

Coping in a HIV&AIDS dominated context: Teachers promoting resilience in schools

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Abstract

This paper explains how teachers in schools function as resources to buoy resilience in the face of HIV&AIDS-compounded adversities. We draw on participatory reflection and action data from a longitudinal study with teachers (n=57, 5 male, 52 female) from six schools in three South African provinces. The study tracks teachers' psychosocial support following their participation in STAR (Supportive Teachers, Assets and Resilience). Verbatim interview transcriptions were thematically analysed. Following thematic analysis three themes (as well as sub-themes and categories) emerged: firstly teachers use resources to promote resilience in schools (teacher use: (a) systems to identify and refer vulnerable cases, and (b) neighbourhood health and social development services), secondly teachers form partnerships to promote resilience in schools (teacher-partnerships include: (a) children and families, (b) community volunteers, and (c) community organisations, businesses and government), and lastly vulnerable individuals using offered school-based support (using (a) vegetable gardens, (b) emotional and health support, and (c) capacity development opportunities). We found that teachers in the various schools followed similar post-intervention modus operandi to provide psychosocial support; teachers identified and used existing community resources to systemically buffer multiple risks; teachers provided support to various vulnerable groups across a range of vulnerabilities; teachers' psychosocial support occurred through networks; teachers used relationships in networks; and networks assisted teachers to function in their primary role as facilitators of teaching and learning. We conclude that teachers can promote resilience in schools by establishing networks with service providers that function across systems to support vulnerable groups. We theorise that the core of systemic networks are relationships, that relationship-driven support networks mediate the effects of cumulative risk, and school-based networks can enable schools to function as resilience-promoting resources.

Keywords: social capital, psychosocial support, resilience, schools as resources, STAR intervention.

Introduction

Various researchers posit that schools can serve as access points for the delivery of care and support to vulnerable members of communities [1-4]. From both policy and research arenas [1, 5-7] psychosocial support has been earmarked as a way in which teachers can address resilience in schools. Although the latest South African teacher training curricula include psychosocial support competencies [8], this was not the case during the training of most teachers who are currently in practice [6]. As a result we wanted to determine how teachers can promote resilience in schools after participation in STAR (Supportive Teachers, Assets and Resilience) - a strength-based intervention. From baseline data (9) it was apparent that teachers had not identified and used community resources prior to STAR. In this paper therefore we provide evidence of how, subsequent to STAR participation, teachers focused on available resources to mediate the effects of HIV&AIDS and promote resilience in schools [10].

The aim of this Participatory Reflection and Action (PRA) inquiry is thus to explore and describe the potential role of teachers in addressing resilience in schools by providing psychosocial support. The guiding question is: *How can insight into the way teachers provide psychosocial support to vulnerable children (following a strength-based intervention) inform resilience with regard to HIV&AIDS?* In this study 'strength-based' indicates an approach emphasising available internal strengths (assets), as well as external resources as suggested by an asset-based approach [11], although not negating the presence of risk. Psychosocial support refers to actions targeting vulnerable individuals to enable well-being.

We therefore describe teachers' role in the process of adaptation in an HIV&AIDS swamped setting. We explain how (over time) teachers assessed risk, how they mapped protective resources, and established protective mechanisms to act in concert to buffer the

impact of multiple risks in an HIV&AIDS school-setting. Based on a review of relevant literature we formulated three theoretical assumptions: children are made vulnerable by compounded risk factors characteristic of HIV&AIDS dominated contexts, teachers are able to implement psychosocial support strategies subsequent to STAR participation, and teacher-initiated psychosocial support is a catalyst for schools to function as protective resources to mediate children's vulnerability to risk,.

Understanding resilience

Resilience refers to the tendency to rebound, bounce back or recover in response to adversity [12, 13]. From a resilience perspective [14-17], individuals become vulnerable because they face multiple adversities (risk factors) that serve as barriers to their resilience [18-19, 20-21]. In order for individuals to bounce back from adversity, various resilience-promoting resources come into play. In this way resilience indicates both outcome and process [22].

For the purpose of the current study we focus on resilience as process, and specifically the extent to which teachers in school-setting can promote resilience by establishing protective mechanisms in the process of adaptation in an HIV&AIDS dominated environment. This process-oriented view of resilience implies scrutinising dynamic interaction between risk factors and protective resources. Said interaction modifies the effects of adversity [23], in this instance cumulative risk typical of HIV&AIDS-characterised settings. One such HIV&AIDS-related cumulative risk barrier is the socio-economic status of poverty. Social-economic status does signify a process impacting both resilience and vulnerability [22]. Equally, studies have indicated how supportive communities can promote resilience in the presence of increased socio-economic risk.

Dynamic interaction, what [13] refer to as transactional relationships between levels of resources, indicates resilience as ecological phenomenon [24]. With regards to children,

resources promoting resilience occur within systems of individuals, families and broader societies designating children's life-worlds. Other than dynamic interaction in the form of protective processes, interaction also implies engagement between risk- and protective processes.

Together with contextual variables, recent studies have shown distinctly cultural forms of resilience. Studies on cultural understandings of resilience by [25] caution that local knowledge about aspects of resilience need to be privileged, and that resilience implies intervention that, on the one hand engages simultaneous multiple forums, and on the other hand assists individuals to navigate towards health resources.

The presence of bonding, attachment, and connectedness has been earmarked as significant in promoting resilience [26]. Social cohesion therefore is determining in the process of resilience and is indicated by exposure to warm, caring and supportive environments [27]. Linking the ecology of resilience to the need for supportive cohesion brings to the fore the value of social capital. In this regard networks, links and partnerships can function as resources to promote resilience.

Schools and teachers as resources to mediate HIV&AIDS risk

Like others [28-32] we conceptualise schools as institutions that can serve as positive psychological pillars to buffer the various risk factors synonymous with the HIV&AIDS landscape. In our opinion, one prerequisite for schools to function as resilience-promoting resources that teachers act as protective resources [14, 33], or then provide psychosocial support.

In this way, conceptually psychosocial support becomes the method that teachers can utilise to buffer the challenges faced by children in order to facilitate resilience in schools [21, 34-35]. From an ecological perspective the importance of contextual systems have often

been investigated in resilience studies [13, 22], especially in terms of the individual, family and resources outside of the family. Recently, many have foregrounded the way that schools function as resource to promote resilience [12, 24, 36]. Particularly studies have foregrounded the significance of incorporating resilience-building efforts in schools by structuring school environments to strengthen resilience. The school-structuring typically involves cultivating positive environmental contexts to thwart risks in children's lives [24].

Resilience studies indicate that vulnerable children view both teachers and schools as resources that can buffer their resilience [18-21, 37-40]. Specific social-environment-level resources in school experiences include supportive peers, positive teacher influences and success (including academic success) [22]. Thus, schools can be meaningful settings in which protective resources can be enhanced and risk factors mediated [24]. Common characteristics health promoting schools share include community participation, a supportive physical and social environment, good school-community relations, as well as access to health services and well-defined health policies [27]

Of specific relevance to this study is the view of caring and support as strategy to promote resilience in schools of [36]. In the same way [12] indicate the role of educational psychologists to function systemically to ensure that schools are friendly spaces in which vulnerable children may feel welcome. When contemplating stigma and discrimination discourses related to HIV&AIDS, the school as safe and caring space has a central place in related literature [33].

From this discussion it is apparent that psychosocial support by teachers is underpinned by various aspects. Not only do teachers need to be willing to supply support, they also need to be aware of risk and resources in multiple systems to sustain children's well-being. Correspondingly, in order to promote resilience teachers' support actions need to be aimed at facilitating children's adaptation across systems.

The intersection of HIV&AIDS-related risk and schools

Because HIV&AIDS render children and families vulnerable [41-42] schools seem an obvious potential resource to explore to strengthen resilience [24, 36]. Also, HIV&AIDS usually occur simultaneously with many other stressors such as poverty, stigma, discrimination, increased depression and anxiety – to name but a few [4, 43]. Coping with these stressors in an adaptable way calls for resiliency, as well as supportive resilience vehicles. In their review of children's resilience [22] highlight that many studies have indicated the linear relationship between the number of risk factors in children's settings and the number of psychosocial problems during adolescence. Significantly for HIV&AIDS dominated settings, the effect of cumulative risk can be exponential seeing as that increase in the number of risk factors leads to increased opportunity for interaction between risk factors. Conversely, the same exponential effect bears true for resilience. In fact, as discussed by others [13, 38] found that children living in institutionalised care in an HIV&AIDS-risk affected environment experience resilience on a continuum.

HIV&AIDS-related challenges induce teachers to play a role in addressing vulnerability in schools [4, 18, 20-21, 44-45]. Besides the children in their classrooms and schools, teachers also encounter numerous community members who have to cope with HIV&AIDS barriers [10, 21]. Teachers see sick children in classrooms and playgrounds, hear grieving children who have lost parents, know of children who take care of ailing parents, are concerned about adult-like children who head households, and worry about children who live in income-poor households due to job loss. At the same time, teachers interact with community members who live in a vulnerability-saturated world. Teachers meet parents who are concerned about the future care of their children and engage with unemployed caregivers who struggle to provide for the basic needs of their households. Often, teachers themselves

are infected with HIV and face the stigma and dilemma of disclosing their status [46]. They also worry about their future health, employment and care-giving responsibilities. In many other instances, teachers care for loved ones afflicted with AIDS-related illnesses, or fill in for colleagues who are unable to teach due to HIV&AIDS-related absences from work [47]. Accordingly, teachers' lives are entwined with numerous risks related to HIV&AIDS. We nevertheless argue that teachers are well placed to counterbalance risk by supporting the resilience of both children and their family members who face adversity due to HIV&AIDS.

We acknowledge that not all teachers necessarily are (or want to be) instruments of social support. However, potentially some teachers may, either by nature or need, administer certain tasks (psychosocial support) across various systems [35]. In the individual system, teachers manage children's well-being; they address and support children with regard to counselling and career guidance; and they respect children's dignity and constitutional rights. In the systems related to the classroom, playground and school environment, teachers manage classes with authority. They demonstrate compassion and fairness, advance gender equality, direct interaction aligned with human rights policy, accept responsibility for and ensure safety, and they enable participation in after-school activities. Regarding the parent/caregiver system, teachers communicate and discuss the relevant behaviour and progress of children. On a societal level, teachers understand and react to social and educational challenges (risk factors).

STAR intervention: school-based intervention with teachers for resilience

Intervention and resilience

For intervention purposes, resilience studies have indicated specific processes within various systems that can mediate the impact of risk settings, one of which is schools. Traditionally school-based resilience interventions may be either outcome- [48]; or process-oriented [49],

or combine outcome- and process foci [24]. In addition school-based resilience interventions may target either children or youth [e.g. social competence in terms of life- and social skills interventions (24, 26, 48, 50)], teachers [e.g. promoting resilience in teachers and staff (24, 51, 52)], or school-systems [48]. Regarding HIV&AIDS, more often than not, schools serve as forum to engage with youth in school-based programmes to address health risk behaviours [53-54].

As *'Schools can not serve as effective resilience-building environments unless they enable school personnel to function at an optimal level'* [24] we developed STAR as a resilience intervention for the ongoing professional training and development of teachers [36]. As resilience intervention, STAR embraces conceptions of resilience as contextual, cultural and process-oriented. Specifically STAR builds on the idea of enabling teachers to use schools as organisational base to mobilise linkages with other protective resources [24].

STAR: conceptualisation, purpose and target audience

STAR is a school-based intervention targeting teachers in an effort to develop schools as safe environments to buffer against adversity. As a resilience-based approach [22] STAR emphasises building skills and capacities to facilitate successful negotiation in an HIV&AIDS high-risk environment. In this way STAR aims to enable teachers to promote resilience in schools with the understanding that individual adaptation to adversity depends on wide-ranging assessment of available resources on various levels. By implication STAR also facilitates identification and prioritising of risk. As [22] argues *'effective interventions could be aimed at developing the individual's internal resources and skills and equally importantly changing the social environment to further promote resilience'*.

When we conceptualised STAR we posited that a strengths-based approach enhances the likelihood of sustainable psychosocial support [55]. Such a strength-based orientation to

psychosocial support implies that teachers will use available resources, capacity and assets to address existing needs, barriers and deficiencies. Teachers will determine which resources are available in school communities, as well as identify risks that need to be addressed. Then, teachers will mobilise accessible assets to mediate prioritised risk. Central to STAR is the notion of collaboration and partnerships to establish psychosocial support networks.

STAR: development, piloting and format

The current study is part of our PRA study [56] initiated in one school in an informal settlement community in 2003 which subsequently evolved into the ongoing STAR investigation, currently involving eleven schools situated in three provinces in South Africa. Each field visit in the various research settings. The development and piloting of STAR was participatory and iterative, characteristic of PRA. In Table I the STAR intervention research phases are presented. This article reports on the initial four schools (40 teacher participants) involved in the development/pilot phase (2003-2006), as well as the first two schools (17 teacher participants) involved in determining the fidelity of STAR (2007-2009) - therefore totalling six schools (57 teacher participants).

The development/pilot phase occurred in four schools between 2003 and 2006, involving 40 teachers (n=40, 2 males and 38 females). We implemented STAR with ten teachers from each school. We asked volunteers from the teacher-corps of purposefully selected schools to participate in STAR.

<Insert Table I here>

STAR spans six 8-hour PRA intervention sessions (36 sessions in all) with teachers. The implementation occurs on the premises of participating schools. Following the intervention, teachers may opt to implement (or not) initiatives to provide psychosocial support to vulnerable children in their schools.

STAR: Monitoring, evaluation and implementation fidelity

Typical of PRA monitoring and evaluation occurs throughout the intervention study.

Continuous monitoring and evaluation occurred during each site-visit to schools-settings and took the form of both observation, as well as focus group and individual interviews (as discussed in a following section). Table I reflects details of monitoring and evaluation activities.

Currently STAR is in a dissemination research phase (since 2007) to investigate implementation fidelity. This phase involves seven additional schools in three provinces. In the dissemination research phase, teachers who were involved in the first phase of the study were trained as STAR facilitators. STAR teacher-facilitators then implement STAR with teachers in neighbouring schools.

Method

Methodological approach, research design and selection of participants

Our PRA intervention study is anchored in and guided by interpretivism (selected meta-theory), which afforded us the opportunity to conduct research with teachers in their natural environments (school context) to gain insight on how they may promote resilience [57]. We viewed participants as partners and experts throughout the research process. We encouraged participants to share their knowledge, co-create and co-determine the progress and processes of the research. We aimed for participants to be able to take action when challenges were mentioned during discussions and facilitate positive change in the community [58].

Consequently, applying PRA principles allowed us to replace a potential focus on finding and solving problems with facilitating change, by means of enabling participants during the STAR intervention research.

We employed purposive sampling to select schools, identifying potentially information-rich cases, to be able to gain a deep understanding of our focus of investigation [59-61]. This implied that the schools would be located in settings signifying HIV&AIDS-related risk.

We initially entered each school via a contact person or key role player, such as a school principal, who subsequently assisted us in identifying teachers to be involved in the project. Besides the initial school (where the principal selected ten teachers), an open invitation was posed to all teachers at the other schools to voluntarily become involved in the study. Participating teachers are not limited to specific learning areas or areas of expertise. Teachers involved in STAR are responsible for a variety of grades (eg foundation phase, secondary education) and specialisation areas (Science, Business Economics, Early Childhood Education specialists, Agricultural studies). We relied on teacher-participants to select other community members and stakeholders for additional individual interviews – this data source does not form part of the current study. Table II provides an overview of the participating schools and teachers.

<Insert Table II here>

Data collection, documentation and analysis

We relied on multiple methods of data collection to add rigour, richness and depth to our study. By employing crystallisation [62], various methods reflect different nuances to the data collected, resulting in a refined view of the reality being researched. (Refer again to Table I for a summary of our data collection and documentation procedures.) We utilised focus groups combined with PRA-interactive activities (involving teachers), and individual interviews (both informal conversational and semi-structured interviews with teachers and

other school setting stakeholders such as social workers, nurses, and representatives of NGOs and faith-based organisations) as primary data collection strategies [61, 63].

Research activities focused on: (1) obtaining baseline data in each school (first focus group during each first field visit to schools), (2) implementing STAR, (3) data collection to explore the promotion of resilience, (4) member checking of data analysis, and (5) monitoring and evaluation. Aligned with the theoretical assumptions of the study, the focus groups and interviews were guided by the following questions: (1) Which risks can be identified in your school/community?; (2) Which resources can be identified in your school/community?; (3) How do teachers mediate risks by relying on identified resources?; and (4) How and by whom is teacher-initiated school-based support used?

Although focus groups and interviews were supported by observation-as-context-of-interaction [64] and documented by means of field notes, reflective journals and visual data capturing techniques [61], data sources for this article are limited to verbatim transcriptions of focus groups and interviews. As our background and culture differ from that of the participants, we requested field workers and other school setting stakeholders to assist us in interpreting non-verbal communication when the need arose. In addition to the mentioned data collection and documentation procedures the teachers attended two seminars (November 2008 and March 2009) as part of the STAR project, where they presented their psychosocial support initiatives subsequent to STAR (10 one-hour teacher-presentations in total).

Data collection and analysis was participatory and iterative. During thematic analysis of verbatim transcriptions we initially identified themes, sub-themes and categories. We followed initial analysis with final analysis, focusing on a comparison of different categories of themes and concepts, the identification of variations and connections between them, and, ultimately, the integration of the various themes and concepts [57, 65]. Although we initially employed the software data analysis programme Atlas.Ti with the aid of an external coder,

we decided to rely on our own analysis without the assistance of the software programme after the first round of analysis. Our decision was primarily based on personal preference and our belief that we could gain a deeper understanding by conducting independent analysis of the data obtained. Thus we relied on a colour-coded word processor method [66] rather than the software programme.

Trustworthiness of the study

Due to the fact that meanings vary across different contexts of human interaction and based on our selected paradigm of interpretivism, we did not seek generalisable findings. By producing rich and detailed descriptions of the structures of meanings that developed during the research process we did, however, attempt to obtain transferable and credible findings, thereby producing findings that are convincing and believable. As such, we attempted to produce rich and detailed findings by making use of crystallisation [62].

We entered the research field as white South African graduate females, which implied the possibility of subjectivity and prejudices. In an attempt to overcome this potential challenge and ensure the credibility of our study, we focused on clarifying issues with the participants where there seemed to be uncertainty, as multiple meanings were bound to be ascribed to the reality that the study focused on. In this way, and by being aware of the possibility of researcher bias, we aimed to obtain confirmable findings and conclusions [61, 67].

Furthermore, we aimed at obtaining findings that could convince a research audience that the reported results and procedures indeed occurred as reported, thereby also meeting the criterion of dependability. Finally, we aimed at obtaining authentic findings, by providing a balanced perspective of the various views, perceptions and beliefs of the participants in the various research sites [57, 67].

In addition to addressing these criteria for trustworthiness, we strived to meet the core criteria for rigorous qualitative research, as formulated by [68]. For inter-subject comprehensibility we documented the research process in detail and relied on interpretations in groups, member checking and peer debriefing, discussing our project with co-researchers and colleagues in the research arena. In terms of empirical foundation we based theorising on data (specifically verbatim perceptions and views of the participants) obtained during our study. On the topic of coherence, we thus view theorising that developed during the process of our study as internally consistent. Based on the implied practical application value of this PRA study we regard the study as relevant and meaningful by contributing to existing theory on resilience and the potential role of teachers and schools to promote resilience.

Ethical considerations

Prior to entering the research sites, we obtained required permission to conduct research from relevant South African education authorities (i.e. Eastern Cape, Mpumalanga and Gauteng) and from principals of various schools. In addition, we obtained voluntary informed consent from participants before any data collection or documentation activities commenced. For this purpose, we explained the nature, purpose and process of our study, stipulating the activities and expected involvement of the participants. We briefly introduced the intervention that the study was based on, and described the main data collection and documentation procedures that we would be utilising. We assured participants of confidentiality, privacy and anonymity of any information obtained, although we indicated that we could not guarantee confidentiality of information shared during focus groups on behalf of the other participants. We did, however, emphasise that we would continually request all involved to respect this ethical guideline and to treat shared information as confidential and private. We took relevant steps to protect confidentiality by altering identifying information on photographs and

transcripts of interviews, and by keeping data sources in a secure place. As the project developed, in terms of anonymity, several of the participants requested to be identified in reports and publications on the study. In response to this request, we obtained written consent from participants, indicating their choice to be recognised and identified in representing results and findings of the study [59; 69].

In addition to these ethical principles, we followed the necessary guidelines to ensure that participants were not deceived, did not experience any form of distress, knew what was going on during the entire research process and knew that they were entitled to withdraw from the study at any time. In addressing representation ethics we relied on member checking and consulted with participants in an attempt to ensure that findings reflected their voices and perceptions [60; 70].

Limitations

It is important to note that findings in the current study need to be interpreted with some caution given the limitation of the small sample size. In addition the bias of the teachers participating in STAR need to be taken into account. In this regard teachers' willingness to participate in the intervention plausibly denotes high levels of commitment and compassion which in and of itself served as individual-level resources together with that of the intervention. Therefore teacher-willingness to offer support can not only be viewed as a consequence of only STAR, but also need to be related to teachers' intrapersonal characteristics (strengths, attitudes). Most significantly however, given the study's design, the link between STAR and teachers' supportive behaviours is tentative and is currently investigated in a longitudinal study.

Results: 'It's actually like a joint venture'

Table III reflects the various themes, sub-themes and categories which emerged from focus group and individual interview transcriptions. The themes are well represented by a participant's description of how resilience is promoted in his school: *'It's actually like a joint venture'* (Male Teacher, School 4).

<Insert Table III here>

Theme 1: teachers use resources to promote resilience in schools

The first theme that transpired was that teachers use various existing resources in school settings to promote resilience. On the one hand teachers used systems of identification and referral to provide support to children (and their families) that are vulnerable. On the other hand teachers accessed available health and social development services as resources to promote resilience in schools.

Sub-theme 1.1: Systems to identify and refer vulnerable cases

Teachers developed and used systems to identify vulnerable children and their families, and also to refer identified individuals to relevant services. Systems for identification functioned within school systems (e.g. classrooms, playground). Systems for referral functioned within larger school-settings as a way to link vulnerable individuals with available resources (e.g. neighbourhoods, clinics, faith-based organisations).

Teachers in all participating schools used school plans to establish, implement and monitor systems for identification and referral. Teachers developed and implemented checklists to identify vulnerability based on behaviour change (drowsiness in classes, withdrawal from activities, expressions of anger, sadness and anxiety), as well as appearance (unkempt, absence of school uniform) and health (increased hunger, lack of concentration, blisters and sores on faces): *'So it is really paining to see a child not wearing shoes in winter and so on – some coming here you can see they are from poverty, you can see that they are*

not properly fed because of their physique, their uniform is in tatters and that pains you and gives you the motivation to help' (Female Teacher, School 3).

Teachers directed the identification and referral initiatives, as one teacher noted: *'You know, I...start with myself as link, as a coordinator of the...project here at school'* (Female teacher, School 5). Another teachers stated that *'One other thing I've learnt is that as educators, ...it is possible that we can go an extra mile helping other people out there as long as we have ideas and as long as we communicate and as long as we form groups'* (Male teacher, School 2). Teachers established groups within schools to monitor the status of children they referred to networks.

Other than systems of identification, teachers also used systems of referral to promote resilience in schools. In this regard teachers provided children and their families with referrals to relevant social development stakeholders to access grant information, apply for grants and monitor progress of their applications. Teachers also tapped into their relationships with service-partners to monitor and evaluate the progress of referrals: *'So, if the child reports that I have a parent who is very ill, I just pick up the phone and call sister X. She comes to our school, we go to the place and then she does the rest. Admission is done by her'* (Female teacher, School 3).

Sub-theme 1.2: Health and social development services as resources to promote resilience in schools

Teachers used health services to promote resilience in schools. In this regard several categories of health and social development as resilience promoting resources emerged. Teachers disseminated information on HIV&AIDS-related health issues, assisted children and their families to access health and social development services, and targeted nutrition as a priority health issue.

Teachers shared information on inter alia HIV&AIDS prevention, care and support: *'We invite them (parents) to come and listen, ...so that they can hear and maybe spread to other members of the community. Like during the HIV and AIDS thing, the specialists who are invited to the school, we invite even the parents to come and listen so that...they can discuss...in their social clubs'* (Male teacher, School 3). In order to share information on existing health services to vulnerable community members, teachers in one school (School 1) established a school-based clinic in partnership with a local doctor, nurse and clinic.

In all but one of the remaining schools (Schools 2, 3, 5 and 6), teachers established links with the local clinic and/or hospital for voluntary testing and counselling. The following extract indicates how a teacher views this resilience-promoting strategy: *'then we are here to encourage clinics...they must go to the clinic because this is where they are going to get help, then to get medication, then to organise caregivers'* (Female teacher, School 1).

In four of the schools (Schools 1, 3, 5 and 6), social grant information was shared via networks: *'So we're all the time busy doing all these things, like we have children that we put in for foster care, we give support'* (Female teacher, School 6). Teachers distributed application forms to supplement their household incomes. Also, teachers helped adult caregivers to complete grant forms.

In all of the schools, psychosocial support targeted feeding and nutrition, and all the participating schools established vegetable gardens. Produce from vegetable gardens were used to supplement food from the Department of Education's feeding scheme: *'the department don't provide us with vegetables, only maize, soya and all that stuff, and we do the extra'* (Female teacher, School 5).

As illustrated in the following two vignettes by teachers, produce from vegetable gardens were supplemented by donations (including clothing) from businesses in the neighbourhood: *'At that moment we had various stakeholders, they managed to give us*

support and food parcels. Our learners were getting food parcels, they were receiving clothes, school shoes and uniform from other people' (Female teacher, School 1); 'And then we've got X who is running a Pick 'n Pay...every month end he obtain sends parcels to the school so that they can take home to go and eat. We have a vegetable garden, every Friday they get spinach and tomatoes from our garden because it only started two months ago...and then during winter time Checkers brings a lorry to our school with soup and bread. During breaks they eat bread and soup, they never get cold, our kids never cold in winter' (Female teacher, School 3).

The following sketch captures the essence of teachers' views on nutrition and HIV&AIDS: *'because we understand that we need to eat vegetables. Like for example people who are infected and affected by the epidemic virus. We thought that maybe if we could just have a small garden where we could plant vegetables so that the people around the community will not go and buy the green stuff from the market. They can just plant and come and have the vegetables in the garden' (Female teacher, School 2).*

Theme 2: teachers formed partnerships teachers to promote resilience in schools

Teachers formed partnerships to promote resilience in schools. Teachers partnered with children together with their families. In addition teachers formed partnerships with unemployed community members as volunteers in resilience promoting activities.

Sub-theme 2.1: teacher-partnerships with children and families

In efforts to promote resilience in schools, teachers followed a family-centred approach by partnering with families, not only identified vulnerable children. Children and their parents (or caregivers) worked in vegetable gardens as part of teachers' school-based feeding schemes.

Teachers did not view children in isolation when promoting resilience. Teachers included families in resilience promoting initiatives: *'that was our goal: to support the many needy families'* (female teacher, School 4), *'helping especially the poverty stricken families that we are working with here in this community'* (Female teacher, School 5), *'I made other teachers aware of the situation. And then everybody supported the child. So, she is like, well now'* (Female teacher, School 6).

Parents (or caregivers) were also partners in teachers' nutrition efforts as parents worked in school-based vegetable gardens in all of the schools. In some schools (Schools 1 and 2) children also participated in tending vegetable gardens. Children either worked during schools hours in a curriculum-integrated manner, after school hours and/or during break-times: *'X maintains the garden, especially the natural science group. They maintain the garden, look after the garden...they're in charge of the garden'* (Male teacher, School 2).

Sub-theme 2.2: teacher-partnerships with community volunteers

Teachers partnered with unemployed members of the community to cultivate school-based vegetable gardens: *'a person comes with a spade, a fork and rake of their own and cut whatever site of land he wants'* (Female teacher, School 5). In two of the schools (Schools 1 and 5) parents (or caregivers) sold surplus produce to generate household income. The following narrative is an examples of the way in which vegetable gardens became a way for, otherwise unemployed individuals, to engage meaningfully in the school-setting: *'Most people are unemployed in this area. We were saying that with the gardening project it will be easier for these people to get something into their pockets in a long run because they will be selling the vegetables to the outside world'* (Female teacher, School 5).

Sub-theme 2.3: teacher-partnerships with community organisations, businesses and government

Promoting resilience indicated interaction across systems. In this regard teachers were able to promote resilience in schools by forming and maintaining partnerships with a host of neighbourhood, municipal and governmental institutions. Specifically teachers partnered with community organisations, the business sector as well as governmental departments.

Schools 1 and 3 provided after-school care to children by collaborating with community organisations and non-governmental organisations (NGO's). Three of the schools (Schools 1, 3 and 5) established collaborative systems with businesses and NGO's to provide children with school uniforms and other clothing. In two of the schools (Schools 1 and 3) food parcels to vulnerable families included produce from the vegetable garden, as well as donations from the business sector: *'our learners were getting food parcels, they were receiving clothes, school shoes and uniform from other people'* (Female teacher, School 1). In addition, School 1 established a counselling centre on site, which was funded by a bank following an application initiative by the principal.

School 1 initiated home-based visits by teachers in the form of a support group for vulnerable families, and worked in consultation with faith-based organisations. Later on, community volunteers (who were trained by and received an honorarium from the Department of Education) took over this role from teachers.

Theme 3: vulnerable individuals using offered school-based support

From the first two themes it is apparent that teachers provided support in the form of mobilised resources and partnerships. This theme provides evidence of awareness and use of school-based support tendered by teachers. In the first instance children, parents, families and neighbourhood-members made use of the vegetable gardens. Secondly, children and parents

accessed health and emotional support provided at schools. Lastly, children and parents made use of capacity development opportunities.

Sub-theme 3.1: Making use of vegetable gardens

School-based vegetable gardens were used widely by children, parents and community members. Parents used the vegetable gardens to receive food to supplement household-provisions: *‘And they come in large numbers and I’ve got a lot of them... there are lots of parents and we find out that they are so interested ... because each and everyday they must come and have a look at their garden. A person comes with a spade, a fork and rake of their own and cut whatever site of land he wants’* (Female teacher, School 1). In addition, as parents’ benefited from the vegetable garden, they took shared ownership of the school premises: *‘What is happening with the vegetable garden, what I’ve seen so far, it helps a lot with the community because what is happening now, the parents are taking care of the school, they don’t want the gate to remain open, they don’t want any animals to come in because they are keen, they are looking out for the vegetable garden’* (Female teacher, School 1).

Other than parents, members of the neighbourhood community also collected food from the school-based vegetable gardens. In each of the schools a specific protocol was put in place to manage the distribution of food to individuals requesting support: *‘And anyone from the community can feel free if they need any vegetables...we monitor that, because they don’t just come in, they come to the office and they ask and if there’s any we will provide them with whatever is available...You don’t just come in and pick here, you come, you ask, you first see the principal, we like to follow procedures’* (Male teacher, School 4).

Children in particular benefited from the vegetable gardens by receiving food. Teachers distributed produce from vegetable gardens: *‘when we harvest we will give the*

vegetables to the orphans, we have so many’ (Female teacher, School 3), *‘the greens from the garden, we use to prepare food for our needy learners. We’ve (also) got a feeding scheme at school, the spinach, the cabbage and tomatoes we get from the garden and we cook it for them*’ (Female teacher, School 4).

Sub-theme 3.2: Accessing health and emotional support

Parents and children accessed health and emotional support. An example of health-related support is a child who expressed concern over an ailing parent and requested support for referral and health services: *‘So if that child reports that I have a parent who is very ill, I just pick up the phone and call sister X, she comes to our school, we go to the place and then she does the rest. Admission is done by her*’ (Female teacher, School 3).

Parents and extended families also approached teachers for emotional support. The following narrative indicates that families used school-based mechanisms for emotional support : *‘I would like to emphasise that the support group is working because the uncle of the one, he came this morning to thank the support group for the good work that they are doing*’ (Female teacher, School 1). During supportive discussions parents often requested teachers to provide them with information, as indicated by a teacher reflecting on the impact of supporting a parent affected by HIV&AIDS: *‘that one of working with people who are affected ... sometimes if you have to explain things, it becomes difficult for them to understand ... it was very interesting for me to ...explain some of the things and trying to make them understand why do we have to have projects in around the community*’ (Female teacher, School 2). Available support thus served as a way to draw people in need to schools. One teacher captures the way that care and support provided at schools provide antidotes to stigma: *‘you see more people come to school to disclose their status... they can get food, help you see from the school....support will get people*’ (Female teacher, School 1).

Children similarly made use of emotional support. In the following extract a teacher explains how children depended on the presence of social workers for support: *‘Every Friday when the kids leave the place where they are staying, they first go to the social workers, and then there they discuss different programs. They have different programs and topics that they talk about’* (Male teacher, School 3). In the same way, children experiencing behavioural problems targeted teachers for support, as evident in the following extract of children struggling with addiction: *‘There are children who are dealing with drugs, they come to the office and given advice because we are working hand and glove with Child Line. And then we have the teachers, as she has already said that, who are training two schools’* (Female teacher, School 1).

As with vegetable gardens, support strategies drew parents into the school: *‘Also this (STAR) project brought the parents together – you know sometimes it’s difficult for them just to come to the school but with this project we saw them coming when we started’* (Female teacher, School 2). Not only did parents use available counselling services, they were also willing to participate in school-based activities. An example is parents expressed readiness to help with a school-initiative of home-based care: *‘Their willingness, their positive attitude towards the project, they responded positively and they indicated and they showed that they were really interested in the (home-based care) project’* (Male teacher, School 1).

Sub-theme 3.3: Using support to develop capacity

Parents and children made use of offered school-based support to develop their capacity. An example is parents at School 1 using a training opportunity provided by various school-partners: *‘those parents were trained in various aspects, to put a few, they were trained on HIV/AIDS and counselling. Again they were trained in parenting empowerment, to know how to deal with kids, or to bring up their kids... They were also trained in trauma... These 22*

parents also were trained conducted by X from the Department of Health, can you see we are working with different people, all those workshops were catered for by different NGO's' (Female teacher, School 1).

Children used support mechanisms to improve their learning, and also to participate in extramural activities, as indicated in the following narratives: *'They come four days a week, Monday to Thursday, they have a place where they can do homework, they see the learners and they have a computer programme for the learners'* (Female teacher, School 4), and *'On the side of HIV support group, we managed to organise a pastor for us who can assist us with a group of people. There are kids who..., after school everyday, they go to a place of safety where...they worship, they pray and they play some games thereafter'* (Female teacher, School 3).

Discussion: 'It will not be a garden anymore, it will be a field'

We structure the discussion in terms of our theoretical assumptions. Central to the discussion is the notion of teacher support as dynamic, and expanding: *'it will not be a garden anymore, it will be a field'*.

Children are made vulnerable by compounded risk factors characteristic of HIV&AIDS dominated contexts

Teachers provided support over a range of vulnerabilities in the HIV&AIDS-affected school settings. Consequently, teachers' psychosocial support initiatives included (1) children experiencing extreme poverty in HIV&AIDS-inundated settings as manifested by hunger, ill-health and neglect; (2) children (including children from neighbourhoods beyond a specific school); as well as (3) families of children identified as vulnerable. As with other studies [20, 71], this finding indicates that resilience in terms of HIV&AIDS cuts across various

vulnerabilities and supports our assumption that children are made vulnerable by compounded risk factors (one of which is HIV&AIDS). As argued elsewhere [15-16, 37], resilience efforts can consequently not merely be targeted at HIV&AIDS in isolation, but needs to take compounded risk into account.

In terms of HIV&AIDS, teacher-initiated protective processes favoured specific priorities. Firstly teacher support aimed at identification of vulnerability, together with referral to health and social grant services. Secondly, teachers' risk (and resource) assessments targeted children as part of families. Thirdly, teacher support gave preference to providing for children's (and their families') basic needs (food, school uniforms, social grants for household incomes).

Supporting children as part of families and larger communities because of cumulative, ongoing risk supports arguments in other studies [15-16, 33], that in order to buoy children's resilience, they should not be viewed in isolation but as part of larger systems (be that families or communities). The current study therefore supports the relatedness of children and families when adversity is identified and when schools are structured to mediate the effects of such risk [24]. In accordance with similar findings [24], accessing both formal and informal social supports in distressed neighbourhoods seem to be key in discourses on resilience and HIV&AIDS settings. Thus, promoting collective resilience [72] seem to be a relevant strategy to in settings inundated with HIV&AIDS-risk. In the current study collective resilience was indicated by: local people engaged by teachers to mitigate risk, teachers creating organisational linkages, and teachers boosting social supports. Reducing risk and resource inequities is an aspect of collective resilience which is absent in the current study and merits future policy-related inquiry.

Although the intersection between access to health services for resilience purposes has been documented [26], the current study demonstrates that enabling social capital (or

networks) in policy and practice frameworks of education and health services seems feasible to promote resilience in HIV&AIDS saturated settings. As a result, in order to promote sustained resilience when HIV&AIDS forms part of the risk-features of an environment, partnerships and resources need to be accounted for when developing education, health and social policy.

Teachers are able to implement psychosocial support strategies subsequent to STAR participation

Teachers' modus operandi post-intervention was to (1) identify available assets and relevant risks; (2) initiate partnerships with people related to these assets in order to provide psychosocial support; (3) establish school-based community systems to identify vulnerability; (4) refer children and families for support to pertinent partners in the community systems, and (5) maintain and monitor partnerships. These teacher actions support the assumption that STAR facilitates teacher-implementation of psychosocial support strategies.

Teachers opted to establish mechanisms and processes that function to modify the effect of a HIV&AIDS-risk setting. In an effort to ameliorate adversity teachers instituted protective processes. Thus, in the mediating process teachers, on the one hand, assessed risk that increased children's response to adversities (rendering them more vulnerable). On the other hand teachers assessed available resources that could serve as structures to ameliorate children's response to adversity. Neighbourhoods as influential environmental resource has been well documented [24], and the current study supports the role teachers can play in identifying, mobilising and linking resources to promote resilience.

Significantly teachers used partnerships as a way to offer support. As also indicated in other resilience studies [22, 24, 26] partnerships was a way for teachers in the current study to expand the framework of resilience to include various protective processes. Table IV

provides an overview of support provided by teachers. From Table IV it is evident that the resources and partnerships teachers used to promote resilience indicate interaction between various contextual systems. Through partnerships teachers linked individual-level resources (e.g. teacher compassion and commitment) with social-level resources (e.g. parents' willingness to cultivate gardens) and societal-level resources (e.g. school leadership, small businessmen, clinics and social workers).

Teachers' psychosocial support occurred through networks. Characteristic of an ecological perspectives on resilience [13, 24] the networks were systemically integrated, collaborative and referred vulnerable individuals to either community systems or on-site networks at schools. Teachers partnered with laymen as well as professionals to establish and utilise networks, including systemic partnerships with governmental departments, faith-based organisations, clinics, other schools, the business sector and NGOs. This finding corresponds with the results of other development studies [17, 73-75] that signify networks, collaboration and partnerships as central to strength-based interventions. Significantly networks also 'liberated' teachers to function in their primary roles as facilitators of teaching and learning. Simultaneously, teachers continued to provide psychosocial support. They identified, referred and monitored children's well-being in collaboration with partners, via networks.

Teachers provided school-based psychosocial support in networks by means of relationships. The relationships served as vehicle to access and mobilise identified resources for addressing identified needs. Likewise, networks were maintained by means of relationship qualities, namely communication, shared agendas and ownership. We therefore contend that relationships within networks are resilience-promoting resources that teachers could utilise to address resilience. This finding echoes that of other studies [17, 74, 76] in which relationships are indicated as essential for strength-based capacity development.

Teachers' use of partnerships brings to the fore the notion of social capital. As indicated by others [22, 27, 51], findings in the current study likewise recommend that social capital, as prominent concept within public health and social epidemiology, calls for further investigation within the realm of resilience – and specifically pertaining to teachers and schools as protective resources.

Teacher-initiated psychosocial support is a catalyst for schools to function as protective resources to mediate children's vulnerability to risk

The current study indicates instances where teachers and schools can ameliorate risk in HIV&AIDS influenced environments. Teachers in all the schools identified and used existing community resources to provide systemic psychosocial support to vulnerable children. Significantly children, youth and families made use of tendered support demonstrating reciprocity and the value of protective resources. This finding supports suppositions [14, 16-17, 77] that available resources can be mobilised and accessed to promote resilience.

Specifically the current study indicates how teachers use schools (as a social environment-resource) to direct the establishment of supportive communities, through partnerships. In the past school-community collaboration has been indicated as significant in promoting resilience [24]. Significantly, the current study establishes that in HIV&AIDS stressed settings, teachers used partnerships to establish school-linked services and situate social and health services for children and their families in school sites. In this way teachers and school-level resources are expanded as resilience experiences to thrive beyond supportive peers, positive teacher influences and success experiences as previously found [22].

In the current study is emerged that when schools become caring, safe and friendly spaces occupants of schools (children, their families and teachers) feel more at ease to

disclose vulnerability and, importantly in terms of HIV&AIDS, be referred for health services (and often also to access socio-economic security by means of grants). In this regard safe and caring schools have been linked to increased sense of community [24], as well as a sense of belonging [48]. The potential role of schools as spaces of community and belonging to mediate effects of stigma and discrimination related to HIV&AIDS warrants closer scrutiny.

It would seem that, amongst other factors (including teacher disposition, available resources), teachers' provision of psychosocial support is one catalyst for schools to potentially function as resilience-promoting resources. In addition the current study provides empirical evidence for the inference [1] that schools can serve as nodes of care and support to vulnerable children. In addition, this finding broadens this inference by surmising that schools also provide access to care and support to extended vulnerable groups.

Seemingly the implementation of support was more challenging in secondary and rural schools. The effects then of a tighter curriculum as well as that of rurality [78-80] on teachers' ability to provide psychosocial support by means of networks deems further investigation. Other areas for future inquiry include establishing trends in teacher-support related to gender, as well as examining factors related to sustaining school-based support.

Conclusion

The findings indicate that teachers promote resilience by making the most of social capital to identify and harness community resources. In these ways teachers engaged in efforts to buoy vulnerable children. Thus the theoretical contribution lies in the importance of teacher-child, teacher-teacher and teacher-community relationships as key to resilience promotion within an HIV&AIDS dominated context. In addition, the current study contributes to understanding the complexity of teacher and school-based interventions in the context of HIV&AIDS by providing evidence of positive teacher practice geared towards the promotion of well-being.

Although it remains contested whether or not teachers should provide psychosocial support [4, 81], our findings suggest that teachers can play a significant role in promoting resilience. We conclude that teachers address resilience in schools by establishing networks with service providers that function across systems to support various vulnerable groups. These relationship-driven support networks mediate the effects of cumulative risk. We theorise that relationships constitute the core of such systemic networks. We postulate that these school-based networks by teachers in partnership with others enable schools to function as resilience-promoting resources. We argue that a strength-based approach can enable teachers to establish and sustain psychosocial networks across systems. In our study, support networks 'released' teachers to perform their primary role as facilitators of learning.

In conclusion, the current study provides evidence of the impact of schools (as part of school-settings) on resilience. Specifically findings indicate that teachers can use schools and relationships to enable comprehensive community efforts to facilitate resilience. As, for the near future, HIV&AIDS signals a source of risk that cannot be easily resolved, insights from the current study provide pragmatic strategies teachers (and school-settings) may follow to promote resilience in children's immediate environments. As [24] argues, what schools cannot do, is offset the inequalities in society (many of which are heightened in HIV&AIDS dominated settings). As resilience is not a cure for HIV&AIDS risk, societal mechanisms and policy structures continue to be pivotal to buoy resilience processes. And, based on findings from the current study, teachers seem to hold a panacea to promote systemic, school-based support.

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Table I. *STAR intervention research phases and data collection*

Data collection activity	Number	Participants and timeframe
Focus groups for baseline data purposes	6 (1 in each school)	Teachers, 6 schools 2003-2009
Focus groups for the purpose of data collection/monitoring and evaluation	39	Teachers, 6 schools 2004-2009
Informal conversational interviews	41	Teachers and other school setting stakeholders, 6 schools 2003-2009
Semi-structured interviews	19	Teachers and other school setting stakeholders, 6 schools 2004-2009
Presentatioins at 2 seminars	10	Teachers 2008-2009
Observation-as-context-of-interaction	Ongoing	Researchers, teachers and contexts of 6 school settings 2003-2009

Table II. *Participating schools*

School	Participants	Primary / secondary	Urban / rural	Province	Pilot phase	Dissemination phase	Participation timeframe
1	N=10 All Female	Primary	Urban, informal settlement	a	Yes	Facilitated STAR to two schools	2003-
2	N=10 Females=7 Males=3	Secondary	Rural	b	Yes	Trained as STAR facilitators	2005-
3	N=10 Females=9 Males=1	Primary	Urban	c	Yes	Trained as STAR facilitators	2005-
4	N=10 Females=9 Males=1	Primary	Urban	c	Yes	Discontinued	2005-2007
5	N=15 All Female	Primary	Urban, informal settlement	a	No	Trained in STAR by School 1	2008-
6	N=2 All female	Primary	Urban, informal settlement	a	No	Trained in STAR by School 1	2008-

Table III. *Themes, subthemes and categories of teachers promoting resilience in schools*

Theme	Subtheme	Category
Teachers use resources to promote resilience in schools	Teachers use systems of identification and referral to provide support to vulnerable children (and their families).	Systems of identification. Systems of referral.
	Teachers use health and social development services as resources to promote resilience in schools.	Teachers disseminate information on HIV&AIDS-related health issues. Teachers assist children and their families to access health and social development services. Teachers target nutrition as a priority health issue.
	Teacher-partnerships with children and families.	Teachers promote resilience in family-centred way.
	Teacher-partnerships with community volunteers.	Teachers, children and families partner in feeding schemes.
Teachers form partnerships to promote resilience in schools.	Teacher-partnerships with community organisations, businesses and government.	

Theme	Subtheme	Category
The use of school-based support to promote resilience in schools.	Making use of vegetable gardens.	Parents supplement household-provisions, cultivate gardens and become part of schools. Community members collect produce. Children receive food.
	Accessing health and emotional support.	Children, parents and families accessed health services. Parents and families used emotional support. Children accessed emotional and behavioural support.
	Using support to develop capacity.	Using available support connects parents to schools. Capacity development of parents. Learning support and extramural activities for children.

Table IV. *Teachers' psychosocial support functions as protective factor on multiple levels*

Level	Psychosocial Support	Evidence
Individual level	Manage well-being	Inclusive education strategies for identification and referral (HIV&AIDS school plan); networks of support.
	Address & support i.t.o. counselling & career guidance	Centres established with either teachers, counsellors, volunteers or professionals; networks.
	Respect dignity & constitutional rights	HIV&AIDS information & advocacy; increase in disclosure; increase in enrolment of HIV-vulnerable children.
Class room, playground and school environment	Demonstrate compassion & fairness	Support groups; characteristic of relationships [49].
	Direct in terms of human rights policy	Rights-based HIV&AIDS information & advocacy; access to citizen services – financial, health.
	Accept responsibility for & ensure safety	Fences; 'snake-patrol'; safe sexual choices.
Parents / caregivers	Communicate & discuss behaviour & progress	Parent evenings; support groups: disclosure identification, referral & support

Level	Psychosocial Support	Evidence
Societal level	Understand & react to social & educational challenges	Networks & partnerships for support; HIV&AIDS day; community soup kitchen; school-based community vegetable gardens; school-based counselling centres.
