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## Research report

# Help-seeking behaviour, barriers to care and experiences of care among persons with depression in Eastern Cape, South Africa



Lena M.C. Andersson<sup>a,\*</sup>, Isabell Schierenbeck<sup>b</sup>, Johanita Strumpher<sup>c</sup>, Gunilla Krantz<sup>a</sup>, Kegan Topper<sup>c</sup>, Gunilla Backman<sup>d</sup>, Esmeralda Ricks<sup>c</sup>, Dalena Van Rooyen<sup>e</sup>

<sup>a</sup> University of Gothenburg, Department of Public Health and Community Medicine, Social Medicine, Arvid Wallgrens backe 7, Floor 3, 40530 Gothenburg, Sweden

<sup>b</sup> School of Global Studies, University of Gothenburg, Sweden

<sup>c</sup> Department of Nursing Science, Nelson Mandela Metropolitan University, South Africa

<sup>d</sup> London School of Hygiene and Tropical Medicine, United Kingdom

<sup>e</sup> School of Clinical Care Sciences, Nelson Mandela Metropolitan University, South Africa

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#### ABSTRACT

*Background:* Little is known about the help-seeking behaviour and barriers to care among people with depression in poor resource settings in Sub-Saharan Africa.

*Methods:* This is a cross-sectional population-based study including 977 persons aged 18-40 living in the Eastern Cape Province in South Africa. The prevalence of depression was investigated with the help of a questionnaire (the Mini International Neuropsychiatric Interview). Several socio-economic variables, statements on help-seeking and perceptions of earlier mental health care were included. Data collection was performed from March to July 2012.

*Results*: The prevalence of depression was 31.4%. People aged 18-29 and those with no or low incomes were less likely to seek help. Promotive factors for help-seeking included having social support and tuberculosis comorbidity. Of all people with depression in this sample, 57% did not seek health care at all even though they felt they needed it. Of the variety of barriers identified, those of most significance were related to stigma, lack of knowledge of their own illness and its treatability as well as financial constraints.

*Limitation:* Recall bias may be present and the people identified with depression were asked if they ever felt so emotionally troubled that they felt they should seek help; however, we do not know if they had depression at the time they referred to.

*Conclusions:* Depression is highly prevalent among young adults in the Eastern Cape Province, South Africa; however, many do not seek help. Health planners should increase mental health literacy in the communities and improve the competence of the health staff.

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## 1. Introduction

Depression lowers quality of life, affects socio-economic prosperity, education and employment (Lund et al., 2010) and affective disorders are prevalent in 59% of suicides (Cavanagh et al., 2003), contributing to a substantial proportion of global morbidity and mortality(Bertolote and Fleischmann, 2002). Despite the pervasive effects of depression, little attention has been given to research and health planning in low and middle income countries (LMICs) which has resulted in a lack of detection, treatment and a shortage of trained staff (WHO, 2008a; Saxena et al., 2007; Saraceno et al., 2007). Since 2008, the World Health Organization (WHO) has increased its effort in addressing this unmet need (mhGAP) (WHO, 2008b), but the treatment gap is still large (WHA, 2012) and evidence-based studies on the availability of

and barriers to health care is scarce (Lancet, 2007; WHO, 2008b). This paper explores the help-seeking behavior and barriers to care among persons with depression living in the Eastern Cape, South Africa.

#### 1.1. The burden of depression and the unmet need

In the few population-based studies that have been published on depression in Sub-Saharan Africa (Nigeria, Ethiopia, Uganda and South Africa), prevalence rates vary greatly: lifetime prevalence 3.1–9.7% (Gureje et al., 2010; Herman et al., 2009; Kebede and Alem, 1999; Stein et al., 2008; Tomlinson et al., 2009), and current or 12-month prevalence 1.1–47% (Bolton et al., 2004; Gureje et al., 2010; Herman et al., 2009; Kebede and Alem, 1999; Mogga et al., 2006, Nyirenda et al., 2013; Ovuga et al., 2005; Rochat et al., 2011, Stein et al., 2008; Tomlinson et al., 2009). In the South African Stress and Health (SASH) study performed between 2003 and 2004, the lifetime prevalence of depression was 9.7% and the 12-month

<sup>\*</sup> Corresponding author. Tel.: +46 317866854; fax: +46 31162847. *E-mail address:* Lena.Andersson@socmed.gu.se (L.M.C. Andersson).

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prevalence was 4.9%. (Tomlinson et al., 2009; Herman et al., 2009; Stein et al., 2008) and only 8.2% of those with a lifetime prevalence of depression had consulted a psychiatrist during the last year (Tomlinson et al., 2009). In the Eastern Cape, the lifetime prevalence of mood disorders was 8.3% (Herman et al., 2009). Seedat et al. (2009) found in another SASH study by that only 6.6% of men 18.5% of women with a 12-months mood disorder and 16.6% of men and 20.6% of with any 12- months DSM-IV disorder had used any health care (general medical health care or mental health care) within the last 12 months.

### 1.2. Perceived barriers to health care

Earlier studies from Africa have identified reasons as to why people do not seek health care when they suffer from a mental illness such as not being able to identify that the illness is a treatable disorder and beliefs that they would recover without treatment (Trump and Hugo, 2006), not knowing where to go or feeling embarrassed (Seedat et al., 2002) and beliefs that the mental illness is a somatic illness (Okello and Neema, 2007). Stigma and misconceptions about the cause and severity of mental illness (Corrigan, 2004; Sartorius, 2007) are common barriers especially in poor resource settings where local culture and religion have a profound impact on people's lives (Crawford and Lipsedge, 2004; Ae-Ngibise et al., 2010). Crawford and Lipsedge (2004) highlighted that Zulu people in South Africa found Western medicine useful for treating physical illness, but not mental illness since many mental health problems were considered to be understood only by traditional healers from their own culture.

#### 1.3. Lack of treatment and the effects on population health

Lack of evidence-based treatment increases the individual's suffering, risk for poverty and social exclusion (Prince et al., 2007). Furthermore, if depression is not treated it may increase the spread of infectious diseases, such as HIV and sexually transmitted infections through risky behavior such as alcohol and substance abuse and unprotected sex (Khan et al., 2009). The prevalence rate of HIV/AIDS in South Africa is as high as 17.8% among adults aged 15-49 (UNAIDS, 2012) and untreated depression among such people may be a risk for low adherence to antiretroviral treatment (ART) (Nel and Kagee, 2011). A recent review study from Sub-Sahara Africa found that the likelihood of good adherence to ART was 55% lower among persons with depressive symptoms compared to persons with no sign of depression (Nakimuli-Mpungu et al., 2012). In the Eastern Cape Province in South Africa, the HIV prevalence in the general population was approximately 10% in 2011 (SANAC, 2011) and among pregnant mothers aged 15-49 years, 28.1% in 2009 (Department of Health, 2010). Untreated depression among mothers may also affect the child's health through a lack of caring ability, leading to infections and malnutrition which affects the child's physical and mental health and cognitive development (Avan et al., 2010; Rahman et al., 2002).

## 1.4. Health care for people with mental illness-A human right

Although the right to health (an abbreviation for the right to the enjoyment of the highest attainable standard of physical and mental health) is a self-standing human right found in numerous legally binding international and regional human rights treaties such as the International Covenant on Economic, Social and Cultural Rights (ICESCR), the UN Convention on the Rights of Persons with Disabilities (CRPD) and the regional treaty of the African Charter on Human and People's Rights (Banjul Charter), there are numerous instances where people with mental illness have not received treatment and in many cases have been neglected and maltreated (Drew et al., 2011). Furthermore, although the comorbidity of physical and mental illness is high, mental illness has received very little attention from health and human rights authorities, especially in LMICs (Prince et al., 2007). South Africa is signatory to ICESCR and has ratified CRPD and the regional African treaty. Thus, South Africa has legally committed itself to respect, protect and fulfill this right and ensure that all South Africans, including people with mental illness, are able to realize this right to health. In order to fulfill this right evidencebased studies are needed to provide information on how the population with mental illness experiences their right to health. According to our knowledge, it has not previously been investigated as to how the population in the Eastern Cape Province, the poorest of the nine provinces in South Africa, experiences these issues. Therefore, we investigate among persons with depression, the prevalence, their help-seeking behavior, their barriers to mental health care and their experiences of previous health care visits; factors all related to the right to health.

## 2. Methods

#### 2.1. Population and setting

This is a cross-sectional study performed in the Eastern Cape Province in South Africa. Included in this study are 977 men (52%) and women (48%) aged 18–40 years old. The age group was chosen since the onset of mental illness is generally during adolescence and young adulthood and has a profound impact on health and socio-economic prosperity if not treated (Patel et al., 2007). The study was performed in the Nelson Mandela Bay Metropolitan Municipality of the Port Elizabeth area (1005,780 inhabitants) and the Kirkwood area in the Cacadu District Municipality (412,000 inhabitants) in order to make urban and rural comparisons. Data collection ended July 2012 when the time limit was reached.

#### 2.2. Sampling

A randomized sample of 1000 individuals was selected for this study. A sample size calculation with assumed life time prevalence of psychiatric disorders at 20% among unexposed, alpha value of 0.05 and power of 0.80 to detect an increase of 10 percent units in the exposed group resulted in a required sample size of 630 with equal number of unexposed-exposed. An additional 370 individuals were included to permit gender stratified analyses. A multi-staged sampling process was conducted as follows: Stage 1: Selection of *EAs*: For the purposes of the national census, the country has been divided into enumerator areas (EAs), each EA containing approximately 500 people. Port Elizabeth consists 1196 EAs and Kirkwood has a total of 13 EAs. These EAs were used as the basis for the sampling. EAs were randomly selected from Port Elizabeth and Kirkwood and based on regional distribution (urban, semi-urban and semi-rural) and race (Black, White and Coloured) to ensure a representative sample of the South African population. Randomisation of EAs was done by a professional statistical firm, using Hawth's Analysis Tools for ArcGIS (SpatialEcology, 2013) together with the support of population statistics estimates (Stats South Africa, 2011). The 1196 EAs were divided into three large racially dominant geographic areas and the 80 EAs selected resulted in a representative distribution of the demographic race profile of South Africa. In the Port Elizabeth area, 80% of the EAs were randomly selected from Black residential areas, 10% from White residential areas and 10% from Colored residential areas. Random sampling of the EAs in the Kirkwood area was unnecessary as there are only 13 EAs. In the Kirkwood area 20% of the sample was drawn from the urban area (the majority of which are White) and 80% was drawn from the

semi-rural area (the majority of which are Coloured and Black people) so as to avoid a skewed sample.

*Stage 2: Selection of households:* Ten households were randomly selected per EA using the Hawth's Analysis Tools for ArcGIS to make up a sample of 800 individuals for the Port Elizabeth area. As Kirkwood only had 13 EAs additional households were randomly selected across the EAs in order to generate a sample of 200 individuals. Detailed colored maps, designed by the statistical firm, clearly marked all randomly selected households for each of the 93 EAs and assisted field workers in locating the households.

Stage 3: Selection of participants: In each household the Kish method was used to randomly select participants (Kish, 1949). This was achieved by first conducting a 5 min interview with any one individual in the household. The interviewee provided biographical data concerning only those members of the household that were between the ages of 18 and 40 years. Data included each member's relation to the head of the home, their sex and age. Each individual was then assigned an ordinal number (first males were assigned a number in decreasing age and then the females). Data was captured in the Kish table. The total number of adults in the table was then matched to the corresponding number in the random table for inclusion in the research sample. Five different random tables were used to increase the randomization of selected participants. If no individual was available or willing to participate the interviewer would strictly follow five alternate and successive options. First, they would go to the neighboring household on the left, then to the right, the household directly across from the original household, then the neighboring household on the left and finally to the right.

#### 2.3. Training of field workers and data collection

Twenty-two fieldworkers, all Honours students in either psychology or social work, were recruited to collect data. Field workers were trained by the principal investigator on how to administer the barriers to care questionnaire and by a counseling psychologist (the field manager) on how to administer the Mini international neuropsychiatric interview (M.I.N.I) questionnaire during a two day session. Questionnaires were scrutinized throughout the data collection process in order to ensure quality control. Data collection was performed between March and July 2012. Data was collected by doing semi-structured face-to-face interviews which were performed in the participants' language of choice, that being Xhosa, Afrikaans or English. The field worker introduced the study to the randomly selected participant by means of an introductory letter. Once the participant had been fully informed about the study and provided their willingness to participate, a consent form was signed by the participant. The interview was performed in a private location as preferred by the participant. First the barrier to care questionnaire was administered to each participant and followed by MINI. Each interview took approximately 30-40 min. Fifty individuals declined to participate in the interview either at first or during the interview due to the following reasons: stigma (fear of being discriminated against by family and /or members of the community, especially when words like "mental illness" or "mental health study" were used when introducing the participant to the study), suspiciousness (apprehensive to trust the interviewer's motives, as some areas experience high crime rates), illiteracy (poor comprehension of questions), lack of confidentiality (family members did not allow the interview to be performed in privacy), emotional distress (participants ended the interview due to experiencing emotional distress in response to some questions) and time (participants were unable to participate or complete the interview due to time constrains).

#### 2.4. Measurements

The need for health care due to mental illness was a dependent variable in the logistic regression analyses and investigated by the question: "Have you ever felt so emotionally troubled that you felt a need to seek help?" The respondent had a choice of either a "No" or "Yes". If the respondent answered "Yes", a following question was asked: "Did you seek care from any health care staff when you felt emotionally troubled?" These two questions were combined into a single variable, called "Seeking health care when feeling emotionally troubled" which was used as the dependent variable in the analyses.

#### 2.4.1. The mini international neuropsychiatric interview (DSM-IV)

Independent variable in the logistic regression analyses was Depression. The mini international neuropsychiatric interview (DSM-IV) schedule, version 6.0.0 (Sheehan et al., 1998), was used to identify depression. The MINI was designed as a brief structured interview for diagnosing the major Axis I psychiatric disorders in DSM-IV and International Classification of Diseases-10. Validation studies show that the MINI has similar validity and reliability properties as the WHO-Composite International Diagnostic Interview instrument (CIDI) instrument (Lecrubier et al., 1997), but takes less time to perform and can be used by trained lay interviewers. The MINI highlights nine symptomatic areas of depression and when five symptoms are met a diagnosis is fulfilled. Once an individual has met the criteria for depression a further enquiry follows concerning the time frames, this being current, past and/or recurrent. In this study, we report on all three episodes (any episode) here referred to as lifetime prevalence. The MINI was translated and back translated into Afrikaans and Xhosa by a language translator. The MINI was reproduced with the permission of copyright holder, © Copyright 1994-2010 Sheenan DV & Lecrubier Y.

## 2.4.2. The barriers to care and right to health questionnaire

An extensive barriers to care and the right to health questionnaire with 61 multiple choice questions was developed based on questions from previous studies as well as new questions constructed to meet the aim of this study. Demographic and socioeconomic questions, questions on social support, well-being (Bech et al., 1996) self-rated physical and mental health was included. Questions concerned health care use and barriers to care were constructed based on several previous studies (Prins et al., 2011; Meadows et al., 2000; Meltzer et al., 2003; Fortney et al., 1999; Issakidis and Andrews, 2002; Bebbington et al., 2000; Kessler et al., 1994; Kessler and Ustun, 2008). Right to health questions were constructed based on the CESCR General Comment No. 14: The Right to the Highest Attainable Standard of Health (Art. 12) (UN, 2000). In this present study the following variables were included as predictor variables: age, race, marital status, education, employment, personal source of income, number of people in the household, weekly household income, self-rated physical illness, self-rated mental health, experienced barriers to care, social support, and opinions about health care: availability, accessibility, acceptability, quality, information, participation and experiences of discrimination. Translation and back translation of the questionnaire was also done from English to Xhosa and English to Afrikaans by language translators. A pilot study was conducted that revealed some inconsistencies, such as linguistic ambiguities and a need for change the order of the questions.

#### 2.5. Statistical analyses

Statistical software used was SAS 9.3 and SPSS 19. All analyses were stratified according to sex except in the logistic regression analyses where sex, due to power reasons, was controlled for. Frequencies, presented as numbers and percentages, were calculated. Chi<sup>2</sup> test was done to analyze statistically significant differences between the sexes and subgroups. A *p*-value of 0.05 was chosen as the level for statistical significance. The variables "employment" and "personal source of income" were highly correlated, thus "employment" was excluded. Logistic regression models (95% CI) were used in order to investigate associations between depression (independent variable) and seeking health care when feeling emotionally troubled (dependent variable) and the effect of predictor variables. The logistic regression modeled the effect of the predictors on the probability of answering "Yes"—"I did seek health care when feeling emotionally troubled": thus, a odds ratio > 1 implied that the proportion of individuals seeking help tended to increase with increasing levels of the predictor, and an odds ratio < 1 implied that increasing levels of the predictor was an obstacle for help seeking. The low sample size limited the numbers of variables that could be simultaneously entered in the multivariate model. A maximum of six variables was entered in the final model, all with a univariate *p*-value no larger than 0.10 See Table 3 for information of the variables and the subgroups in the final analysis.

## 2.6. Ethical approval

The study was approved by the Nelson Mandela Metropolitan University Research Ethics Committee (Human), Port Elizabeth, H10-HEA-NUR-002. The study received permission to be conducted from the District Manager of the Cacadu Health District, Province of Eastern Cape Health and the Nelson Mandela Bay Health District. The principles of justice, beneficence and privacy were adhered to throughout the study. The sampling method utilized ensured a fair selection of participants. Fieldworkers fully informed participants of the sensitive nature of the questionnaires and reminded of their right to discontinue the interview at any stage. Participants were provided with a comprehensive list of referral sources in the event that they became emotionally and/or psychologically distressed in response to the study.

## 3. Results

## 3.1. Prevalence of depression and socio-economic characteristics

A total of 977 individuals participated in the study, 510 (52%) men and 467(48%) women. Socio-demographic, economic and health related factors are presented in Table 1. The final sample consisted of 85% participants from the urban/semi urban area and 15% from the rural area. A total of 307 persons (31.4%) fulfilled the criteria for a lifetime depression; 152 men (29.8%) and 155 women (33.2%) Current depression was found among 149 (15.2%) persons, 74 men (14.7%) and 75 women (16.1%) (Table 2). Statistically significant differences in the distribution of lifetime depression were found concerning age, race, personal source of income, weekly household income, having a friend or family assisting when ill, having tuberculosis and HIV. There was no statistically significant differences in the prevalence of lifetime depression between persons living in the urban/semi-urban area and the rural/ semi-rural area (men: 29.8% versus 29.8%, p-value 0.997, women: 34.3% versus 28.4%, p-value=0.290). Test of interaction of sex and location (p-value 0.495) suggested that the difference in depression between the two locations was the same for both men and women.

#### 3.2. Help-seeking behavior among people with lifetime depression

Out of all 307 persons that fulfilled the diagnosis of lifetime prevalence for depression, 292 (95.1%) also stated that they at one time felt so emotionally troubled that they felt a need to seek help.

Ta	bl	e	1

Description of the participants.

	Men		Women		Tota	l
	N	%	N	%	N	%
Sex	510	52	467	48	977	100
Place of living						
Port Elizabeth urban/semi-urban area	453	89	379	81	832	85
Kirkwood rural/semi-rural area	57	11	88	19	145	15
Age						
30–40	148	29	198	42	346	35
18–29	362	71	269	58	631	65
Race						
Black	447	88	374	80	821	84
Colored	38	8	48	10	86	9
White	20	4	39	8	59	6
Asian	4	0.8	5	1	9	0.9
Don't want to respond	1	0.2	1	0.2	2	0.2
Marital status				~ ~		
Married/cohabiting	52	10	106	23	158	16
Widowed	6	1	9	2	15	2
Separated/Divorced	6	I	11	2	1/	2
Single	387	/6	261	56	648	66
Never married	59	12	80	17	139	14
Highest education	40	0	50		00	10
Completed tertiary education	46	9	53	11	99	10
Completed high school	257	50	222	48	4/9	49
Completed primary school	194	38	166	36	360	3/
Not completed primary schooling	11	2	23	5	34	3.5
	2	0.4	3	0.6	5	0.5
Employment status	07	17	75	10	100	17
Dert time ampleurd	87	17	/5	10	102	1/
Salf amplayed	45	9	10	13	105	11
Seni-employed	22	4	18	4	40	4
Linomployed	40 210	9 61	27	62	73 507	61
Weekly household income	510	01	207	02	597	01
	22	7	27	6	60	6
2001 4000	12	2	12	2	26	2
2001 2000	24	5	10	5	20 52	5
1001 2000	40	0	20 /1	0	01	0
501 1000	7/	15	62	13	136	1/
1–500 Rand	133	26	121	26	254	26
None	101	20	97	21	198	20
Don't want to disclose	92	18	78	17	170	17
Personal source of income	52	10	70	.,	170	17
Salary (monthly payment)	107	21	91	20	198	20
Wage (weekly navment)	85	17	63	14	148	15
Child support grant	15	3	112	24	127	13
Disability grant	16	3	18	4	34	3.5
Child maintenance	3	0.6	7	2	10	1
Foster care grant	0	0	5	1	5	0.5
None	243	48	143	31	386	40
Don't want to disclose	41	8	28	6	69	7
Number of people in the household						-
1	27	5	12	3	39	4
2	64	13	45	10	109	11
3–5	301	59	268	58	569	58
6–16	118	23	141	30	259	27

Among this 95.1%, 93.4% were males and 96.8% were females. Thus, fifteen persons (4.9%) of those with a lifetime prevalence of depression had not experienced the need to seek help, of which 6.6% were males and 3.2% were females.

There were no geographical differences in the rates of perceived need to seek help for emotional troubles between individuals with depression living in the urban/semi-urban area and individuals living in the rural/semi-rural area (95.5% versus 92.9% stated yes to having experienced such a need, *p*-0.465). Rates for men showed borderline statistical significance (94.8% versus 82.4%, *p*-0.051), while no differences was seen between women (96.2% versus 100%, (*p*-0.319). Nor were there any geographical differences concerning individuals decision to actually seek help or

#### Table 2

Description of demographic and socioeconomic factors among persons with depression in comparison to the total cohort.

	Men N=510			Women <i>N</i> =467	1		Total N=977			
	N	%	Chi <sup>2</sup>	N	%	Chi <sup>2</sup>	N	%	Chi2	
Prevalence of depression										
Lifetime	152	29.8		155	33.2		307	31.4	0.255	
Current	74	14.7		75	16.1		149	15.2		
Age										
30–40	62	41.9		74	37.4		136	39.3		
18–29	90	24.9	0.000	81	30.1	0.099	171	27.1	0.000	
Race										
Black	140	31.3		129	34.5		269	32.8		
Colored	9	23.7		10	20.8		19	22.1		
White	3	15.0	0.199	16	41.0	0.100	19	32.2	0.056	
Marital status										
Married or cohabiting	15	28.8		31	29.2		46	29.1		
Widowed, separated, singles	137	29.9	0.873	124	34.3	0.326	261	31.9	0.495	
Education										
Completed university/college	16	34.8		13	24.5		29	29.3		
Completed high school	67	26.1		70	31.5		137	28.6		
Completed primary school	64	33.0		61	36.7		125	34.7		
No schooling+not completed primary school	5	38.5	0.300	11	42.3	0.262	16	41.0	0.141	
Employment										
Employed, full time, part time	61	30.5		61	33.9		122	32.1		
Unemployed	91	29.4	0.782	94	32.8	0.799	185	31.0	0.714	
Personal source of income										
Salary (monthly payment)	28	26.2		26	28.6		54	27.3		
Wage (weekly payment)	29	34.1		29	46.0		58	39.2		
Child support grant	9	60.0		41	36.6		50	39.4		
Disability grant	9	56.3		9	50.0		18	52.9		
Child maintenance	1	33.3		3	42.9		4	40.0		
None	70	28.8		39	27.3		109	28.2		
Don't want to disclose	6	14.6	0.001	8	28.6	0.056	14	20.3	0.001	
Weekly household income	-			_						
> 4000	8	24.2		9	33.3		17	28.3		
3001-4000	3	23.1		5	38.5		8	30.8		
2001-3000	8	33.3		10	35.7		18	34.6		
1001-2000	12	30.0		16	39.0		28	34.6		
501-1000	27	36.5		22	35.5		49	36.0		
I-500 Rand	47	35.3		59	48.8		106	41.7		
None	30	29.7	0 10 4	17	17.5	0.000	47	23.7	0.000	
Don't want to disclose	17	18.5	0.184	17	21.8	0.000	34	20.0	0.000	
Number of people living in the nouse	22	26.2		10	21.6		E1	24 E		
1-2	33	30.3		102	31.0		31 197	34.5		
5-5	24	20.2	0 220	102	24.9	0.025	167	52.9 26.6	0.140	
0-10 Have family that will assist when ill	54	0.0	0.529	55	24.0	0.025	69	20.0	0.140	
	03	247		86	25.6		170	25.1		
Often	30	/8.8		52	591		01	54.2		
Sometimes	13	30.2		12	32.4		25	31.2		
Never	15	70.0	0.000	5	833	0.000	12	75.0	0.000	
Have a friend that will assist when ill	/	70.0	0.000	5	05.5	0.000	12	75.0	0.000	
	41	25.0		44	25.3		85	25.1		
Often	27	23.0		24	23.5 /1 /		51	36.7		
Sometimes	51	30.7		24 54	40.0		105	34.9		
Never	33	33.3	0 300	33	33.0	0.023	66	33.2	0.019	
Physical health problems –TB	55	55.5	0.555	55	55.0	0.025	00	55.2	0.015	
No	139	29.2		131	31.3		270	30.2		
Yes	7	50.0		19	57.6		26	55.3		
Don't know	, 6	31.6		4	30.8		10	31 3		
No answer	0	0	0 352	- 1	33.3	0.023	1	25.0	0.004	
Physical health problems- HIV/AIDS	0	3	0.002	1	23.5	5.525	1	20.0	5.00 f	
No	121	27.3		113	30.3		234	28.7		
Yes	9	56.3		14	41.2		23	46.0		
Don't know	21	44.7		23	46.0		44	45.4		
No answer	1	25.0	0.008	5	50.0	0.061	6	42.9	0.001	
	•	_5.0		5	2 3.0		\$	-2.0	5.001	

\*p-value 0.05 is considered statistically significant.

<sup>a</sup> Percentage within the variable No/Yes. Only Yes is presented in the table.

not (57.3% of individuals living in the urban/semi-urban area and 53.8% of the individuals living in the rural/semi-rural area decided not to seek help (*p*-0.684). No gender differences emerged (men 61.7% versus 57.1% (*p*-0.739), women 52.8% versus 52.0%, *p*-0.942).

In the unadjusted logistic regression analysis associations between the decision to seek health care and socio-economic and demographic factors were investigated. Age, personal source of income, having tuberculosis, having HIV/AIDS and social

#### Table 3

Adjusted odds ratios from multivariable logistic regression model (95% CI). Associations between help-seeking behavior and predictor variables among individuals with depression (An OR above 1 implies higher likelihood to seek help (*n*=292)<sup>a</sup>.

Predictor	OR	95% CI	p-value*
Sex			
Men	1.00		
Women	1.25	0.74-2.10	0.399
Age groups			
30–40	1.00		
18–29	0.49	0.28-0.82	0.008
Employment			
Employed, full time, part time	1.00		
Unemployed	0.61	0.21-1.75	0.360
Personal source of income			
Salary or wage	1.00		
Grants (Child-, disability-, child maintain-, foster care-), none, don't want to disclose	0.59	0.20-1.69	0.321
Suffering from TB			
No, don't know, uncertain	1.00		
Yes	5.16	1.72–15.47	0.003
Suffering from HIV/AIDS			
No, don't know, uncertain	1.00		
Yes	2.75	0.90-8.34	0.074
Having social support when ill			
No	1.00		
Yes	1.63	1.13–2.34	0.008

<sup>a</sup> Number of individuals with depression is 307, 126 did seek help, 166 did not seek help and 15 did not answer question about help seeking.

\* *p*-value 0.05 is considered statistically significant.

#### Table 4

Reasons to why persons with depression choose not to seek health care when they felt emotionally troubled (n=166).

	MEN <i>n</i> =87		Rank	WOME	WOMEN n=79		Chi <sup>2*</sup>
	Ν	%		Ν	%		
Structural factors							
It is too far away to get there	22	25	11	27	34	8	0.210
There was no transport available	19	22	12	17	22	15	0.960
I could not afford to pay the transport costs	25	29	8	24	30	11	0.817
The waiting time at the clinic was too long	34	39	5	38	48	4	0.242
Knowledge and attitudes							
I do not know where to go for treatment	24	28	9	26	33	9	0.455
I did not believe that treatment could help me	25	29	8	26	33	9	0.560
I thought that the problem would disappear by itself	67	77	2	45	57	3	0.006
I am afraid of the consequences of seeking care (treatment, tests, hospitalisation)	28	32	7	20	25	12	0.330
I do not want any help	24	28	9	13	17	16	0.085
I got help from another source	58	67	3	60	76	1	0.188
I do not believe that I would get proper treatment	25	29	8	24	30	11	0.817
I thought I was the only one with that kind of problem	23	26	10	18	23	13	0.586
Psychosocial factors							
I thought my problem was one I should be able to cope with	72	83	1	55	70	2	0.046
I am too embarrassed to discuss my problems with anyone	33	38	6	33	42	5	0.614
I am afraid that somebody I know would see me at the health care clinic	24	28	9	24	30	11	0.692
I am ashamed to show others that I felt so emotionally troubled	40	46	4	29	37	7	0.226
I did not trust that the health care staff would keep my problem confidential	33	38	6	30	38	6	0.210

\* p-value 0.05 is considered statistically significant.

support were all statistically significant when associated with help-seeking. In the multi-variable binary regression analysis (Table 3), only age (younger persons were less likely to seek help compared to older persons, OR 0.49; 0.28–0.82) remained statistically significant, together with comorbid physical illness - persons suffering from tuberculosis (TB) were more likely to seek care compared to those without (OR 5.16; 1.72–15.47). Also, persons with social support were more likely to seek health care compared to persons lacking such support (OR 1.63; 1.13–2.34). All tests of interaction between sex and all other predictors were nonsignificant. However, the strongest evidence of sex interaction was found for age: in younger persons the proportion of help seekers was about equal for men and women, but among older persons, more women than men tended to seek help, and in both

men and women, older persons were more likely to seek help than younger persons. In the model including all predictors and interaction, sex  $\times$  age group, the age difference was significant for women but not for men. In general, tests of interaction have lower statistical power than tests of main effects, so the lack of clear evidence of sex interaction in our data, is probably more due to lack of power than sex homogeneity in effect of the other predictors.

# 3.3. Where to go for help and barriers to care among persons with depression

Of the 307 individuals with a lifetime depression, 292 (95%) answered "Yes" to the question if they ever felt so emotionally

Satisfaction with previous visits to health clinics and health care staff among individuals with depression (n=126).

	Men		Women				
How satisfied were you:	Very satisfied/ satisfied N (%)	Dissatisfied/very dissatisfied N (%)	Total	Very satisfied/ satisfied N (%)	Dissatisfied/very dissatisfied N (%)	Total	
When you went for care for emotional troubles at the health care services? That the staff at the health care services listened and answered you when you had guestions about the medicines you got?	51 (93) 48 (91)	4 (7) 5 (9)	55 53	62 (87) 61 (90)	9 (13) 7 (10)	71 68	126 121
That the health care services staff informed you about the treatment you were to receive?	49 (89)	6 (11)	55	62 (89)	8 (11)	70	125
With the chance of participating in discussing which treatment you were to receive?	46 (85)	8 (15)	54	59 (86)	10 (15)	69	123
If you have been referred to different clinics for your emotional problems, how satisfied were you with the referrals?	21 (81)	5 (19)	26	36 (95)	2 (5)	38	64

troubled that they felt a need to seek help (men 93% and women 97%). Of those, 265 (91%) sought help from relatives and trusted people in the community (men 87% and women 94%). To talk to a parent was the first choice for both sexes; second choice for men was to talk to a relative, while women preferred to talk to a friend; and third choice for both was to talk to a community health worker. Of these 307 individuals with depression, a total of 126 (43%) persons did seek help from health care staff (men 38% and women 47%). The first person to contact was a nurse, second, a general medical doctor and third, a social worker-the same for both sexes. Consequently, the majority, 166 individuals (57%) did not seek health care (men 61% and women 53%). In Table 4 the reasons for not seeking health care is presented. The five most common barriers were; "I thought my problem was one I should be able to cope with", "I thought that the problem should disappear by itself", " I got help from another source", " The waiting times at the clinic was too long" and "I am too embarrassed to discuss my problem with anyone".

#### 3.4. Perceived satisfaction with previous visits to health care clinics

Of the 307 individuals with a lifetime depression 126 individuals (41%) reported that they had experiences of earlier visits to health clinics when they had emotional troubles (Table 5). Approximately 80-90% was very satisfied/satisfied with how the staff had responded to their questions about medicines, and with the information they received, discussions about the treatment and the referrals. Consequently, the proportion of individuals that were very dissatisfied/dissatisfied ranged between 10 and 19%. The most dissatisfied individuals were men concerning referrals (19%). Of the 126 individuals, 12% had experienced negative attitudes from health care staff when they said that they suffered from emotional troubles (13% among men and 11% among women). The reasons were: "The approach was cold", "Judgmental attitude towards illness and appearance", "Not adequately assisted, prolonged waiting time", "Refused to listen, imposed their own views", "Lack empathy or compassion", "Long waiting time", "No treatment during holiday", "Rude", "Social worker was rude and seemed not to care". A total of 40 (13%) individuals with depression - 21 men (38%) and 19 women (27%) - had visited a traditional healer when they felt emotionally troubled and 76% of the men and 85% of the women stated they were very satisfied/satisfied with this treatment.

## 4. Discussion

#### 4.1. High rates of depression-possible explanations

In this study we found a higher prevalence of depression than in several previous African studies (Tomlinson et al., 2009; Gureje et al., 2010; Herman et al., 2009; Kebede and Alem, 1999; Stein et al., 2008). A third (31.4%) of the population had experienced depression sometime during their life. One explanation for the higher rates could be that the majority of the population in this study derives from poor areas in the Eastern Cape where people are exposed to high levels of poverty and economic distress. It could also suggest that currently South Africa is more affected by social unrest inevitably having a negative effect on mental health. compared to earlier studies. A recent study on employed people in South Africa found prevalence for depression of 18.3%. However, an additional 16% stated that they were unsure if they had depression or not (Welthagen and Els, 2012). The majority of our sample was unemployed which may have an additional negative effect on their mental health. The high rates of depression is alarming since the population is relatively young and mental illness in younger ages may increase the risk of social and economic exclusion via school dropout and later unemployment (Lund et al., 2010; Patel et al., 2007). Our rates might also be explained by exposure to trauma since many of our respondents lived in townships and shack areas where violence and criminality is high (Lockhata and van Niekerka, 2000). Lastly, the high prevalence rate of HIV/AIDS in South Africa may have a detrimental effect on the population's mental health since families; children and friends are burdened by worries, despair and death of loved ones.

#### 4.2. Differences in the distribution of depression

There were no sex differences in the prevalence of depression between men and women in this population. Among men, older men suffered more with depression than younger men, while no age effect was seen among women. Men with HIV/AIDS presented high prevalence of depression. And men that answered that they did not know if they had HIV/AIDS also had a high prevalence of depression which could indicate a low validity in the answer due to the stigma HIV is attached with. The distribution of depression was higher among both men and women receiving child and disability grants, which could be explained by poverty and the responsibility associated with having children. In relation to weekly household income, women having 1–500 had the highest rates of depression although rates were high across all income groups, lowest among those that did not want to disclose or stated none. Among individuals with a lack of social support depression rates were very high. However, interestingly, high depression rates were found among women that often had family of friends assisting them when ill. This is possibly due to these individuals been sick for a long period of time, but not receiving the adequate treatment and thus requiring help from family and friends. Among both men and women with TB the prevalence of depression was very high. TB is a disease that is attached with a lot of stigma, embarrassment and misbeliefs (Abebe et al., 2010) which creates a double burden to bear. Among women high prevalence of depression was also found among those that did not what to answer if they had TB, which could support this explanation.

#### 4.3. Where help was sought and barrier to care

Men in the rural/semi-rural area experienced less perceived need for help when feeling emotionally troubled compared to men in urban/semi-urban area, but no such differences was seen among women. No geographical differences emerged at all concerning persons actual decision to seek help. This could be explained by the areas included, where both geographical areas consisted both of densely populated areas as well as semi-rural, so clear urban/rural differences was not possible to detect. The other explanation could be that the populations are very similar and factors affecting access to care is similar in this region. When individuals seek help, they were most likely to seek help from family and friends which is expected since many mild mental health problems disappear on their own, being neither severe nor prolonged (Robins and Reiger, 1991). However, prolonged mental illness, particularly among young people, may be a gateway to substance abuse and deteriorating health and therefore early detection by health care staff is important (Patel et al., 2007). We found no sex differences in terms of which health professional working in the health systems individuals preferred to seek help from first. First choice was a nurse, second a general practitioner (GP) and third a social worker. Over half of the individuals with depression did not seek professional health care at all. They were more likely to be younger and have low or no income. In a study conducted in the United Kingdom (UK), Biddle et al. (2007) found that young people took longer to seek health care for emotional problems as compared to the threshold defined by clinicians. The illness was negotiated and re-negotiated in order to understand and accept whether the illness was "normal" or "real" and to actually seek treatment would make the illness "real". This may also explain young adults' reluctance to seek help in our study, especially since many expressed barriers relating to stigma, in particular the men. Social support from friends and family on the other hand, promoted help-seeking behavior which has also been found in other studies concerning mental illness. Rickwood et al. (2005) found that being aware of the problem, to express symptoms and a need for support, to identify sources of help, having social support and being willing to seek and disclose the problem were promotive factors for help seeking. We found that having a comorbid illness of TB increased the likelihood of seeking help for emotional problems. It is possible that these individuals already had a contact with professional health care staff which facilitates care for mental illness, but it could also be that anxiety due to the TB enhances urgent help seeking. Overall, the proportion of individuals that did seek help was higher when compared to an earlier South African study by Seedat et al. (2009), where only 6.6% of men and 18.5% of women with a mood disorder had used any health care during the last 12 months. However, in this study we measured lifetime prevalence of both depression and help-seeking behavior which may explain our higher rates. The most common reasons for not seeking health care were related to a desire to cope on their own without involving the support of the health care staff and instead find help from other actors which was also found in a previous South African study (Trump and Hugo, 2006). Also, barriers relating to accessibility and affordability were expressed by many participants. These included long waiting times at the health clinic which was a barrier to care also in another recent study from South Africa (Ricks et al., 2012). Additionally, approximately 40% of participants expressed barriers related to stigma. The only barriers that showed a statistically significant difference between the sexes was "I thought my problem was one I should be able to cope with" and "I thought that the problem would disappear by itself". This may indicate little insight regarding the nature of depression, the potential benefits of treatment and consultation and as a result, suggests low mental health literacy in this population.

## 4.4. Perceptions of previous visits to health clinics

Forty per cent of the respondents with depression had visited health care clinics previously due to emotional problems and the majority had positive experiences, both regarding information about the treatment they received, and the treatment planning and staff's attitude. About 10-15% were not satisfied. However, more than half of the individuals with depression did not seek help, and barriers such as "I did not trust that the health care staff would keep my problem confidential" were present among more than a third of the individuals with depression. Thus, the right to health features such as non-discrimination and confidentiality may still be lacking in some instances in the health care system in South Africa. Traditional healers were used by 13% of our participants with depression, and most were satisfied with the treatment. Our findings are similar to the ones in a previous South African study where 9% of individuals with common mental disorders used traditional healers (Sorsdahl et al., 2009) and 17% of individuals with mood disorders used alternative medicine in a Nigerian study (Gureje and Lasebikan, 2006).

## 4.5. Strengths and limitations

This randomized population study has used validated statistical sampling methods, a validated instrument to measure depression and trained culturally sensitive interviewers with good language and interpersonal skills to ensure high validity and reliability in data collection. One weakness with our study is that the people identified with lifetime prevalence of depression were asked if they ever felt so emotionally troubled that they felt the need to seek help. However, we do not know if they had depression when they referred to this particular question. Nevertheless, given the fact that depression is often recurrent and persistent, it is likely that many of the respondents had depression when they referred to this question. Interviewer bias could be present and to some extent explain our high rates of depression although extensive training of field workers was done though out the study. Recall bias may also be present concerning the question on help seeking and experienced barriers to care. The cross-sectional design implies that no cause-relationship can be drawn.

#### 5. Conclusions

Our study showed that depression is highly prevalent among individuals aged 18–40 in the Eastern Cape Province, South Africa and that 57% of the individuals in this study did not seek health care. To improve this situation and to fulfill the right to health, health planners should aim to increase the availability of health care and improve mental health literacy in the communities. Special interventions could also be aimed at improving the professionalism and competence of the health staff, although the majority of individuals that had utilized health care services were satisfied. However, some were not satisfied and half of those with depression did not access services. South Africa has signed and ratified several declarations that ensure people the right to health and more can be done in order to fulfill this obligation for the vulnerable group of the population.

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#### **Conflict of interest**

None of the authors have any conflicts of interests.

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