Telemedicine in the Public Sector in South Africa: An Overview

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National Health Insurance

Supporting rural patients
Access to scarce specialists
Telemedicine and the NHI?
Current Public Sector TM?
Countrywide, 56% of doctor posts are vacant and 46% of nursing jobs unfilled.
Telemedicine in SA – Public Sector

Linking CT Scanners – 1990s

National Telemedicine System -1999

29 sites

Teleradiology

Telepathology

Tele-ophthalmology

Tele-ultrasoundography

Failed
2008 Telemedicine Audit

86 sites – 32 Active (Sites not services)

55 ISDN based videoconference
18 teleradiology
4 teleconsultation
9 telespirometry / ECG

No data on use, other store & forward services or tele-education
Telemedicine in SA – Public Sector

1999 National TM System – 28 sites

2008 NDOH – 86 sites, 32 active

2011 - 2,839 health facilities – 21 TM services

What is the current status?
2014 Telemedicine Audit

- Questionnaire – Provincial co-ordinator
- Provincial DOH Annual reports, Strategies and Plans reviewed
- Literature review of TM in South Africa focusing on TM in the public sector
- Triangulation of data
2014 Telemedicine Audit

Questionnaire

• Telemedicine infrastructure
• Services offered
• Use of services
• Administration and management
  Budget and posts
• Planned activity
2014 Telemedicine Audit

- Western Cape and Guateng no person
- Eastern Cape, Free State and Northern Cape – no response
- Limpopo, North West, Mpumalanga and KwaZulu-Natal – response

Only 4 of 9 Provinces responded
Western Cape

1999 NTS – no implementation
2008 – no activity
Annual Reports 2008/2009 to 2012-2013
No mention of telemedicine
Teleradiology – PACS & RIS – 3 hospitals
Delays at 4 other hospitals
North West

1999 NTS – 3 sites S&F tele-radiology & VC
2008 – 6 sites CT scans digitised – private
  5 of these had VC
Annual Performance Plan 2011/2012 - PPP
2014 – VC not used
11 Clinics (MRC) – connectivity problems
  No budget for TM, posts, or support
KwaZulu-Natal

1999 NTS – 9 VC sites ultrasound & ophthalmology
2008 – 34 VC & 9 teleradiology CT & MRI
Annual reports 2009 to 2013 – 37 VC sites
2012/13 – establish tele-autopsy site
Annual Performance Plan 2013-16 - 47 VC
4 Posts – no budget
Literature Review

Telemedicine in South Africa

470 papers
361 after removing duplicates
170 after checking relevance
44 reported telemedicine in public sector
  8 on 3 dermatology services
  6 on 2 ophthalmology services
  5 on 1 pathology
2014 Audit – Services Reported

radiology    pathology
dermatology  psychiatry
ophthalmology orthopaedic surgery
audiology    paediatrics
trauma       tele-ecg
telespirometry burns
teleconsultation tele-education
## 2014 Audit – Telemedicine Sites

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<th>LP</th>
<th>MP</th>
<th>NW</th>
<th>KZN</th>
<th>EC</th>
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<td>42(11)</td>
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## 2014 Audit

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2014 Audit

Telemedicine sites

State Hospitals 131 / 433
State Clinics 79 / 3075
State Clinics to be installed 69

Very limited data on use
No data on informal referrals
Current TeleHealth Services

No central repository of services
DOH refers to telemedicine sites with focus on infrastructure and not use
If audit is taking place it is not reported
Limited or no data on informal consultation by email or cell phone
No data from private sector
mHealth Activity

http://www.mobileworldlive.com/mhealth-tracker
mHealth Activity
Tele-education – UKZ-N

Number of VC bookings vs Total Hours of VC

Year: 2001 to 2013
Where Are We?

Governance issues are being addressed
Need buy-in at Provincial DOH level
Need to: evaluate and monitor
report and publish
understand the private sector
Spontaneous telemed services starting
Develop an enabling environment
Raise Awareness
No prior scans available for comparison. In my experience such an appearance warrants urgent surgical intervention.