allocation-to-category of the

qualitative data. The reliability of the allocation-to-category of the qualitative data was assessed by asking a post-graduate colleague to match the main themes with respondents' quotations, after rearranging main themes and quotations.

**Table 3: Example of Allocation-to-Category Reliability Analyses of Qualitative Data**

Key Informants' Quotations
1. "How many of the key informants you interviewed suffer disability? I do promise you that no-one including myself because persons with disabilities need persons without disabilities to talk on their behalf, and so persons with disabilities don't decide for themselves."
2. "Article five stated that the State shall provide persons with disabilities with all forms of rehabilitation with the requirements of the nature of the disability....is that happened? . . . Absolutely not. The last thing they think about is how to create a dignified life for persons with disabilities."
3. "Usually persons without disabilities come to the centre and ask for medical treatment. When we say sorry, that the service is just for people with disability, they said how come those lack a leg or an arm has the right but not for us? It's unfair."
4. "Through continuous involvement in social events, we make children with disability stronger and have self-insight, which enables them to cope with their new reality."
5. "We suffer a problem of the rule of law. Traffic police cannot issue a ticket. How advocates could create a difference in the life of children with a disability? It seems a hopeless case and we have to completely rely on international non-governmental organisations to advocate on behalf of us since they hold the cards."
6. "People in the community appreciate children with a disability as they sacrificed their body parts, but still they don't trust them and considering them as having limited capabilities and in need for others."
7. "What we are doing in disability organisations is directly ruined by the negative attitudes of people in the community and then we need to work again and again to improve the damage."
8. "In order to shape the societal attitudes, every activity should start in schools. They are the new generations and the ideal of inclusion will grow up with them and being as a social norm in the future."
9. ....
10. ....
11. ....

	Main Theme	Quotation Number	Remarks
1.	Misunderstanding inclusion		
2.	Physical rehabilitation is the priority		
3.	Under-resourced disability organisations		
4.	Social empowerment and participation		
5.	Legal rights and legislations		
6.	Attitudes towards disability		
7.	Socioeconomic status before amputation, and cause of disability		
8.	Limitation to implement CBR		
9.	Unions, advocacy and lobbying groups		
10.	Political instability		

## RESULTS

### 1) Quantitative Findings

#### i) Participant Demographics

Of the 100 participants, 53% of the children were males and 47% were females. 34% of the children were between 12-14 years of age, 47% were between 15-17 years, and 19% were between 17-18 years. 45% were from refugee camps, 34% from villages, 14% from cities, and 7% from Bedouin communities. Of note, with the exception of the Bedouin community, such diverse socio-demographic communities overlap. For example, many refugees reside in cities and villages, and non-refugees may reside in refugee camps. Notably, 38% of the children had one leg amputation and lived in refugee camps. Regarding cause of amputation, 12% (6 males and 6 females) were not the result of war-related incidents, while 88% (47 males and 41 females) had war-related causes.

#### ii) Differences between Sexes for Variables of Interest

Table 4 illustrates means and standard deviations (SD) for the variables of interest for males and females. Of note, the average score for social inclusion among all children was 3.83 (SD = .39). With regard to mental health, the average score for all children was 2.50 (SD = .29).

Independent samples t-tests were conducted to compare the social inclusion, mental health, psychological distress and efficacy scores for males and females.

**Table 4: Means and Standard Deviations for Social Inclusion, Mental Health, Psychological Distress, and Efficacy**

		Mean	SD
Social Inclusion	All Children	3.83	.391
	Male	3.25	.414
	Female	3.61	.218
Mental Health (GHQ 11 items)	All Children	2.50	.296
	Male	2.41	.287
	Female	2.65	.247
Psychological Distress (GHQ 8 items)	Male	1.69	.551
	Female	1.92	.516
Efficacy (GHQ 3 items)	Male	1.78	.645
	Female	2.03	.455

There was a statistically significant difference in social inclusion scores for males ( $M = 3.25$ ,  $SD = .41$ ) and females ( $M = 3.61$ ,  $SD = .22$ ;  $t(96) = -5.68$ ,  $p < .001$ , two-tailed; 95% CI:  $-.48$  to  $-.23$ ). There was also a statistically significant difference in mental health scores for males ( $M = 2.41$ ,  $SD = .28$ ) and females ( $M = 2.65$ ,  $SD = .25$ ;  $t(98) = -4.27$ ,  $p < .001$ , two-tailed; 95% CI:  $-.35$  to  $-.13$ ).

Furthermore, there was a statistically significant difference in psychological distress scores for males ( $M = 1.69$ ,  $SD = .55$ ) and females ( $M = 1.92$ ,  $SD = .51$ ;  $t(80) = -2.21$ ,  $p = .04$ ; 95% CI:  $-.45$  to  $-.01$ ). Finally, there was a statistically significant difference in efficacy scores for males ( $M = 1.78$ ,  $SD = .65$ ) and females ( $M = 2.03$ ,  $SD = .45$ ;  $t(94) = -2.21$ ,  $p = .03$ ; 95% CI:  $-.46$  to  $-.02$ ).

### iii) Age and Variables of Interest

A one-way between-groups analysis of variance was conducted to explore the impact of age on levels of social inclusion, mental health, psychological distress and efficacy. Participants were divided into three groups according to their age (Group 1: 12-14 years; Group 2: 15-17 years; and Group 3: 17-18 years). There were no statistically significant differences in social inclusion, mental health, psychological distress and efficacy scores for the three age groups.

#### iv) Factor Analysis

Before data collection, the original 12 items of the GHQ-12 were translated and back-translated into English to maintain the same meaning. In order to establish whether these items co-varied with each other in accordance to other studies, given the cultural and contextual situation in Gaza, the GHQ-12 was factor analysed. Two factors emerged: the first was named “psychological distress”, which comprised 8 items; and the second was named “efficacy”, which comprised 3 items. One item was excluded due to cross-loading (item 7 on the original GHQ-12). Cronbach’s alpha exceeded 0.9 for the 11 items of the questionnaire.

The same statistical techniques were applied to the BASIC-D. When factor analysed, 5 items emerged with high Eigen values, which strongly represented social inclusion among respondents. The items produced a Cronbach’s alpha exceeding 0.7 and are reproduced in Appendix 1.

#### v) Correlation

There was a strong, positive correlation between mental health (GHQ 11 items) and social inclusion ( $r = 0.629$ ,  $n = 100$ ,  $p < .001$ ); a moderate, positive correlation between psychological distress (GHQ 8 items) and social inclusion ( $r = 0.46$ ,  $n = 100$ ,  $p < .001$ ); and a strong, positive correlation between efficacy (GHQ 3 items) and psychological distress ( $r = 0.689$ ,  $n = 100$ ,  $p < .001$ ).

#### vi) Regression

A regression analysis was conducted to determine the variables that predicted and affected social inclusion. Categorical variables were converted into dummy variables to analyse which variables most affected social inclusion; including age, place of residence, sex of the child; and also time since amputation, psychological distress, and efficacy. Findings indicated that sex of the child ( $\beta = .375$ ,  $p < .001$ ) and efficacy ( $\beta = .284$ ,  $p = .011$ ) were the only predictors that influenced social inclusion; being male and having higher efficacy were associated with greater inclusion.

## 2) Qualitative Findings

Following 10 semi-structured interviews with KIs, 10 different themes surrounding social inclusion relating to disability were identified. The major themes that emerged throughout the current study were: (i) misunderstanding of inclusion; (ii) physical rehabilitation is the priority; (iii) under-resourced disability

organisations; (iv) social empowerment and participation; (v) legal rights and legislations; (vi) attitudes towards disability; (vii) socioeconomic status before amputation, and cause of disability; (viii) limitations to implement CBR; (ix) unions, advocacy and lobbying groups; and (x) political instability.

### **i) Misunderstanding of Inclusion**

'Inclusion' was not a term used in the day-to-day activities of the ten KIs. They defined the term inclusion as 'integration', which sometimes has the equivalent meaning in Arabic. However, when the primary researcher emphasised the core meaning of inclusion, it was apparent that KIs started to think of the term differently. One participant defined inclusion in the following terms: "Inclusion is to create an environment where the child feels as normal [sic]". Another informant understood inclusion as follows: *"Eliminating the sense of exclusion and include him/her in all aspects such as economic, political, cultural and religious, as well as create access to civil, political and social rights and opportunities"*.

Participants also emphasised that inclusion would be a straightforward objective if they could manage children's needs and assist them by securing assistive devices, artificial limbs and medications. They insisted that if all of these needs were met, the children would feel socially included, self-mobilised and would have improved mental health.

Another significant issue was that KIs associated inclusion with causes of disability. Approximately 8 informants classified children with disabilities according to the cause of disability. For example, it was emphasised that children whose disabilities were war-related had higher self-esteem than children whose disabilities were the result of accidents. This was because of the societal appreciation afforded to children with war-related disabilities due to the perception of them as freedom-fighters.

All KIs emphasised the right of children with disabilities to receive their basic needs. Indeed, the most common trend across participants' responses was that disability was a human rights issue. Finally, there was a consensus among all participants that the community was not ready for full inclusion, in terms of attitudes towards disability, societal trends, facilities, the political environment, and logistical services.

### **ii) Physical Rehabilitation is the Priority**

All KIs stated that priority should be given to physical rehabilitation. As highlighted by one participant:

*“We as Palestinians are living in a chronic crisis for about 60 years and we hardly could manage our life given the poor resources; we have to focus on physical rehabilitation needs because it’s immediate and could not be postponed.”*

KIs also emphasised that the idea of inclusion was considered a luxury due to poor financial resources that barely addressed urgent physical rehabilitation needs. They suggested that the ongoing crisis and the mounting number of cases of disability, particularly with amputation, created an environment in which it was impossible to consider and address other types of rehabilitation and inclusion.

When the primary researcher discussed the meaning of social inclusion with participants in order to elucidate the term – defined mainly in cultural, political, rights-based, participation, respect, and needs-based terms – their replies highlighted a lack of basic resources necessary to address all of these aspects. One KI questioned:

*“How a full inclusion would be created when I don’t have basic medical supplies in my rehabilitation clinic and suffer chronic financial problems?”*

Another KI stated:

*“The salary of the physiotherapist has not been paid for the last three months due to budgetary problems...We simply cannot afford it...You are asking for too much.”*

Moreover, when asked about both local funding and international donations, nearly all of the participants emphasised that funding was directed towards basic needs, in terms of medical supplies, medications, physical rehabilitation, and mostly to secure artificial limbs. Other funds were directed to psychosocial and mental health support. When asked about the extent to which mental health services were provided, all participants specified that good rehabilitation services would ultimately improve mental health.

### **iii) Under-Resourced Disability Organisations**

*“Uncertainty”* and *“ambiguity”* were two terms widely used by participants regarding future planning. One participant articulated:

*“I cannot plan for tomorrow unless I have the fund in hand. I learned from experience not to start any initiative without having money allocated in the bank.”*

It was widely agreed that while many donors tended to make promises, very few fulfilled them. This disrupted KIs’ plans and disappointed many of the

vulnerable target groups of children with disabilities. Participants also stated that their main activities focused on physical rehabilitation in order to relieve the pain of recipients and help them to meet their basic mobility needs, and this was mainly realised by securing assistive devices.

Another evidently crucial issue was the lack of professional and trained staff to assist in rehabilitating children with disabilities, such as staff who could provide education and information on how to use assistive devices or how to wear and accommodate artificial limbs. Participants also asserted that there were no local universities that train students in relation to rehabilitation skills, despite the growing issue of disability with amputation. A KI indicated:

*“Nurses perform duties beyond their capacity and professional expertise. They need better training especially in rehabilitation and physiotherapy practice.”*

In terms of logistical needs, participants highlighted that their centres lacked basic medical equipment to perform simple tasks such as blood and urine tests. They stated that they were waiting for donations by international delegations in order to obtain medical equipment for physiotherapy. Participants also complained of poor office facilities, in terms of furniture, beds, chairs, telecommunication equipment, and other basic requirements to run their organisations. Children with disabilities in the region, especially those with amputations, require transportation to reach rehabilitation centres and receive medical or rehabilitation services. All KIs reported that unless there were efficient cars equipped for such purposes, they would be unable to perform their work effectively.

#### **iv) Social Empowerment and Participation**

One KI stated:

*“Through continuous involvement in different social events, we make children with disability stronger than before and enhance their self-insight, which enables them to cope with their new reality.”*

Another KI indicated:

*“What we are doing in disability organisations is directly ruined by the community’s negative attitudes towards people with disability, and then we have to work over and over again to alleviate the damage through psychosocial support programmes.”*

Moreover a KI specified:

*“People in the community appreciate children with disability as they sacrificed their body limbs, especially those war-related cases, but still they don’t consider them as having limited capabilities and in need for others’ help and sympathy.”*

Several KIs mentioned that people’s lack of value for persons with disabilities was often reflected in the latter’s low self-esteem and under-estimation of their capabilities. KIs indicated that sometimes the problem was in the way that children with disabilities viewed themselves. In many cases, they perceived themselves as ‘disabled’, which caused others to underestimate their abilities. One participant asserted:

*“How many of the key informants you interviewed have disability? I do promise you that no-one including myself because those with disabilities need those without disabilities to talk on their behalf, and so people with disability don’t decide for themselves, then how could they be empowered?”*

Community participation was discussed by informants. They reported that children with disabilities were invited to events pertaining to disability issues, but were forgotten when it came to events related to ordinary and national issues. One KI stated:

*“Ignoring them in activities or ceremonies other than these related to disability is a clear violation of their rights as human beings and considered a painful act, which contributes to social exclusion.”*

The majority of informants questioned whether, and to what extent, children with disabilities were included in education. They suggested that while children with disabilities were accepted in mainstream schools, they clearly experienced exclusion through lack of accessibility, special programmes, and mental health services. An important issue that children with disabilities found distressful was labelling by other students, as well as dependency on others for assistance. A KI questioned: *“Are schools suitable for children with amputations?”*, then asserted, *“Of course not; you don’t find ramps or equipped toilets for them in all schools except for some which are newly built and designed by foreign architects”*.

## **v) Legal Rights and Legislations**

While the KIs were evidently aware of the Palestinian disability law, they believed that there was no real implementation of this law. A participant expressed:

*“Article five stated that the State shall provide persons with disabilities with all forms of rehabilitation with the requirements of the nature of the disability....is it really happening? Absolutely not! The last thing they think about is how to create a dignified life for people with disability.”*

All participants mentioned that in accordance with the law, persons with disabilities had the right to a 5% quota in employment, but that this was rarely actualised and persons with disabilities encountered many difficulties for this right to be realised. One informant highlighted:

*“According to the law, medical care and rehabilitation services should be provided free of charge but it is not the case. Unless you are medically insured, you wouldn’t be able to be treated. Isn’t that a violation of the people with disabilities’ basic right for free health services?”*

Another KI disclosed:

*“We suffer a problem of the rule of law. Traffic police cannot issue a ticket. How local advocates could create a difference in the life of children with disability? It seems a hopeless case and we have to rely on international NGOs to advocate on behalf of us since they hold the cards.”*

## **vi) Attitudes towards Disability**

Most of the informants agreed that children with disabilities, especially those who have amputations, were generally accepted in society. However, in relation to rights-based issues, priority was afforded to those without disabilities. They also disclosed several stories concerning the treatment of children with disabilities. One story related to a child with an amputation who suffered blindness as a result of a war-related injury. However, he was able to complete his high-school degree with high grades and attended university. Conversely, the participants had witnessed many abuse cases in which children with amputations, particularly females, were prevented by their families from leaving the house in order to avoid embarrassment due to the negative opinions of others.

One respondent affirmed:

*“The closer to each other, the children with disability and the persons without disabilities, the better positive attitudes and inclusion for those with disability.”*

However, another informant asserted:

*“Usually persons without disabilities come to the centre asking for medical treatment. When we say sorry, this service is just for people with disability, they say how come those who lack a leg or an arm have the right to it but we don’t? This is not fair.”*

All of the KIs agreed that inclusion and changing attitudes should begin at school. One informant suggested:

*“In order to change the societal attitudes, inclusion activities should start at schools. Children are the new generations and the idea of inclusion will grow with them and it will eventually develop as a social norm in the future.”*

All participants emphasised that children with amputations had sacrificed their limbs for the sake of their homeland, and therefore deserved more appreciation and acknowledgment.

#### **vii) Socioeconomic Status Before Amputation, and Cause of Disability**

According to the interviewees, the socioeconomic status of the child before amputation was very crucial to enable him/her, along with family, to overcome the adverse consequences of disability. Those children who lived in middle- or high-class families had the capacity to somehow alleviate their suffering through better social, medical and psychological services. Evidently the contrary was happening to children of poorer socioeconomic status who were more easily exposed to suffering and severe mental health disorders, and who became vulnerable to complex social problems in the future.

Cause of amputation was also reported as an issue. As contended by one participant:

*“It is the mandate of my organisation to work exclusively with war-related amputations; others can be treated in other organisations. It is easier to raise funds for those war-related cases.”*

It was also suggested that level of education contributed to understanding or knowledge of services. An account from one KI was:

*“Sometimes we have to create pressure on the father for him to agree to bring his daughter to the centre for physiotherapy. They are unable to realise the value of the service due to their lack of education, and despite the fact that we pay for both transportation and services, many families still hesitate to send their daughters.”*

### viii) Limitations to Implement CBR

A discussion of the CBR guidelines with the informants revealed that the majority were not aware of CBR as a strategy within community development and rehabilitation for equalisation of opportunities and social integration of persons with disabilities. Most of them asked for a copy of the CBR Matrix and when the guidelines were discussed, they asserted that the guidelines were controversial and needed to be revised or adapted to the Palestinian context. One KI communicated:

*“My organisation will be so lucky if we could secure financial resources to cover rehabilitation needs. I think we are far from such luxurious CBR way of thinking.”*

Participants declared that such guidelines could be implemented in Europe but not in Gaza, due to a lack of resources to address the basic needs of persons with disabilities as well as the needs of others without disabilities. They indicated that current demands, given the existing meagre resources, were very high and they did not want to create competition between persons with disabilities and those without disabilities. One participant, who was aware of the CBR guidelines, reported:

*“I have been trained by an international NGO to apply the CBR guidelines on my clients, but I found it impractical because I can handle very few of them while others are beyond my capacity. Moreover they are in need for multisectoral systems, which does not exist in a place like the Gaza Strip, and the government should take the leading part in such initiative.”*

During discussions about the benefits of the CBR guidelines, all participants highlighted that they were already empowering children with disabilities and their families through psychosocial support, self-help groups, securing assistive devices, medical care, awareness-building, and the rehabilitation of children with amputations. They reported that this list of activities for children with disabilities positively impacted on quality of life, ambition for a brighter future, better emotional wellbeing and self-esteem, and promoted the feeling of social inclusion. A KI stated:

*“According to my experience, strategies that are most successful in achieving positive changes which are applied to CBR are moral support, getting the family to understand and deal with the disability, breaking the isolation and helping to change the attitudes in schools and communities, and finally recreational activities such as summer camps that are appreciated by the children.”*

While discussing the strategy of CBR, almost all of the participants highlighted the issue of political affiliations. They reported that unless an organisation was affiliated with one of the political factions, it would not be entitled to local support. This would also negatively impact on international support that requires neutrality, thereby creating a very difficult situation.

The restrictions on travelling abroad for training had negatively impacted on the quality of rehabilitation and medical services. One KI alluded to limitations of capacity building and professional development in Gaza:

*“How could I know about CBR when I never left the Gaza Strip and never been engaged in any formal training? My expertise is based on engineering degree, 10 years of experience in the field of managing rehabilitation centres.”*

### **ix) Unions, Advocacy and Lobbying Groups**

KIs stated that the Palestinian General Union of People with Disability (GUPWD) in Gaza was a weak and under-funded body. There were also political conflicts between the headquarters in the West Bank and the office in the Gaza Strip. Persons with disabilities usually visited the disability organisations and avoided attending the GUPWD because no services were provided by the union.

As one participant said:

*“People with disability have no voice, and even if they do, they will not be heard because we live in a very desperate situation.”*

Political will was also alluded to by one informant who suggested:

*“If politicians keep away from us, we will succeed, raise funds and be able to handle our needs.”*

### **x) Political Instability**

Political conflict and instability were the main concerns among informants. They stated that internal political problems as well as problems created by the occupation were the foremost obstacles in the way of performing their work or for long-term planning. Furthermore, all the informants indicated that the primary causes of disability, particularly physical disability with amputation, were military operations and targeted shelling of innocent people. One KI declared:

*“How can I plan in such a political situation? I am unable to plan for tomorrow; everything is changing overnight.”*

Another KI, alluding to the increasing number of persons with disabilities, observed:

*“Every day we have new clients joining our disability organisation, asking for medical care and rehabilitation services, and the queue is getting longer day after day while resources are decreasing.”*

Another informant noted:

*“It is a disabling situation which disrupts every possible work and long-term initiative.”*

Another declared:

*“The increasing number of people with disability is mounting every day. I am sure we will reach a point where we say sorry for many of them, and the government should resume responsibility.”*

## DISCUSSION

This study aimed to assess the social inclusion and mental health of children with physical disabilities in the Gaza Strip. A new questionnaire for social inclusion was developed, named the Brief Assessment of Social Inclusion for Children with Disability (BASIC-D), which can be used as a tool to assess social inclusion in similar contexts; as well as a culturally adapted version of the General Health Questionnaire to assess mental health.

### 1) Quantitative

While the sample of children indicated low psychological distress ( $M = 2.50$ ), scoring well below the recommended threshold of 11/12 (Goldberg et al, 1997), statistically significant differences between males and females were found in scores for social inclusion, mental health (GHQ 11 items), psychological distress (GHQ 8 items), and efficacy (GHQ 3 items), with males reporting higher social inclusion and better mental health. In Palestine, males with disabilities are comparatively advantaged, having economic significance within their family, while females with disabilities are frequently viewed as a burden on resources; without hope for marriage, and may be hidden from others, interacting with close family only (Sayrafi, 2013).

No statistically significant differences for age groups were found in scores for social inclusion, mental health, psychological distress, and efficacy. This finding

may reflect the relatively homogeneous sample in terms of age, as the study was conducted with an adolescent sample (12-18 years).

The study found a correlation between mental health and social inclusion, indicating that the mental health of the children was associated with their social inclusion. People with severe mental health problems are amongst the most socially excluded (Huxley and Thornicroft, 2003). The connection between mental health and social exclusion is complex, with elements related to exclusion, such as low income and fewer and smaller social networks, being both causal and consequential factors of mental ill-health (Sayce, 2001).

One of the main objectives of this research was to determine the major factors that predict social inclusion. When a regression analysis was conducted, it was found that both the sex of the child and efficacy were the primary predictors of social inclusion. Social inclusion may include benefits such as personal efficacy that may result from social networks and community involvement (Simplican et al, 2015). Furthermore, women with disabilities in Palestine are amongst the most marginalised, isolated and excluded in society (EducAid, n.d.). In a study on access to formal education for persons with disabilities in the West Bank and Gaza (Riyada, 2011), 29% of females reported never having had any education compared to 19% of males.

## 2) Qualitative

Interviews with KIs indicated that social inclusion is not an explicit objective for disability organisations working with children in Palestine. Instead they viewed their primary focus as securing children's basic rehabilitation needs, in terms of medical treatment and assistive devices such as wheelchairs and prosthetic limbs. A commonly held opinion among the informants was that social inclusion would ultimately be accomplished if the rehabilitation needs of children with disabilities were fulfilled. While the importance of assistive technology for this population is clear, it is also important that such assistive technologies be seen not as an end in themselves but as mediators of social inclusion, participation, and the realisation of children's rights (Khasnabis et al, 2015) and indeed the achievement of the Sustainable Development Goals (Tebbutt et al, 2016), which commit to "leaving nobody behind". It was evident that the majority of informants had limited awareness of the concept of 'inclusion', seeing it in terms of 'integration' or 'mainstreaming'. However, it is important to note that this

may be because the Arabic translation of the term is indeed comparable with 'integration' and 'mainstreaming'.

The cause of disability was frequently mentioned and used to classify the children. For example, it was emphasised that children whose disabilities were war-related had higher self-esteem than children whose disabilities were caused by accidents, because of the social appreciation afforded to such children as a result of their identity in society as 'freedom-fighters'. With citizens living in an environment of chronic political instability, many social norms may have been formed based on principles of nationalism and freedom-fighting, which may impact on the meaning of a child's disability, both for themselves and for society more broadly. The NORAD Palestinian Territory Country Report (Qutteina et al, 2012) highlighted the provision in the Palestinian disability law for one aspect of preferential treatment for conflict-related disabilities in which it exempts such disabilities from co-payment for medical rehabilitation and assistive devices. The NORAD report discusses the high social value afforded to political participation and sacrifice in an occupied territory such as Palestine; and the potential for this social value to give rise to discrimination in favour of conflict-related disability.

KIs indicated that the government and local disability organisations that the government and local disability organisations completely rely on international NGOs to pay for the rehabilitation services, assistive devices, medical care and other costs; including psychosocial support programmes. Participants contended that actualising the broader societal ethos of CBR was unrealistic, because both a strong government sector and a multisectoral approach are required to realise CBR (WHO, UNESCO, ILO, IDDC, 2010). However, a promising step forward has been the Palestinian disability law (Chairman of the Executive Committee of the Palestine Liberation Organisation et al, 1999), although its implementation was considered to be hindered by lack of effective law and order, in addition to heavy reliance on international NGOs. This is also supported by the NORAD report (Qutteina et al, 2012), which notes that the disability law, requiring the allocation of 5% of jobs in large institutions to persons with disabilities, has not been enforced by governmental organisations (Qutteina et al, 2012); although it must be acknowledged that this is also the case in much wealthier and stable States.

Community participation was discussed by informants, noting that while children with disabilities were invited to events related to disability issues, they tended to be forgotten in relation to events pertaining to ordinary and national

issues. Societal attitudes towards disability are one of the most important factors that undermine social inclusion in Palestine and internationally (MacLachlan and Swartz, 2009; Qutteina et al, 2012; WHO, 2013). The KIs indicated that sometimes the problem was how the children with disabilities viewed themselves. Indeed, stigma including self-stigma associated with disability may be the greatest barrier to social inclusion of persons with disabilities including children with disabilities. Initiatives that promote the valuing of children with disabilities including by their own parents, such as the Portage programme (Einfeld et al, 2012), which interfaces effectively with the ethos of CBR, will therefore be critical for the inclusion of children with disabilities in health and broader social services.

The influence of political instability was repeatedly noted as a very important obstacle to effective social inclusion of children with disabilities in Palestine. All KIs stated that internal political problems, in addition to problems created by the occupation, were the foremost obstacles to performing their work or for long-term planning. This finding is reflective of an evaluation study of CBR in Palestine, conducted by Nilsson and Qutteina (2005), in which the researchers argued that difficulties were imposed by the economic and political situation within Palestine on the effective development and collaboration of national CBR systems. Furthermore, as indicated by one participant's response, restrictions on people entering or exiting Gaza has negatively impacted on the quality of rehabilitation and medical services, as a result of limited opportunities for capacity building and professional development through state-of-the-art training.

The findings suggest that social inclusion of children with disabilities is not prioritised by either the governmental sector or civil society organisations. The economic and political situation in Palestine has resulted in the placement of disability at a lower level on the national agenda (Nilsson and Qutteina, 2005). While financial resources have been cited as the major restrictive factor on implementation of the disability law, the government has failed to include persons with disabilities in its planning frameworks, which may reflect a lack of political will (Qutteina et al, 2012). The interviewees' responses indicated that the CBR strategy is not well-known or appreciated by all disability organisations. These organisations need to receive more education relating to CBR so that they can design their activities according to the guidelines of this global initiative. Organisations of persons with disabilities and aligned civil society could benefit from awareness-raising and training on how to influence national development policy in order to be more inclusive of persons with disabilities, and of their potential contribution to national development (MacLachlan et al, 2014).

## **Limitations**

This study has a number of limitations. The aim of this research was to investigate social inclusion and mental health among children with disabilities in the Gaza Strip, West Bank and Jerusalem. However, due to political problems, violence and closure of the Gaza Strip, the primary researcher was unable to include other areas in the study.

The study would be more representative with a larger sample of children with disabilities, but due to requirements including transportation, guidance during the administration of the questionnaires, food and refreshments, the financial support for the research could not provide for a larger sample.

The qualitative sample was drawn only from KIs who were managers of disability organisations, rather than a broader range of people with experience in working with children with disabilities. Nonetheless, it was felt that these participants comprise a group with a unique and interesting perspective on service provision. The researchers are also aware that participants may have had implicit expectations of possible future funding (although there was no commitment to this in the information given prior to interviews) due to the fact that the primary researcher was conducting this study at a European university, funded by an aid organisation.

## **Conclusion and Recommendations**

The current research suggests that social inclusion of children with disabilities in the Gaza Strip is not prioritised and therefore children may experience exclusion and diminished mental health in their daily lives. Professional disability organisations need to develop CBR as part of a longer-term strategy aimed at strengthening rehabilitation and moving it beyond a medical and remedial model of operating. The researchers also recommend that CBR be integrated into a comprehensive framework for national policies, which ultimately supports the implementation of the Convention on the Rights of Persons with Disabilities (United Nations, 2006). As disability-related policies are lacking in most sectors, with the exception of the education sector (Qutteina et al, 2012), CBR needs to also be integrated into national development policies, especially health, education and livelihoods, and this should be done in such a way that persons with disabilities can be involved in both policy development and its implementation, monitoring and evaluation (Huss and MacLachlan, 2016). With regard to government, it is recommended that a statutory committee be established to strengthen CBR at a national level,

while ensuring that the CBR guidelines are integrated into all activities dedicated for persons with disabilities, including children with disabilities. Finally, the researchers recommend that future studies focus on how to strengthen, mobilise and increase the social inclusion and mental health of children with disabilities, particularly in conflict, migration and occupied contexts.

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## Appendix 1:

### The Brief Assessment of Social Inclusion for Children with Disability (BASIC-D)

Age: -----

CODE:
-------

Sex: Male  Female

How long is it since amputation?: ----- months ----- years

#### Type of Disability:

- **Upper limb amputation:** One hand    {below the elbow    above the elbow}
- Two hands    {below the elbow    above the elbow}
- **Lower limb amputation:** One leg    {below the knee    above the knee}
- Two legs    {below the knee    above the knee}

#### Place of residence:

City

Village

Refugee camp

Bedouin community

Others please specify: -----

		<b>Strongly disagree</b> <b>5</b>	<b>Disagree</b> <b>4</b>	<b>Undecided</b> <b>3</b>	<b>Agree</b> <b>2</b>	<b>Strongly agree</b> <b>1</b>
1	I am included in the school's activities, both curricular and non-curricular.					
2	I feel accepted when I use public transportation by others, especially drivers.					
3	I am invited to religious ceremonies in the same way as anyone else.					
4	I sometimes feel emotionally drained by my disability when it comes to social events.					
5	I enjoy it when I am invited to events related to people with disabilities.					