MANAGING MENTAL ILLNESS IN PRIMARY CARE: GENERAL PRACTITIONERS' PERSPECTIVE

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ABSTRACT

The Agency for Integrated Care (AIC) conducted a survey to determine the specific areas in which the agency could work with General Practitioners (GPs) to enhance mental illness management in Singapore. This survey was conducted as part of AIC's engagement strategy and because the Primary Care Surveys 2010 and 2005 noted that a sizeable number of mental health cases are seen by GPs. Face-to-face interviews were conducted among a random sample of 849 group and non-group GPs. The GPs practise in four geographical districts in Singapore. 500 responses were obtained. 70% of the respondent GPs indicated that they were seeing patients with mental illness. Anxiety and depression were the most commonly seen mental conditions. The lack of available drugs and facilities in the clinic, and unfamiliarity with mental health patient management were the main reasons that GPs do not see patients with mental illness. 39% of the GPs referred patients to a psychologist. 36% of the GPs referred patients to a counsellor. Availability of additional allied health services in the neighbourhood was crucial in encouraging GPs to see more patients with mental illness. General geriatrics, dementia, general mental health and major depression were the areas of interest for further training.

Keywords: General practice, GP, Mental illness, Primary care, Agency for Integrated Care, Allied health, General practitioner training, Mental health

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INTRODUCTION

Private General Practitioners (GPs), typically a family doctor in private practice, comprise an important segment of the primary healthcare personnel which caters to more than four-fifths of all primary healthcare in Singapore.[1] The Primary Care Survey 2005 reported that the market share by major depression for public polyclinics and private GPs is 8% and 92% respectively.[2] Today, as compared to government-funded polyclinics, private GPs treat a sizable share of the patient population with depression, dementia and chronic illnesses (85%, 55% and 55% respectively)[2,3]

The Singapore Mental Health Study conducted in 2010 found that the prevalence of at least one affective, anxiety or alcohol use disorder in a person's lifetime was 12.1%.[4] However, only 22.1% of all people with mental illness had consulted a psychiatrist in their lifetime. There was also an association between mental illness and chronic physical illness. A total of 14.3% of those with a chronic physical illness also had a mental illness. Among those with mental illness, 50.6% had a chronic physical illness.[3]

Keeping people with mental illness deinstitutionalised and treating them within the community has shown evidence of improved clinical outcomes and service utilisation due to increased service availability and accessibility, and reduced stigma of service use.[5,6] In Singapore, the majority of people with a mental illness in their lifetime had seen a professional caregiver in the community – a counsellor, a GP or a religious/spiritual healer.[3]

There are two medical courses aimed at providing professional mental health training to the primary care doctor – the Family Medicine Modular Course found in the MMed (Family Medicine) that started in 1993 and in the Graduate Diploma in Family Medicine (GDFM) that started in 2000, and the Graduate Diploma in Mental Health (GDMH) programme that was launched in 2010. As of June 2011, however, only a limited number of GPs have undergone these training (321 and 492 primary care doctors have passed the modular courses in the MMed, and in the GDFM[7] respectively; 19 have passed the GDMH programme[8].

A GP Partnership Programme was set up by the Singapore Institute of Mental Health in 2003 with the aim of engaging GPs in the management of stable psychiatric patients in Singapore. Although this programme has successfully partnered more than 50 GPs and referred more than 1000 patients to GPs to date, these figures are small in comparison with the population of GPs and people with mental illness in the community. While the findings of two satisfaction surveys, each conducted with 40 participating GPs and 622 patients of the programme respectively, have called for more attention to be directed to the provision of complementary services for the GPs, the recommended types of complementary services were not specified.[9]

The National Mental Health Blueprint (NMHB) 2007-2011, sought mainly to strengthen core services for mental health conditions, and focused on programmes driven at the tertiary level. However, in order to improve health and social

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outcomes while reducing overall system cost, international and clinical consensus recommends that community-based mental health services be developed to complement institutional ones.[10]

In order to develop and implement further programmes and policies, it is imperative to obtain information on the clinical practice, experiences and views of GPs in managing mental illnesses in private practice. However, such information is scarce and mostly anecdotal in the local context.

There has only been one documented study on this topic in the local context. In a postal survey conducted among 543 randomly selected GPs in Singapore, Janhavi and colleagues reported that 68% of the GPs were managing people with mental illness, and that anxiety and stress disorders were the most common mental conditions attended by the GPs in their clinics.[11] In their study, the lack of appropriate medication in the clinic, the lack of adequate time, the lack of support from ancillary healthcare professionals, and the need for more knowledge in managing patients with mental illness were perceived as major difficulties in managing such patients.

The AIC conducted a GP Landscape Survey in July 2011 to determine the specific areas in which the agency could work with GPs to enhance chronic disease management in Singapore. In order to enhance mental healthcare in Singapore, this survey also aimed to provide further understanding of how GPs perceive mental illness management and their professional development needs in such management. This paper reports the findings and presents a discussion related to this second survey objective.

METHODOLOGY

Questionnaire design

Staff members from the Primary Care Development Division of the AIC, who have experience working with GPs, drafted an initial list of questions. This list was circulated among other AIC staff knowledgeable of the primary care sector and external stakeholders (all restructured hospitals, the Health Promotion Board, the Ministry of Health, the Ministry of Health Holdings and the Singapore Medical Association) for comments and suggestions for improvement. Information collected was then reviewed by a team that comprised doctors, policymakers, a research analyst and a survey expert. The interviewer-administered questionnaire, which covered areas such as practices (clinic patient profile, complementary services and community care services), and professional development in mental illness management, was pilot-tested with four GPs. The questionnaire was finalised for fieldwork use after minor revisions were made.

Sample

GPs from two clinic types (group and non-group practices) and practicing in four geographical districts in Singapore (Central, East, North and West) were randomly selected according to their proportions in the population. Based on anecdotal evidence, it was expected that GPs practising in different clinic types would differ in the area and amount of need. The proportion of group GPs on the national database was 24%. Using an estimated response rate of 50%, a sample of 500 GPs from a population total of 1,949 was determined to be the required sample size to provide a margin-of-error of approximately 5% at 95% confidence interval.[12] GPs were selected according to geographical districts for exploratory purposes.

Survey Fieldwork

The survey fieldwork was conducted by a third-party research company which employed and trained interviewers. It was completed in about 6 weeks, between July and August 2011. An invitation letter that explained the purpose and requirements of the survey was mailed to all 1,949 GPs on the national database. Every respondent must be a local GP with a functional private practice, to be eligible to participate in the survey. A random selection of GPs in each cell of a matrix, formed by two clinic types and four by geographical districts, was conducted until the required number of contactable and eligible respondents agreed to participate. The anonymous and voluntary nature of the survey was emphasised by the interviewers, although the GPs could volunteer their contact details for future engagement purposes. Face-to-face interviews lasting 15 to 20 minutes were scheduled and conducted at the respondents' clinics. A telephone line was also set up to address queries. Questionnaires were first checked for consistency and completeness. Accuracy of interviewer recording was ensured through 10% random call-back. After removing the GPs' personal details from their responses, data from completed questionnaires were entered carefully in a dataset by independent data entry clerks.

Statistical analysis

Data was analysed using Statistical Package for Social Sciences (SPSS, Chicago IL, USA) version 19.0. Descriptive statistics and frequency distribution were computed for responses to the questionnaire items.

RESULTS

Contact attempts were made with a total of 849 randomly selected GPs, of which 54 were found to be ineligible, 146 uncontactable, and 149 rejected participation. Using the Council of American Survey Research Organizations method,[13] the estimated number of eligible GPs among the uncontactable ones was 137, giving an adjusted total number of 786 eligible GPs, out of which 500 completed responses were obtained. This resulted in an overall response rate of 63.6%.

The socio-demographic characteristics of the 500 respondent GPs are presented in Table 1. Many of them are male (7 males to 3 females), Chinese (91%), between 40 to 49 years old (43%) and have been practicing for between 10 to 15years (24%). When compared to Group GPs, non-group GPs tend to be older (23% vs. 5% are 60 years and above), and have practiced

TABLE 1: SOCIO-DEMOGRAPHIC CHARACTERISTICS OF INTERVIEWED GPS

	Categories	Column % (n)		
		All	Non-Group	Group
Gender	Men	72 (360)		
	Women	28 (140)		
Race	Chinese	91 (455)		
	Malay	2 (10)		
	Indian	5 (25)		
	Others	2 (10)		
Age (years)	<30	1 (5)	0 (0)	5 (6)
	30-39	17 (85)	11 (42)	35 (42)
	40-49	43 (215)	43 (163)	45 (54)
	50-59	20 (100)	23 (87)	10 (12)
	>=60	19 (95)	23 (87)	5 (6)
Length of service as GP (years)	<5	10 (50)	5 (19)	24 (29)
	5-10	9 (45)	6 (23)	17 (20)
	10-15	24 (120)	24 (91)	23 (28)
	15-20	18 (90)	18 (68)	18 (22)
	20-30	21 (105)	23 (87)	15 (18)
	>=30	19 (95)	23 (87)	3 (4)
Total		100 (500)	100 (380)	100 (120)

All percentages rounded off to the nearest whole number

as a GP for a longer duration (23% vs. 3% have practiced for 30 years and above).

Other than these socio-demographic characteristics, the results either did not differ between the clinic types and geographical districts (Pearson $\chi 2 < 2.67$, ps > .05), or were of weak effect sizes (Phi coefficients < .30). Hence, all results will be reported for the entire sample.

About 70% (n= 351) of the GPs were seeing patients with mental illness at the time of the survey. 62% (n= 310) of all GPs indicated that patients with mental illness comprise one to five percent of their monthly caseload.

Among the GPs who were seeing patients with mental illness, the most common mental illnesses attended to were anxiety (69%, n= 241) and depression (23%, n= 79) (Table 2). Among the GPs who were not seeing patients with mental illness (n= 149), the lack of available drugs and facilities in their clinic, and unfamiliarity with mental health patient management were the top two reasons indicated by 42% (n= 63) and 40% (n= 60) of the GPs respectively (Table 3).

TABLE 2: MENTAL ILLNESS MOST OFTEN SEEN BY GPS

	% (n)
Anxiety	69 (241)
Mood-Depression	23 (79)
Elderly-Dementia	3 (10)
Schizophrenia	1 (3)
Mood-Bipolar	1 (3)
Addiction – Alcohol	1 (4)
Addiction – Drugs	1 (2)
Personality issues	1 (3)
Eating disorder	1 (3)
Obsessive Compulsive Behaviour	1 (3)

Among GPs who were seeing patients with mental illness.
All percentages rounded off to the nearest whole number.

TABLE 3. REASONS THAT GPS (N=149) DO NOT SEE PATIENTS WITH MENTAL ILLNESS (MULTIPLE RESPONSE)

	% (n)
Lack of available drugs and facilities in their clinic	42 (63)
Unfamiliarity with mental health patient management	40 (60)
More time consuming	36 (54)
Does not match clinic's patient profile	32 (48)
Difficulty in monitoring such patients	27 (40)
Little remuneration	22 (33)
Others	22 (33)

All percentages rounded off to the nearest whole number.

TABLE 4. MOST IMPORTANT FACTOR THAT INFLUENCE GPS TO SEE MORE PATIENTS WITH MENTAL ILLNESSES

	% (n)
More complementary services such as counselor, psychologist and family therapist available in the neighbourhood	23 (115)
GPs being able to refer patients to Restructured Hospital with subsidies	16 (80)
Additional training courses on managing mental health diseases	15 (75)
Partnering Restructured Hospitals to manage hospital discharged patients for follow-up care	14 (70)
Reward GPs who manage mental health patients well (i.e. pay for performance)	10 (50)
GPs having access to group purchase order (GPO) drugs which cost lower	9 (45)
Support given to GPs to help build IT system that integrates with the national initiative of electronic health records	3 (15)
Admin personnel provided to help in submission of clinical data (for clinics on CDMP programme)	2 (10)
Others	8 (40)

All percentages rounded off to the nearest whole number.

From a list of factors, 23% (n= 115) of all GPs indicated that the availability of more allied health support services (e.g. counsellor, psychologist and family therapist) in the neighbourhood would have the greatest influence to encourage them to see more mental health patients (Table 4).

About 75% (n= 377) of the GPs indicated that they provided advice on mental well-being. Among these GPs, there were more GPs who saw patients with mental illness than those who did not see such patients. (61% vs 15%, Pearson $\chi 2 = 75.79$, $p < .001$, Phi coefficient= .39) (Figure 1).

Among the allied health support service providers, psychologists (39%, n= 195) and counsellors (36%, n= 180) are most frequently referred to by GPs (Table 5).

Only 1% (n= 5) of interviewed GPs provided their services at dementia day care centres, in addition to seeing patients at their own practice/ clinics. From a list of areas, mental illnesses were ranked as the top few that GPs would like to receive training in, with 43% (n= 215) of GPs indicating Dementia as their choice. Apart from illness-specific training, 36% (n= 180) of GPs also indicated that they are interested in training that will help them gain a better understanding of mental health issues in general (Table 6). The majority of GPs preferred to be trained

FIGURE 1: SEEING PATIENTS WITH MENTAL ILLNESS AND PROVIDING ADVICE ON MENTAL WELL-BEING (N=500)

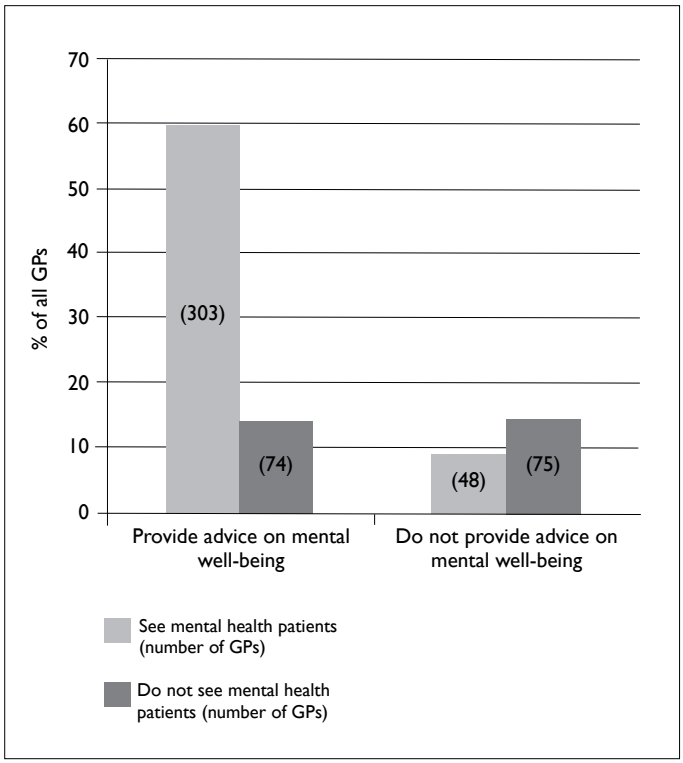

TABLE 5. ALLIED HEALTH SERVICE PROVIDERS GPS REFER PATIENTS TO (MULTIPLE RESPONSE)

	% (n)
Psychologist	39 (195)
Counsellor	36 (180)
Medical Social Worker	26 (130)
Family Therapist	19 (95)
Occupational Therapist	16 (80)
Case Manager	14 (70)
Mental Health Advanced Practice Nurse	10 (50)

All percentages rounded off to the nearest whole number.

TABLE 6. AREAS GPS WOULD LIKE TO RECEIVE TRAINING IN (MULTIPLE RESPONSE)

	% (n)
General Geriatrics	50 (250)
Dementia	43 (215)
General Mental Health	36 (180)
Major Depression	36 (180)
Diabetes	34 (170)
Family Medicine	34 (170)
Stroke	33 (165)
Schizophrenia	32 (160)
Homecare	30 (150)
Hypertension	28 (140)
Lipid Disorders	28 (140)
Chronic Obstructive Pulmonary Disease	28 (140)
Asthma	25 (125)
Lifestyle Risk Factors	23 (115)
Others	2 (10)
Any	87 (435)

All percentages rounded off to the nearest whole number.

through attending seminars (77%, n= 385) and online means (61%, n= 305) (Table 7). Half of all GPs (n= 250) indicated that the day and time of training is their topmost consideration when deciding on training (Table 8).

DISCUSSION

Findings of the GP Landscape Survey that are related to the GPs' perception of mental illness management and their professional development needs are reported in this paper. The survey questionnaire was developed qualitatively and administered by trained third-party interviewers. Hence, minimum response errors, confidentiality and effective data collection was ensured. The achieved response rate of 64% fulfilled statistical requirements and provided acceptable generalisability of the findings.

Differences in the profile of Group and Non Group GPs suggest the need to employ different engagement approaches, as the latter are generally older and have practiced for longer durations. Based on the experience of the AIC, older GPs tend be more accustomed to a certain working style while younger GPs tend to be more technologically-savvy. It is also plausible that when compared their younger counterparts in group practice, non-group GPs are more experienced and familiar with practice issues including the management of patients with mental illness.

On the other hand, most of the results did not differ by clinic types and geographical districts. Pending replication using larger respondent sample sizes, these results may suggest that the perceptions of GPs regarding mental illness management and professional development are fairly homogenous.

TABLE 7. GPS' PREFERRED MEDIUM OF TRAINING (MULTIPLE RESPONSE)

	% (n)
Seminars	77 (385)
Online means	61 (305)
Hands-on	44 (220)
Formal courses	42 (210)
Ward rounds	15 (75)
Others	1 (5)

All percentages rounded off to the nearest whole number.

TABLE 8. GPS' TOPMOST CONSIDERATION WHEN DECIDING ON TRAINING

	% (n)
Day & Time of Training	50 (250)
Duration of Training	16 (79)
Cost of Training	12 (58)
Recognition of certification	9 (45)
Opportunity cost	8 (40)
Training Provider	5 (25)
Others	1 (3)

All percentages rounded off to the nearest whole number.

The mentally-ill patient profile of GPs and their views regarding mental illness management appears to have been stable in the last few years. Both the GP Landscape Survey and the survey by Janhavi and colleagues found that about 70% of GPs see patients with mental illness and that patients with mental illness comprised only a small fraction of GPs' caseload.8 Similar to the results reported in other countries,[14,15] both studies found anxiety to be the most common mental illness attended by GPs. This present survey also found depression to be the second most commonly seen mental illness. From anecdotal evidence, GPs usually refer patients with these illnesses to the Singapore Institute of Mental Health or restructured hospitals. Community mental health services, which are non-residential and arguably non-institutional in nature (see example below), will be required to keep the treatment of these patients within the community. The reasons that about 30% of GPs in this survey were not seeing patients with mental illness, are consistent with the findings reported by Janhavi and colleagues (2010) on the perceived difficulties in managing patients with mental illnesses. With the prevalence of mental illnesses and the extent of disability caused by these illnesses,[3] the similar results between the two studies are indicative of the crucial role GPs continue to play in the care of mentally ill patients in the community and the pressing need to address their perceived difficulties in managing such patients, such as the lack of available drugs and facilities in the clinic.

This survey found that the allied health support services provided by counsellors, psychologists and family therapists are important to GPs' management of patients with mental illness. These results suggest that the availability of counsellors, psychologist and family therapists could be crucial for community health centres and family medicine clinics to be referred to by GPs, and hence, be effective. The Singapore Ministry of Health is developing a new community-based mental health plan that will expand counselling and psychotherapy services in the community to enable GPs to play a larger role in treating patients with mild to moderate mental conditions such as anxiety and depression.[16] "Temasek Cares-iCommunity@North", a pilot project that brings hospital medical care and community-based specialised teams trained in dementia care together, was launched in July 2012 to provide outreach and education, service linkages to mental health services, counselling therapy and care coordination services.[17]

That 19% of GPs would like to be able to refer patients to restructured Hospitals with subsidies provided a partial basis for the launch of Community Health Assist Scheme (CHAS) in January 2012. The CHAS allows patients with household income of up to $1,500 to receive subsidised treatment at GP Clinics for mental illnesses such as schizophrenia, major depression, dementia and bipolar disorder. The CHAS also allows patients who require inpatient psychiatric treatment or long-term residential care to enjoy subsidies of up to 80% in Class C wards or up to 75% in Intermediate and Long-term Healthcare facilities.[13]

We found that professional development in the areas of general geriatrics and dementia via seminar and online education may be effective in engaging GPs and in addressing their perceived unfamiliarity with mental health patient management. These results may aid in the future development of the Family Medicine Modular Course and the GDMH programme.

Because this is an interviewer-administered survey, biases due to social desirability and interviewer characteristics cannot be ruled out. Notwithstanding these limitations, this is a nationwide survey of a representative sample of practicing GPs in Singapore with a respectable 64% response rate. This survey provided information on the views of GPs regarding mental illness management in their practice, the factors that help them to see more mentally ill patients, their areas of interest for further training.

CONCLUSIONS

The role of GPs in managing mental illnesses remains crucial. There is a pressing need to address their perceived difficulties in managing such patients. The results of the GP Landscape Survey provided evidential bases to enhance the National Mental Health Blueprint in three areas: (i) extension of GP consultation subsidies to middle-income patients, (ii) expansion of allied mental health services to support GPs, and (iii) development of training programmes for GPs in mental illnesses that are commonly encountered by and of interest to GPs.

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