Mental Health and Drought in Rural and Remote Queensland

SERVICE MAPPING REPORT

November 2008

Centre for
Rural & Remote
Mental Health
QUEENSLAND

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Service Mapping Report of the Centre for Rural & Remote Mental Health Queensland

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Executive Summary

Aims:

Approximately two thirds of Queensland has been drought declared and had a Federal Exceptional Circumstance declaration in place over the past seven years. In recognition of the social and emotional strain caused by the length and severity of the current drought, various services and community support initiatives have been developed and implemented. The Federal Government's Mental Health Support for Drought Affected Communities Initiative (2007-2009) is the corner-stone for all mental health assistance and support. This initiative ceases on the 30th June 2009. The aims of this project were to investigate the type, duration, targeted population and distribution of mental health services in rural and remote Queensland with a specific focus on drought.

Methods:

Data about the specific service that was offered, the location of that service, the target population and the duration of the service were collected via (i) an electronically distributed survey, (ii) telephone interviews, (iii) face-to-face interviews and (iv) an overview of recent reports and papers. Services were categorised into four groupings: (a) long term education, (b) short term education, (c) support and (d) counselling or treatment. The individual services and initiatives were then mapped onto a matrix developed for a paper on mental health commissioned for the Garnaut Climate Change Review (Berry *et al*, 2008).

Results:

Data was collected from 229 communities. Only 22 of these communities had single entries, indicating that there were multiple services provided in a majority of communities (e.g. counselling services and information nights). From these 229 communities, 643 individual service items were identified. The vast majority were direct support and counselling style services, meaning most of the services provided were tertiary treatment interventions for individuals and households. There was some service provision in respect to early intervention but there was almost no targeted preventative service provision. The distribution of services was sporadic and where there were multiple services, there was a distinct lack of coordination. Kenny *et al* (2008) attained similar findings.

Discussion:

The analysis revealed that there were few mental health services directly related to minimising the impact of drought on mental health. Those that did exist are skewed towards reactive approaches to mental health with no preventative initiatives or programs. Of the 643 services that were analysed, only 14% will exist as at the 1st July 2009. At present there are no plans for a continuation or replacement of these services. This report concludes with an outline of potential solutions to the identified service limitations and transitional strategies which take into account the recommendations from the two recent reviews on the impact of dryness in rural and remote Australia.

Introduction

This mapping study provides current information on existing services and supports and the gaps in mental health services that are specific to climate change, especially drought. It also indicates the future levels of service that will be available to rural and remote Queenslanders after the 30th June 2009, when the current funding ceases. This information will be of relevance to federal, state and local governments, health and community service providers and those involved in primary industries. This study will also contribute to the development of new, innovative and sustainable interventions, raising community awareness, promoting practical resources and relevant information to those living and working in rural and remote Queensland. When read in conjunction with "It's All About People: Changing Perspectives on Dryness" (2008), it will highlight priority areas for future service planning, the development of effective activities, services and supports. This report will also provoke discussion regarding the future of rural and remote mental health policies and services which are responsive to climate change and sustainable, not crisis-driven.

Background

Living and working in rural and remote Australia is generally a stressful existence. This stress is caused by many commonly accepted factors, as well as possibly some yet unidentified factors (McMichael, 2008). Researchers in the USA and the UK (Eberhardt & Pooyan, 1990 and McGregor *et al*, 1995) identified the six major causes of farm stress as being: Acts of God (or climatic conditions), Isolation, Farming Bureaucracy, Time Pressures, Personal Hazards and Finance (as sited in Monk, 2000). Some more specific proven factors include, but are not limited to: financial pressure, social isolation, geographical location, lack of control, relationship pressure, societal stigma, confrontation of personal belief and an increase in a feeling of worthlessness (De Leo *et al*, 2005). Due to the reliance on primary industries in rural and remote areas, climate variability is the factor that has the greatest influence on the stress levels of individuals in rural and remote areas.

The comment *"Australia has one of the most variable climates in the world"* (Nicholls and Wong, 1990) raises grave concerns when coupled with the statements above regarding factors that influence the stress levels of individuals. Group (2007) stated that *"Extended periods of stress can cause destructive changes in the body such as depression"*.

It is widely accepted throughout the literature that the majority of cases of depression remain undiagnosed. However Andrews *et al* (1999) reported that *"for the preceding decade, one in five Australian adults meet the diagnostic criteria for a mental disorder each year"*. Given these facts, it is reasonable to accept the prediction made by Mathers and Loncar (2006) that *"depressive disorders will be the second greatest burden of disease in the world by 2020 and this is expected to continue until at least 2030"*. The World Health Organisation (WHO) has also accepted and widely published this modelling and prediction.

The problem is further complicated once a depressive disorder is established, with an increase in the likelihood of substance abuse i.e. alcohol, tobacco and illicit drugs (Pfizer, 2004). This then dramatically increases the risk of physical health issues emerging or intensifying. Queensland Health (2007) stated *"tobacco smoking and alcohol consumption account for 93% of all drug-related death and illness"*. All these compounding factors result in a loss of that individual's quality of life, capacity to participate in the community and capacity to positively contribute to the economy (Ruta *et al*, 2007). This multiplies the factors identified above that can be stressors. This vicious circle often continues to intensify until the individual seeks help or chooses to end their life (Suicide Prevention Australia, 2008).

As can be extrapolated from the research above, the monetary cost to the communities from depression caused by climate change is extremely difficult to calculate. However, it is agreed that the monetary cost is significant. When assessing the societal cost of mental health and climate change, the issue becomes even harder to define. Almost 4% of total deaths recorded in Australia in 2006 were directly attributable to Mental Health Disorders (Australian Bureau of Statistics, 2008). This figure increased by 53% from 2005 (Australian Bureau of Statistics, 2008). These figures are representative of diagnosed Mental Health Disorders. These figures include suicides.

It is also widely publicised that depressive disorders are the most common of mental illnesses and one of the greatest indicators of possible suicidal tendencies (Suicide Prevention Australia, 2008). The link between mental health disorders and suicide is reported to be as high as 90% (Mental Health Problems, Life Events and Suicide, 2007). Waern *et al* (2002) have reported that *"virtually all mental illnesses ... are associated with an increased risk of suicide"* .

In 2002 it was reported that suicide accounted for 1.7% of all deaths in Australia (Australian Bureau of Statistics, 2006). This shows a marked increase not only in the number of suicides in Australia each year, but also the number of deaths directly attributed to mental health disorders.

The Australian Bureau of Statistics, 2008, reported on suicide rates in Australia from 2001 to 2005. The average yearly suicides in Australia were 11.2 deaths per 100,000 people. From the same data, Queensland's suicide rate was 12.8 deaths per 100,000 people. This gave Queensland a national rank of the third highest yearly average in Australia behind the Northern Territory and Tasmania. Queensland's rate of suicide for this period was 14% above the national average.

The latest study from the Australian Institute for Suicide Research and Prevention (AISRAP) has *"...found the rate of suicide among farm workers, including farm owners and employees aged between 15 and 65, is more than double than that of the rest of the population..."* (Hawgood, 2008). This statement is supported by Taylor *et al* (2005) in their paper 'Social and Psychiatric Influence on Urban-Rural Differentials in Australian Suicide'. It is also widely agreed through

Due to the reliance on primary industries in rural and remote areas, climate variability is the factor that has the greatest influence on the stress levels of individuals in rural and remote areas.

the research that the actual figures of rural suicide are far greater than reported due to the narrow definition required for the reporting of a 'registered suicide'. That is, the figures do not include such life ending events as suspicious single motor vehicle accidents and drug overdose (Australian Bureau of Statistics, 2007). From the current research, it is accepted that the rate of rural suicide is higher than reported. Even so, based on current data, the rate of suicide in rural and remote areas is still significantly greater than that of urban areas.

One probable cause for the bias and increase in frequency of suicides in rural and remote areas, as opposed to urban areas, is the factor of climate variability and the flow on effect that it imposes on the stress levels of individuals.

Having established the direct link between climate variability, stress, depression and suicide, it is necessary to investigate the possible points of intervention, so that more detailed prevention strategies can be developed and implemented. A greater understanding on climate variability is needed to do this.

Recent research as a result of the Climate Change realisation, now consistently indicates that there will be greater variability of climate. For example, Bi and Parton (2008) stated *"... weather patterns are likely to become more variable, and include more extreme events"*. This comment highlights the potential for climate change to produce a detrimental effect on the mental health of all Australians, but especially those in rural and remote areas. Bi and Parton (2008) then elaborate on their initial comment by reporting that *"drying and warming, the latter of which will occur in all parts of Australia, will exacerbate the frequency and severity of drought (and other weather events)"*. This is also supported by Hennessy *et al* (2008) in their report to the Australian government on the Australian Drought Response where they predict that *"there will certainly be an increase in average temperature and an increase in the variability of average annual rainfall and the subsequent increase in the variability in average soil moisture"*.

Drought is a phenomenon that has no set definition. According to the American Meteorological Society (as sited in Hennessy *et al*, 2008), the hydrological definition of drought is *"prolonged moisture deficits that affect surface or subsurface water supply, thereby reducing stream-flow, groundwater, dam and lake levels. This may persist long after a meteorological drought has ended"*. Drought is also defined as a *"prolonged absence or marked deficiency of precipitation (rain)"* (Australian Bureau of Meteorology, 2008). From these definitions, it is reasonable to conclude that there is no consensus on a definition of drought. All of the research indicates that temperatures will increase and the variability in weather patterns will also increase, that is, it will get hotter, weather patterns will become less reliable and the likelihood of increased drought and dry periods will be higher. Kenny *et al* (2008) avoided the confusion surrounding the definition of drought by identifying the pending climate variability with the term 'dryness'.

These statements give rise to significant concerns for rural and remote Queensland.

The Australian Bureau of Statistics (2006) reported that the largest industry in rural and remote areas is primary production. The primary production industry generally is very labour focused and always requires water for the development and processing of products. In the event of drought, access to water is limited and rainfall is reduced and less frequent (McMichael, 2008). Rural and remote areas are far more sensitive to drought than urban areas due to their reliance on water and rainfall (Berry *et al*, 2008).

Without consistent rainfall and water supplies, these rural communities experience significant adversity just to remain productive, viable and exist (Remote Focus Group, 2008). In turn, financial constraints result in the reduction of employees. Thus, when primary production is under direct pressure, for example, the current drought, factors that can cause an increase in stressors are exacerbated (Alston & Kent, 2004). This affects not only the individuals directly involved in the industry, but an individual's household, their community, their region, their state and ultimately the nation (Alston & Witney-Soanes, 2008).

This situation is summed up extremely well by the Productivity Commission's report "Inquiry into Government Drought Support" (2008) which states *"Droughts can have a devastating social and financial impact on farmers and their local communities as well as adverse environmental effects. Droughts also reduce Australia's economic growth through forgone production and reduced employment"*.

Looking to the future, we must act now to severely limit the adverse impacts of climate change on the mental health of rural and remote Queenslanders.

Kenny *et al* (2008) in their report to the Australian government on the Social Impact of Drought indicated that drought or 'dryness' is part of the fantastic, challenging yet remarkably rewarding 'way of life' experienced by people in rural and remote Australia. From time to time, there is going to be excessive drying. This drying may or may not be defined as drought, but it is expected. All indications are that there will be an increase in the severity and frequency of dryness. So plans must be developed and implemented and precautions must be taken to limit the impact on mental health from the inevitable periods of dryness.

A dry creek between Boulia and Bedourie, south west Queensland

Rural and remote Australian's lives depend on the climate for lifestyle and productivity opportunities. An increase in the occurrence of dryness will increase the stressors experienced by these individuals and all of the research indicates that this will then result in an increase in mental health disorders (for example, Berry *et al* (2008)). Suicidal tendencies possess an extremely high correlation (estimated as high as 90%) with mental health disorders (Mental Health Problems, Life Events and Suicide, 2007).

Due to the limited availability of tertiary services (Appendix C) in these areas, many individuals who experience a mental health disorder will continue to go undiagnosed and untreated. This possibly accounts for rural suicide being one of the highest sub-groups of Australia's suicide figures.

It is logical to surmise that an increase in the rate of rural suicides associated with adverse climate change will be witnessed unless strategically targeted programs and support measures are implemented.

Plans must be developed and implemented along with the necessary infrastructure so that *"Rural and remote Queenslanders, whoever they are, have the right to live in dignity and to work towards the best possible social and emotional wellbeing"* (Centre for Rural and Remote Mental Health Queensland's Mission Statement, 2008). This will also improve the standing of Queensland's current situation towards the World Health Organisation's optimal definition of mental health which is *"Mental health is not just the absence of mental disorder. It is defined as a state of well-being in which every individual realizes his or her own potential, can cope with the normal stresses of life, can work productively and fruitfully, and is able to make a contribution to her or his community"* (World Health Organisation, 2008).

Aims

Approximately two thirds of Queensland has been drought declared and has had a Federal Exceptional Circumstance declaration in place over the past seven years. In recognition of the social and emotional strain caused by the length and severity of the current drought, various services and support activities have been developed and implemented. The Australian Government's Mental Health Support for Drought Affected Communities Initiative (2007-2009) is the corner-stone for all mental health professional assistance and support.

The aim of this study is to investigate the type, duration, targeted population and distribution of mental health services in rural and remote Queensland with a specific focus on drought. Comparisons of similar support have been made with other States also funded by the Australian Government's Initiative.

Methodology

This mapping study was conducted over a three month period from the 1st June 2008 to 31st August 2008. The study was performed by the distribution of a simple one page survey (Appendix A). The survey was designed to collect information pertaining to a specific service that was offered, the location of that service, the target population and the duration of that service. Data was also collected via telephone as well as face-to-face interviews. This study was undertaken in five stages.

Stage 1: Development of the Survey Tool

The survey tool was developed through consultation with academics, business professionals and health professionals. This was to ensure that the survey contained three specific attributes which were:

(i) Questions that actually requested the data;
(ii) The survey was brief (increasing the return rate of surveys); and
(iii) The questions appeared relevant to professionals who already have massive workloads and thus time constraints regarding research (again to increase the return rate of surveys).

Stage 2: Distribution of the Survey Tool

The survey was distributed electronically via email through the Queensland Mental Health Advisory Group (Environmental Adversity). See Appendix B for a brief description of the Advisory Group and a list of members.

Stage 3: Collation of the Data

Data was collected via return email, telephone interview and face-to-face interviews.

Stage 4: Analysis of the Data

Initially the data was divided by communities into four very general categories.
Those categories were:

(a) Long Term Education and Capacity Building,
(b) Short Term Education and Capacity Building,
(c) Drought Specific Support, and
(d) Counselling or Treatment.

The data was then broken down further into the specific individual services. The specific individual services were then mapped onto a matrix that was developed for a paper on mental health commissioned for the Garnaut Climate Change Review (Berry *et al*, 2008) (see Appendix C for the matrix).

Stage 5: Development of the Graphical Representation

The initial community based data was graphically processed in close consultation with AgForward, a mapping company associated with AgForce Queensland. The individual services data was processed in consultation with Dr Helen Berry using the matrix published in the mental health paper commissioned for the Garnaut Climate Change Report 2008 (Berry *et al*, 2008).

For the purpose of this paper, rural and remote Queensland refers to any area outside of the south east corner, i.e. one hour's drive from the Brisbane CBD (the yellow circle on *Figure 1*) from Caloundra in the north to Gatton in the west and then to Coolangatta in the South.

Figure 1 : The exclusion zone of South East Queensland (QueenslandAustralia.com (2008)).

Looking to the future, we must act now to severely limit the adverse impacts of climate change on the mental health of rural and remote Queenslanders.

Limitations

There were several limitations to this study. The most significant was the small number of surveys returned. There were several factors which contributed to the low response rate. The study was only for a three month period, the commencement of which coincided very closely with the removal of the Exceptional Circumstance declaration. This resulted in the exclusion of about 1100 households from government assistance funding. This in turn placed a greater demand on the existing professionals, further increasing their already heavy workloads. Therefore, completing and returning a survey of their services would not be a priority.

Another limitation was the difficulty in distinguishing between a drought specific service and an existing mental health service whose demands are now focused on drought, due to public demand. This meant professionals who were employed specifically to provide services for the targeted groups being included and those who were general in their focus not being included. It must be noted that many of the mental health professionals that were not included in the data, did indicate that most psychological disorders that they treated stemmed from stressors originating through the impacts of climate variability. Currently the most confronting form of climate change is drought. Therefore, it can be argued that the current drought is the cause of most of the adverse mental health issues experienced by their patients.

Although the survey was distributed electronically with requests for further distribution to relevant parties, there were no surveys returned from professionals not already involved in the Queensland Mental Health Advisory Group (Environmental Adversity). This could be due to the above mentioned factor of workload, the lack of other professionals or the lack of any viable network for professionals in rural and remote mental health.

Results

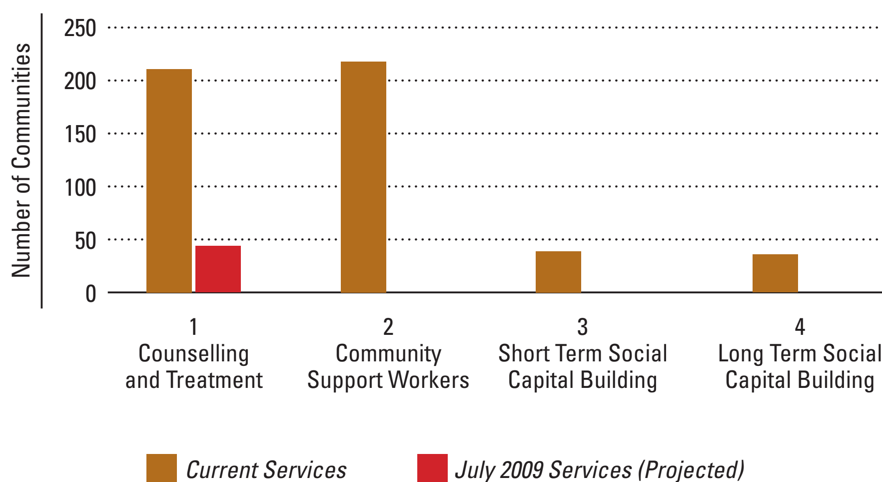
The data both present and projected as at 1st July 2009, was tabled from a total of 229 communities from rural and remote Queensland *(Table 1)*. Of these, only 22 had single entries; that is, there was only one form or style of mental health service available or provided for that individual community (e.g. visiting counsellor or an information night) within the three months of this study.

Table 1 : Total Services for Each Criteria

Criterion	Number	Total Services Current	Total Services 1-7-2009
Individual Counselling and Treatment	1	211	42
Drought Specific Community Support Workers	2	218	0
Short Term Education and Capacity Building at a community level (less than 3 days consecutively)	3	38	0
Long Term Education and Capacity Building at a community level (greater than 3 days consecutively).	4	35	0

A graphical representation of that data was then developed to compare the current level of drought specific mental health services and the level that is projected to exist once the current funding ceases *(Figure 2)*.

Figure 2 : Current Services vs Projected July 2009 Services



From the community data, geographical maps were developed demonstrating the type, duration and distribution of services across Queensland.

The first map in this series *(Figure 3)* shows the area of Queensland that is currently Exceptional Circumstance Declared (Bureau of Rural Sciences, 2008).

The short and long term community education and capacity building services were combined onto the one map *(Figure 4)*.

The individual Counselling and Treatment service type were grouped together and mapped according to the duration of the service provision *(Figure 5)*.

The area covered by each service provider is varies greatly. Each division has only one full time Community Support Worker employed for the area *(Figure 6)*.

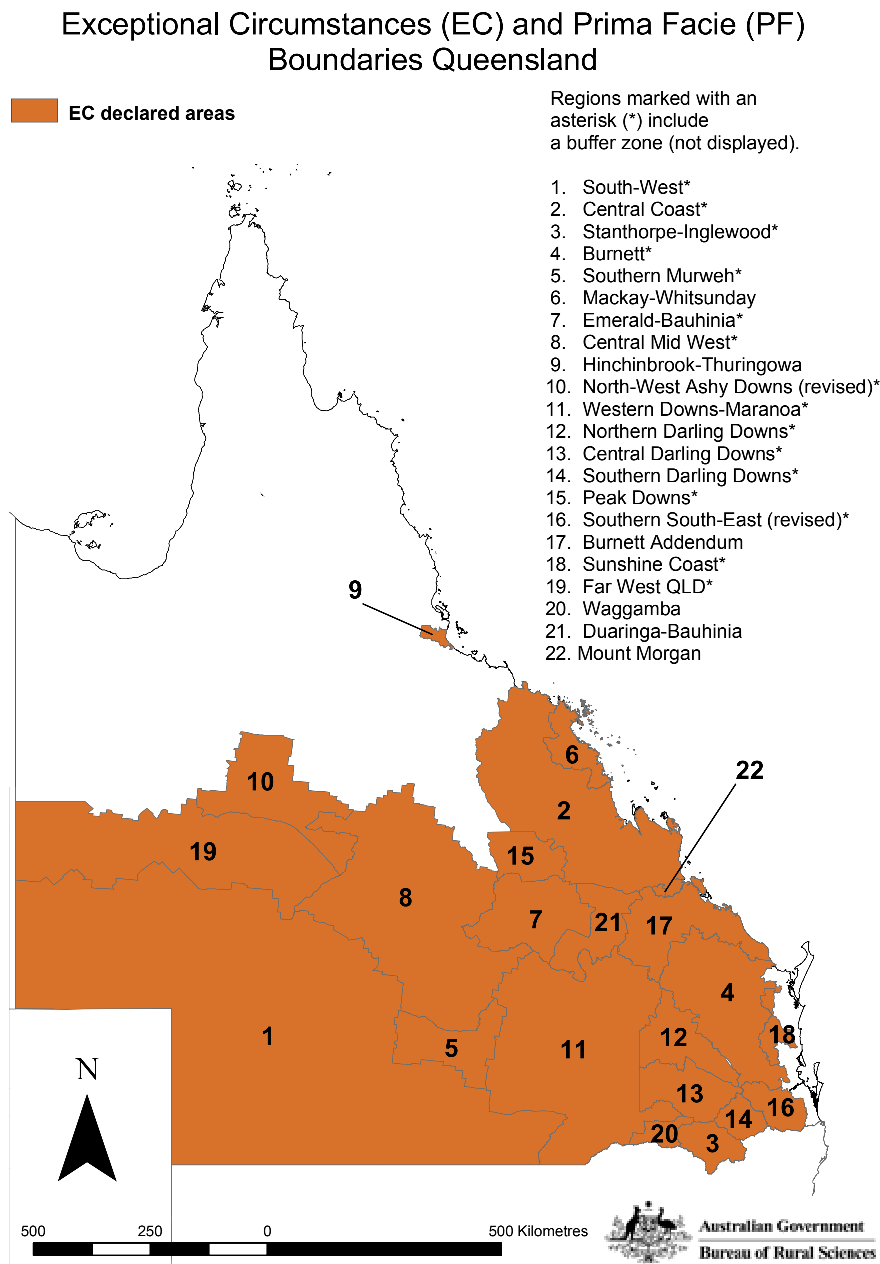


Figure 3 : Current Exceptional Circumstance Declared Areas (Bureau of Rural Sciences, 2008).

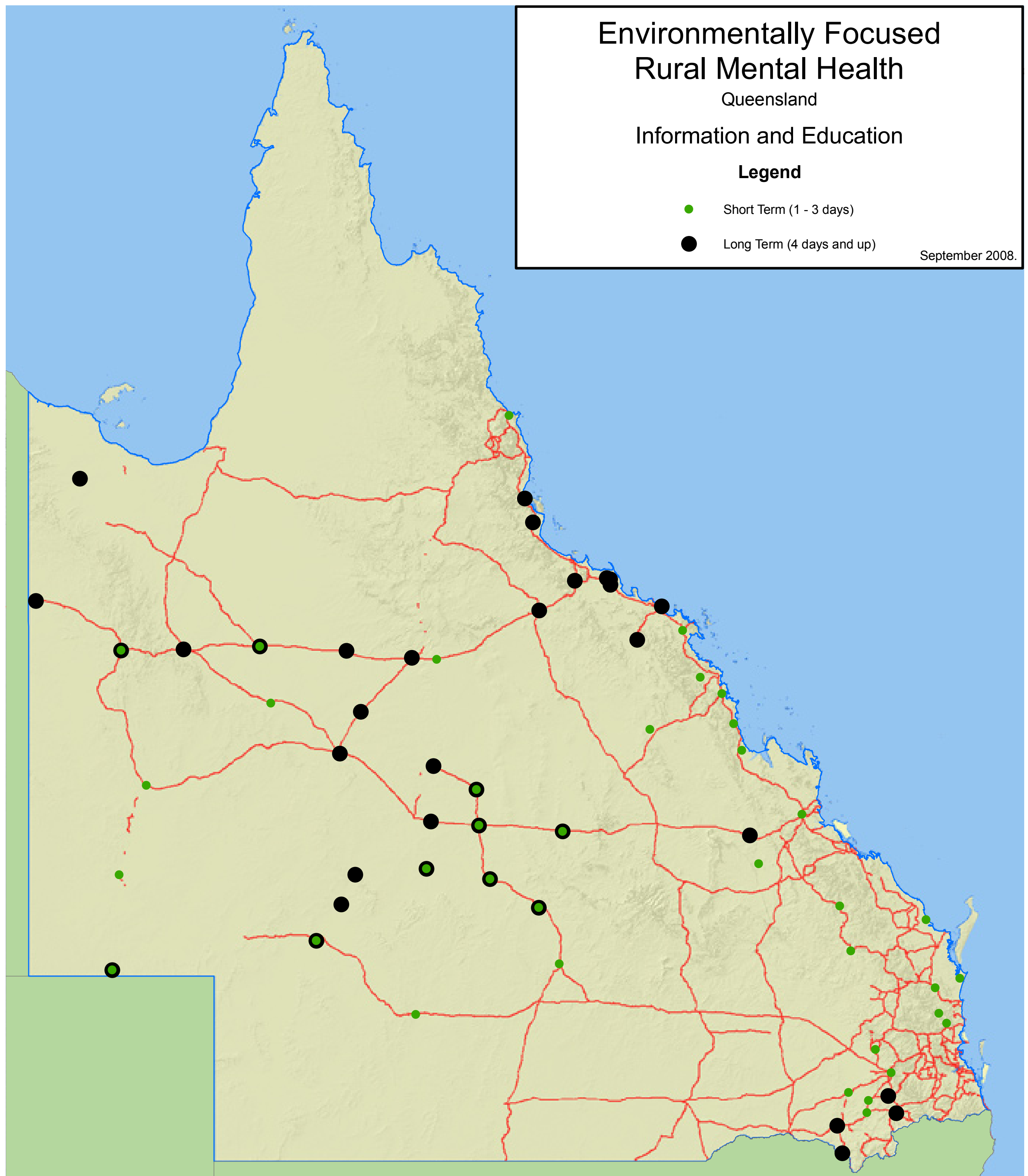


Figure 4 : Short and Long Term Community Capacity Building Services.

Note: A short term event would have a maximum duration of 3 days. An example of this would be an information evening to discuss depression. A long term event would be the implementation of a beyondblue Information Kiosk.

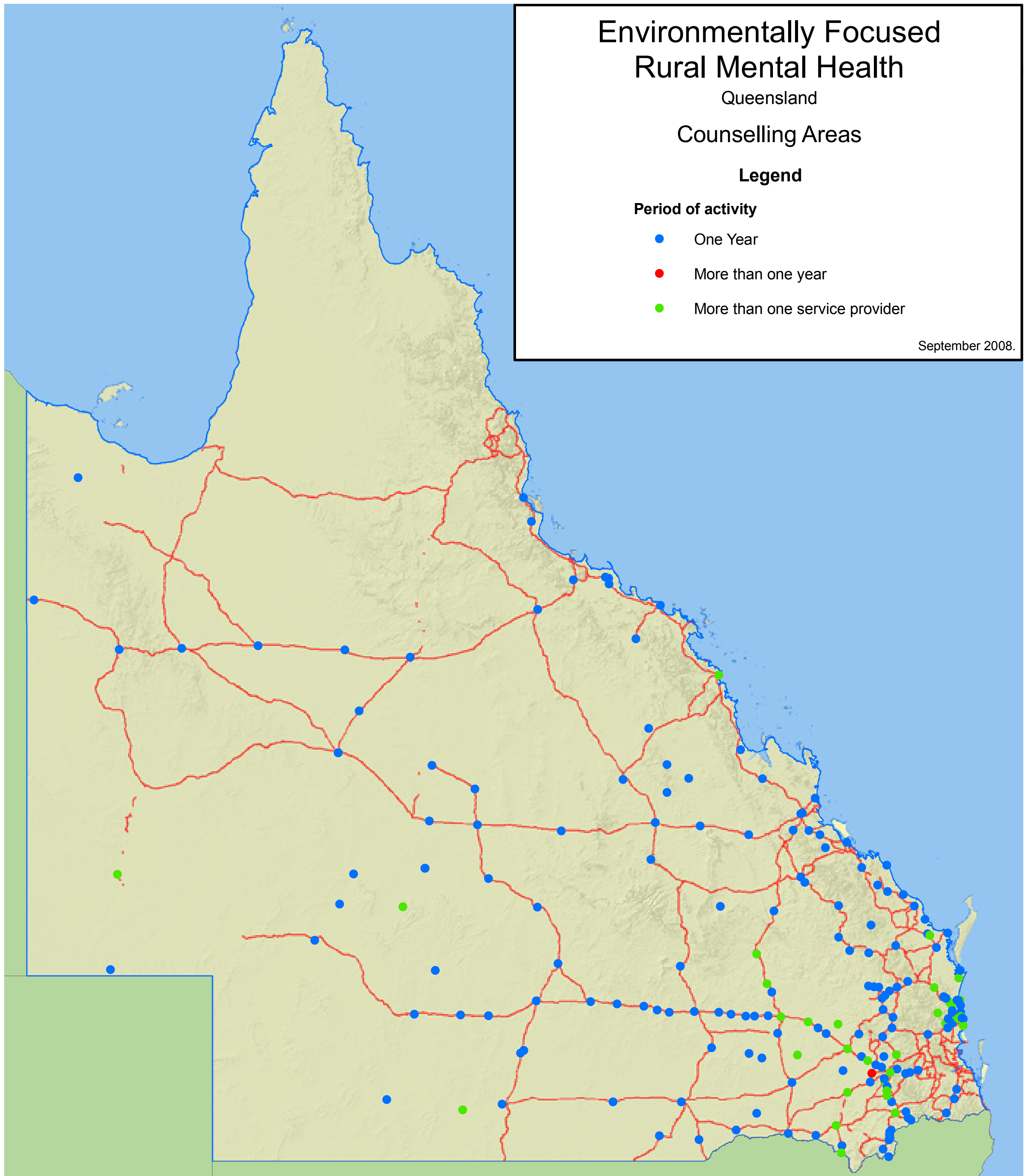


Figure 5 : Individual Counselling and Treatment Services and their respective duration of service.

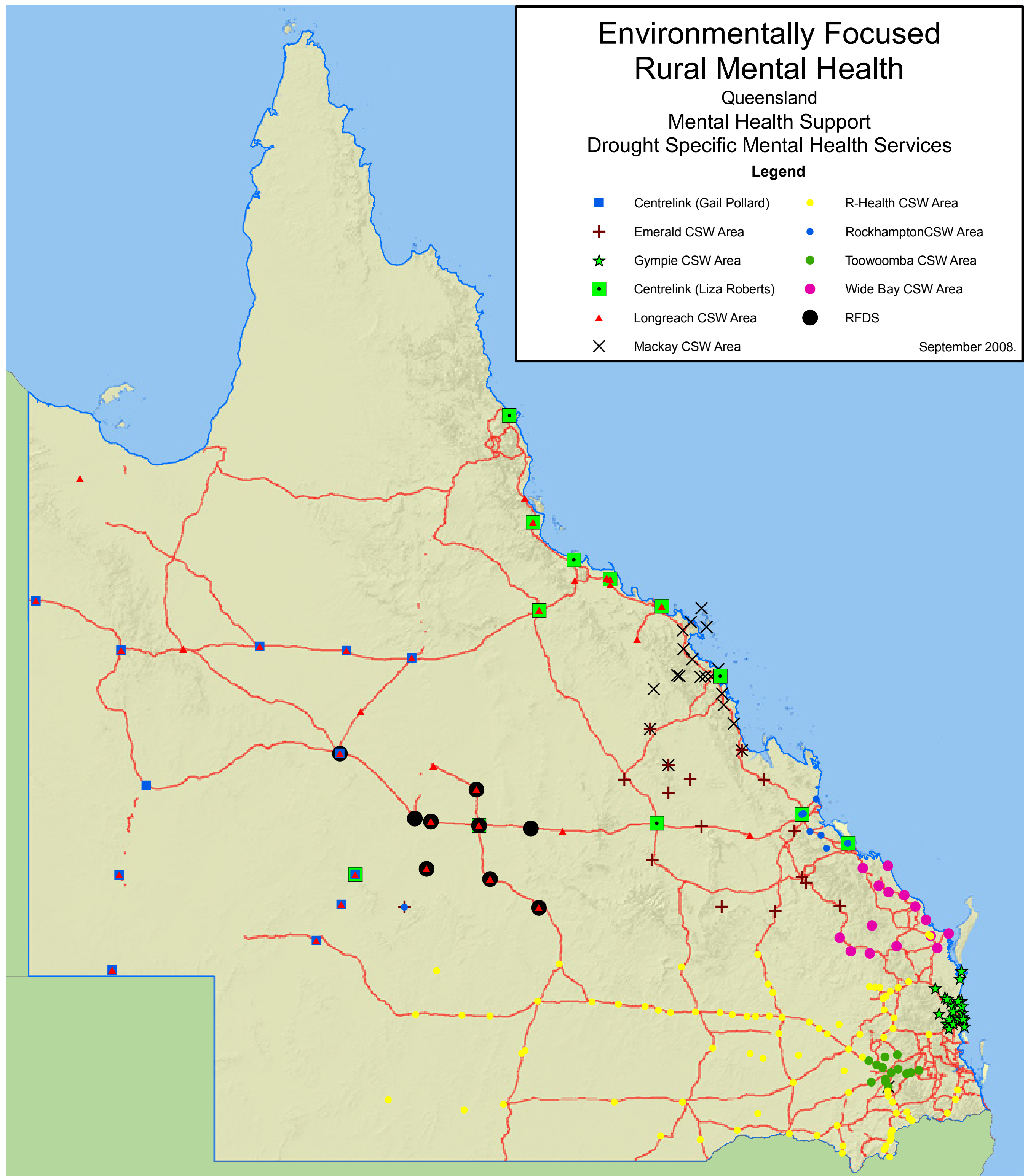


Figure 6 : Service Area for each Drought Specific Counsellor.

The following graphs were developed by applying the number of Community Support Workers (Australian General Practice Network, 2008) against national data (Australian Bureau of Statistics, 2008 and Australian Government Geosciences Australia, 2005). Figure 7 shows the number of Community Support Workers employed for each state (in red) and the total area of the respective state (in tan) in square kilometres.

Figure 7 : Total State Area (sq. kms) and Number of Community Support Workers

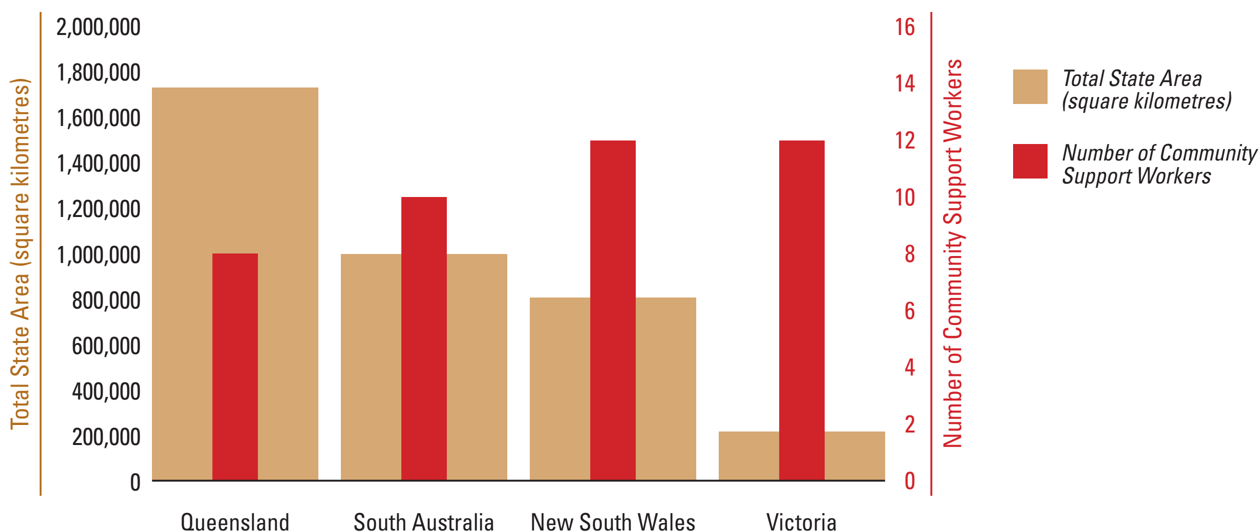


Figure 8 again shows the number of Community Support Workers employed in each state (in red) and the total population for each state (in green). It must be noted that the total area and total population are for the whole state and not for the National Exceptional Circumstance declared areas.

Figure 8 : Total State Population as at 31st March 2008 and the number of Community Support Workers for each state

The individual service data was then mapped onto the matrix which was developed for a paper on mental health that was commissioned for the Garnaut Climate Change Review (Berry *et al*, 2008) (Appendix C). The matrix was simplified to include examples of services for each of the criteria *(Table 2).*

Table 2 : Simplified Matrix which Includes Examples for Each Criteria (Berry et al 2008)

	INDIVIDUAL	HOUSEHOLD	COMMUNITY	REGION
Proactive Primary (Universal)	General information dissemination. *e.g. Posters, bar coasters etc.*	General information dissemination. *e.g. Advertising on cross media forms (radio and TV)*	Initiating community thought and discussion with regard to building resilience through mental health programs. *e.g. Gaining and increasing community knowledge and acceptance of personal position e.g. Mental Health First Aid.*	Encourage businesses to incorporate positive mental health strategies in their planning and management. Identifying, engaging and managing all stakeholder relationships. *e.g. Train the Trainer Mental Health First Aid.*
Reactive Primary (targeted)	Pamphlets and information sheets targeted personally at individuals. *e.g. Personally addressed emails, SMS, letters.*	Targeted intervention or services for identified at-risk individual. *e.g. Household mail outs.*	Whole community is identified as at risk. Building community ownership and leadership with respect to establishment and maintenance of mental health promotional programs. *e.g. Depression Nights.*	Policy and program design specifically for providing assistance for identified at-risk regions. *e.g. Develop tailored regional specific information kits.*
Secondary Prevention (early intervention)	Referral to a mental health professional. *e.g. Relationships Counselling, referral to Mental Health professional.*	Referral to a mental health professional *e.g. Relationships Counselling, referral of whole household to Mental Health professional.*	Actively improving and enhancing access pathways to primary care and other relevant professional. *e.g. Establish playgroup for mother and child wellness centre.*	Increase availability to services, both primary and secondary services. Mobile or outreach generalist health and human services. *e.g. Providing infrastructure i.e. broadband internet access for tele-psychology.*
Tertiary Prevention (treatment and management)	Crisis Counselling. Long Term case management and referral to other medical professionals.	Crisis Counselling. Long Term case management and referral to other medical professionals.	Mapping, coordinating and enhancing local service network. Ensuring community knowledge of same services. Community lobbying for increased services and facilities. Making better use of existing facilities.	Access and availability to mental health services and related services *e.g. Getting counsellors to people or people to counsellors.*

The individual service-style data consisted of 643 entries. Due to the fact that the survey was focused on drought-specific support, the information that was attained was only from the areas that have or are still currently Exceptional Circumstance declared. Therefore, all of the data was limited to the Primary Targeted, Secondary and Tertiary Intervention levels *(Table 2)*. Due to the nature of the supplied services some of the entries mapped in more than one criterion *(Table 3)*. Figure 9 was developed as a result of this mapping and it too has the percentages superimposed on it. The percentage is the score for that criterion against the total data points. This means that there is no one criterion with 100% and the sum of the criteria percentages is not 100.

Table 3 : Matrix - Data Scores (n=643)

	INDIVIDUAL	HOUSEHOLD	COMMUNITY	REGION
Proactive Primary (Universal)	n/a	n/a	n/a	n/a
Reactive Primary (targeted)	0	30	67	0
Secondary Prevention (early intervention)	305	305	305	305
Tertiary Prevention (treatment and management)	546	546	305	305

Figure 9 : Overall Individual Service Type, Distribution and Percentages

	INDIVIDUAL	HOUSEHOLD	COMMUNITY	REGION
Proactive Primary (Universal)	n/a	n/a	n/a	n/a
Reactive Primary (targeted)	N=0 (0.00%)	O N=30 (4.67%)	D,E,F,G,H,I,J,K,L,M,N N=67 (10.42%)	N=0 (0.00%)
Secondary Prevention (early intervention)	A,B N=305 (47.43%)	A,B N=305 (47.43%)	A,B N=305 (47.43%)	A,B N=305 (47.43%)
Tertiary Prevention (treatment and management)	A,B,C N=546 (84.91%)	A,B,C N=546 (84.91%)	A,B N=305 (47.43%)	A,B N=305 (47.43%)

KEY:
(in the top left of each category)

A Phone and Internet
B Support Workers
C Counselling Services
D Field Days
E Rural Workforce Training
F Mental Health First Aid Training
G ASSIST training
H Depression Nights/Sessions
I Australian Drought Bus
J Community Cards
K Pamper Days
L Stakeholder Meetings
M Paddock Tour
N School Talks
O Household Mail Outs

Note 1: There were 643 data points collected over the three months of the survey. Some activities can and have been placed in more than one category.

Note 2: The percentage is of the total number of data points, thus there is no categories with 100% and the total sum of the categories is not 100%.

Discussion

This study has shown that currently there are very limited services available to rural and remote Queenslanders who are adversely affected by climate variability, specifically drought. Critically important service provision is projected to be drastically reduced by 86% as at the 30th June 2009. The reason for this is that funding for Community Support Workers from the Australian Government through the Australian General Practice Network will cease on that date.

Services were unevenly distributed across drought-affected locations. In areas where there were multiple services, these services were supplied by a combination of government, non-government or not-for-profit organisations. While it is encouraging to see multiple services being offered, there was nearly a total lack of coordination of these services. This lack of coordination resulted in community confusion because services were often duplicated and providing conflicting advice and information. In many cases, service providers themselves were unaware of each other, even in relatively small communities. Kenny *et al* (2008) also identified this as an area of concern with the current structure of services. Recommendation 22 of their report specifically addresses this issue: *"Following this audit, strategies must be developed to achieve the most appropriate distribution and allocation of resources and linkages between human service providers, including clear hierarchies to facilitate better region-specific coordination and referral pathways"* and specifically addresses this issue.

As mentioned in the limitations outlined above, the Centre for Rural and Remote Mental Health Queensland has designed a networking and strategic coordination tool, *thefrontgate*. *thefrontgate* is a web-based initiative designed to reduce barriers to mental health services that are created by the vast distances in rural and remote Queensland . With increased levels of broadband service coverage at reasonable prices, *thefrontgate* could become an indispensable tool for consumers and also for suppliers of mental health services, training and information.

Because of the vast areas covered by the Divisions of General Practice in Queensland, Community Support Workers had significantly greater distances to travel than their peers in other states, such as in South Australia, New South Wales and Victoria *(Figure 7)*. Indeed, at around 700,000 square kilometres, the area of responsibility for one individual Community Support Worker is twice the size of the state of Victoria. South Australia and Victoria also have more Community Support Workers per head of total population than does Queensland *(Figure 8)*. Taking distance and population into account, it is not possible for one Community Support Worker to provide consistent, regular, timely support to people in remote areas. Queensland's population and the nature of our rural and remote communities pose a large and unique challenge for the provision of mental health services.

Future investigation and research are urgently required to assess options for providing mental health and related services in rural and remote areas. Such investigations may also identify the type of service and methods of delivery which would be most likely to deliver the greatest success in rural and remote areas.

Because of the significant travel time and the increasing demand for mental health services (this increase in demand is possibly due to an increase in general awareness, increases in community mental health literacy or a general increase in mental health illness), service provision was predominantly reactive. This reactive nature was phrased by both the Social Impact Review and the Productivity Commission Review as a 'Crisis Oriented Approach'.

In terms of the matrix *(see Figure 9)*, service deliverers are overloaded with secondary and tertiary level interventions (counselling, treatment and referral), and cannot provide much needed and, strategically, more important long-term primary intervention (prevention type activities and programs) across their geographical regions *(Figure 9)*.

An emphasis on secondary and tertiary service provision is identified as a 'crisis response' style of service delivery by both Kenny *et al* (2008) and the Productivity Commission (2008). Both reports stipulate that this level of service delivery (both financial and emotional services) is not appropriate when dealing with drought or drying. They propose that resources, both financial and human, must be focused on providing support and encouragement to plan for future periods of dryness. Both reports have proposed a radical policy change for dealing with climate change in rural and remote areas. Their preventative and prepared approach has compelling merit, especially when analysing the current situation and the apparent lack of consistent or coordinated service coverage.

Should the Kenny *et al* (2008) and Productivity Commission (2008) recommendations to move to a more planned approach be implemented, a replication of this mapping study may well show an inverse representation of the data on Figure 9. Preventative planning and service delivery would be expected to have a far greater benefit with regard to social capital building and to the resultant increase in community resilience (Berry *et al*, 2008). It would also be reasonable to conclude that a move in paradigm away from 'crisis response' service delivery would provide an avenue that would enable the establishment of more general and inclusive planning for mental health services into all rural and remote areas, not just those which are declared as being in Exceptional Circumstances (that is, all of Queensland). This would certainly create an improved policy and service framework for rural and remote individuals, households, communities and regions to develop greater resilience and capacity. An increase in capacity would enable these unique communities to deal with adversity with increased proficiency, regardless of the cause of adversity.

Conclusions

All of the latest predictions indicate that Queensland will experience an increase in average temperature. There will also be an increase in the variability of weather patterns. This will result in a greater likelihood of drought or as it is now being phrased, periods of drying (Hennessy *et al*, 2008) or dryness (Kenny *et al*, 2008). The recommendations from the two recent reviews include a move from a 'crisis response' approach to governmental support towards a proactive, preventative and well planned, structured approach. Given all the information available, the Centre for Rural and Remote Mental Health Queensland agrees with the recommendations and considers the following strategies would facilitate the implementation of the recommendations, particularly in the Queensland context. There are very limited mental health services in rural and remote Queensland and short term funding for drought-specific support workers. Despite the limiting aspects placed on clinically trained professionals (Community Support Workers in the current circumstance) such as the geographical size of their regions and the short length of their contracts, they have built links with key agencies in their regions, developed community-specific responses, gained credibility and will have consolidated trust within their respective communities by the time the funding ceases in June 2009.

Instead of losing these valuable resources and assets in the community, it is proposed that the current Community Support Workers, who are clinically trained professionals, would be ideally placed to provide continuity and play a pivotal role in supporting the transitional strategies and recovery planning recommended by the reviews. The current Community Support Workers would continue to be locally-based, contribute to the mapping of existing service networks and facilitate a complete and comprehensive transition strategy.

It is proposed that this transition strategy would be of between 12 and 18 months in duration, with the commencement date being the 1st July 2009 or even sooner. During this time the clinically trained professionals would continue to supply mental health services. However, they would also be required to identify communities, through network mapping, that would derive the greatest benefit from the training of a local person. This local person would facilitate the referral process as well as be responsible for the development of mental health literacy and awareness for that community.

The Centre for Rural and Remote Mental Health Queensland believes that this strategy requires considerable coordination and would provide the following sustainable benefits and opportunities for rural and remote communities:

- Local people who permanently reside in these communities are recruited and trained in mental health literacy and referral pathways.
- Continual maintenance and mapping of the local referral pathways.
- There is a permanent, positive outcome from the Federal Government's mental health initiatives for drought affected communities.
- Establishment of a permanent point of entry into these communities with the provision of a positive feedback loop, which may improve preventative measures in future times of adversity.
- Training of local residents would raise mental health awareness and ensure knowledge of local and regional services for individuals and communities so that they have greater capacity with which to adapt to and survive periods of increased adversity, regardless of the source of that adversity. These individuals will indirectly provide strength, structure and support for the community (Recommendation 6).

The Centre for Rural and Remote Mental Health Queensland would be ideally placed to assist with the following aspects of the transition strategy:

- A vigorous network mapping process to identify the pathways and processes that are currently utilised in specific communities and regions so that targeted services can be implemented in identified locations to maximise their impact.
- The establishment of *thefrontgate*. *thefrontgate* is a networking and strategic coordination tool that is web based. This will enable and enhance the coordination of current and future mental health services and information in rural and remote Queensland.
- The continued coordination of the Queensland Mental Health Advisory Group (Environmental Adversity) and the development of communication pathways into State and Federal governments so that the recommendations and concerns of the Advisory Group have purpose.

The Centre for Rural and Remote Mental Health Queensland acknowledges the effort and commitment of all involved in rural and remote mental health services, training and information distribution. With increased coordination and creative strategies, initiatives and interventions will be developed and implemented which will ultimately be beneficial to individuals, families and communities in rural and remote areas.

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Appendix A

Data Sheet for the Centre for Rural and Remote Mental Health Queensland's Service Mapping Project

- Please fill out the form and return it to Tim (timsaal@crrmhq.com.au) by the 8-8-2008
- Please do not leave blanks, if the requested information is not available, please indicate with a 'n/a'
- Please indicate any current Activities as well as those commencing within six months. (i.e. up to 30 Dec. 08)
- If your program has not started yet, please still include it in your survey.
- The top line of the survey is a **fictional** example filled out in Blue to assist you.

Organisation: (type org. name here)

Location (Town and/or district)	Purpose, Goals/Aims of the Activity or Service (Name of the Project)	Monthly Budget of the Activity	Start date of the Activity			Period of the Activity		
			Day	Month	Year	Days	Months	Years
Toowoomba / Eastern Darling Downs	Mental Health First Aid Training for Farm Advisory	Zero - Funded by Fosters	19	5	2008	2		

If you require more space, please feel free to attach another copy.

Thank you very much for your time. Your input is certainly valued.

Appendix B

The Queensland Mental Health Advisory Group (Environmental Adversity) is comprised of State and Federal Government representatives, mental health service providers, agricultural lobby groups and research organisations. The current members of the Queensland Mental Health Advisory Group (Environmental Adversity) are:

- Centre for Rural and Remote Mental Health Queensland (CRRMHQ)
- AgForce Queensland
- Queensland Farmers Federation (QFF)
- General Practice Queensland (GPQ)
- Lifeline Queensland
- Centrelink
- Queensland Alliance (QA)
- Centre for Rural and Remote Area Health – University of Southern Queensland (CRRAH)
- Department of Families, Housing, Community Services and Indigenous Affairs (FAHCSIA)
- North and West Queensland Primary Health Care (NWQPHC)
- Sunshine Coast Division of General Practice (SCDGP)
- Royal Flying Doctor Service (RFDS)
- Australian Institute for Suicide Research and Prevention – Griffith University (AISRAP)
- Griffith University
- Rural Doctors Association of Queensland (RDAQ)
- Queensland Health, Mental Health Branch (QH, MHB)
- Disability Services Queensland, Mental Health Branch (DSQ, MHB)
- Department of Emergency Services (DES)
- Mackay Division of General Practice (MDGP)
- Capricornia Division of General Practice (CDGP)
- beyondblue
- Ford Health
- Salvation Army
- Sunshine Coast Division of General Practice (SCDGP)
- R-Health
- Queensland Council of Social Service (QCOSS)
- Australian General Practice Network (AGPN)
- Wide Bay Division of General Practice (WBDGP)
- Relationships Australia
- Australian National University (ANU)
- University of Queensland (UQ)
- Queensland University of Technology (QUT)

Members of this group meet quarterly and network regularly via email and telephone.

Appendix C

Typology of interventions and example approaches within each intervention INTERVENTION LEVEL (MICRO TO MACRO)

	INDIVIDUAL	HOUSEHOLD	COMMUNITY	REGION
1. PROACTIVE PRIMARY PREVENTION (UNIVERSAL) *Preventing exposure to climate change risks*	General education, training and personal development (e.g., in schools and adult educational or workplace settings); social skills, individual community participation.	General household strengthening & skills development (e.g., building better relationships; financial management; whole family community participation) using existing services & frameworks; increase participation in community; assist families in tasks of adaptation, problem solving Focus on life-span perspective (eg., children youth, parents, older persons).	Social capital building; cultivating initiatives determined by local communities; broad-based education & community competencies training to achieve community-driven goals (e.g., economic, water or food security); resilience building for hole or parts of community.	Regional economic & social development; encouragement of new businesses, industries, technologies; enhanced general education & skills training; links to other policy areas (e.g., policing, immigration); acceptance and valuing of cultural diversity (e.g., in identifying impacts of climate change on all members of the community); identify potential impacts on ATSI people; role of media and local government in promoting adaptation to change. Planning how to use media for public awareness. Managing stakeholder relationships.
2. REACTIVE PRIMARY PREVENTION (SELECTIVE) *Preventing MH symptoms from developing as a result of exposure*	Specific MH education, training and personal development (e.g., in schools, adult educational or workplace settings); vulnerable persons targeted.	Specific household-based MH education & skills development (e.g., dealing with adversity, coping skills) using existing services where possible; vulnerable households targeted.	Engagement of broad range of health and human services sectors in mental health promotion programs. Build community leadership in these programs. Community-based mental health promotion, MH literacy, awareness raising; enhance or coordinate health & social services; identify service gaps; train service providers. Vulnerable communities targeted.	Policy & program design, develop information kits, enhance or maintain health & social service infrastructure; fund or advocate for new services. Link in with State and Federal governments. Coordination of emergency services sector, rural assistance agencies. Use of media for public awareness. Vulnerable regions targeted.
3. SECONDARY PREVENTION (INDICATED) Early intervention to treat symptoms in early stage	Targeted individual crisis intervention or support, for practical (e.g., alternative housing, food, “beyondblue drought line”) or MH needs, counselling.	Targeted household crisis intervention or support, for practical (e.g., alternative housing, food, “beyondblue drought line”) or MH needs, counselling. Build community confidence in health and human services, Programs to overcome stigma of mental health Innovation in outreach programs.	Screening & early identification (e.g., in schools, childcare, police, primary health services); funnelling rapidly into local services; follow-up to prevent relapse or worsening. Engagement of gate-keeper or front-line agencies in improved pathways to assistance; build capacity for intersectoral collaboration in improving access to services; engagement with primary care (GP sector).	Increase availability of effective, low-cost, easy to deliver interventions (e.g., CBT) when needed; regional mobile or outreach services; increase capacity of generalist health and human service sector to provide basic mental health care when needed across all age groups and build greater links across primary and secondary service sectors. Ehealth initiatives.
4. TERTIARY PREVENTION Managing psychiatric disorder	Professional or medical assistance, long-term case management.	Professional or medical assistance for household with member/s with ongoing MH problem, respite options for carers, long-term household-based case management.	Community level arrangements for integrating & preventing isolation of people and households living with MH problems; alternative employment; long-term options for meaningful structuring of time for those unable to manage paid employment; opportunities for those with MH problems to participate, to (be seen to) contribute to community; role for and valuing of people with MH problems and their carers.	Regional services – full spectrum of health services to include recovery programs with enhanced community based services; increase support to people with MH problems and their carers to overcome isolation, self-help and support groups within range of multiple communities; anti-MH stigma education; options for extremely remote locations (e.g., video-conferencing; telepsychiatry). Use of media for public awareness.

**Centre for Rural & Remote
Mental Health Queensland**

18-26 Cannon Street, Manunda
Cairns Queensland 4870
Phone: (07) 4032 6700
Email: info@crrmhq.com.au
Fax: (07) 4032 6701

www.crrmhq.com.au