

1st Singapore Resuscitation Academy Public Access Defibrillation Update 2016



Presented by

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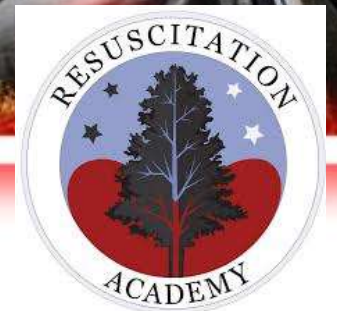
Chief Medical Officer, Ministry of Home Affairs

Ex-officio, Registry for AED integration

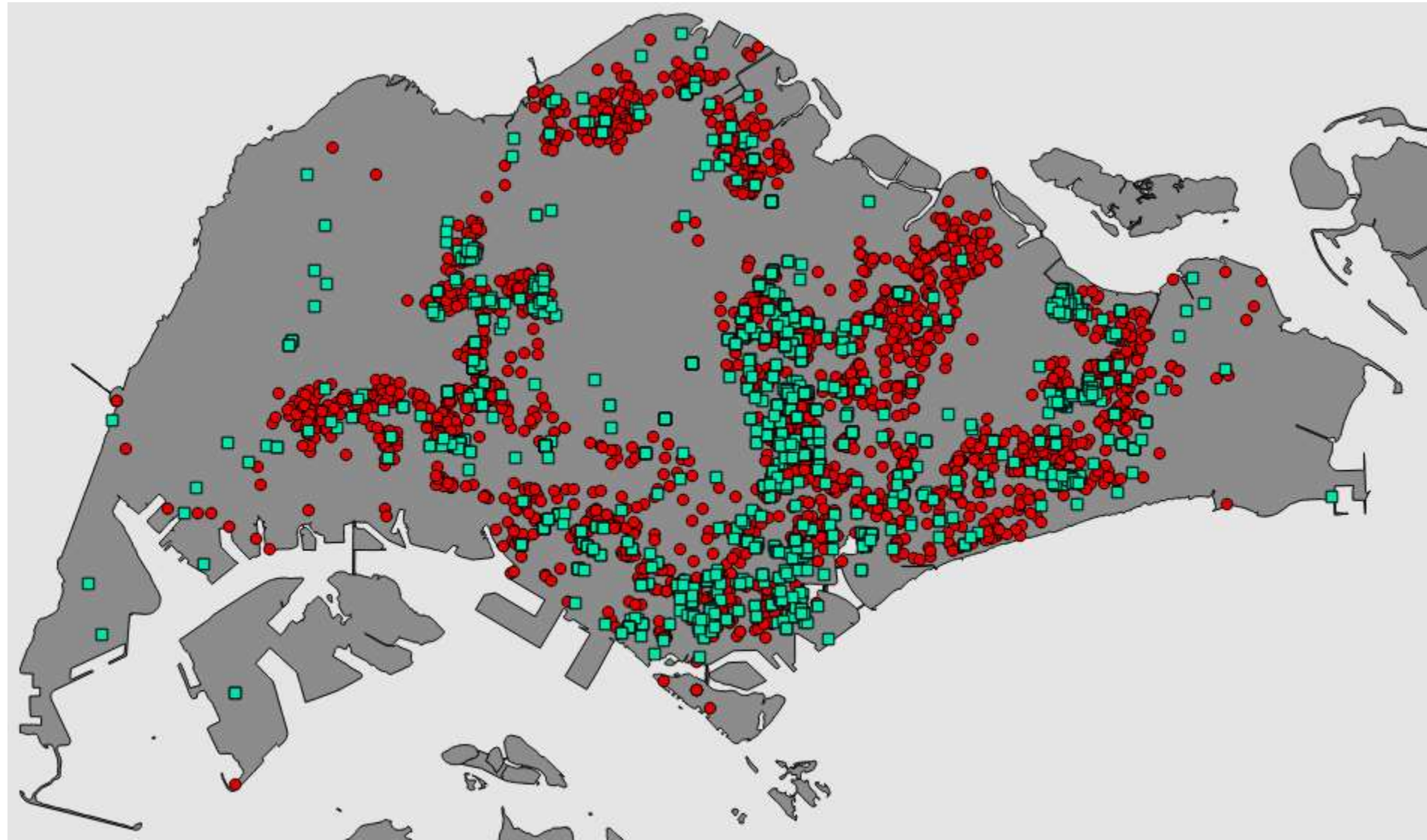
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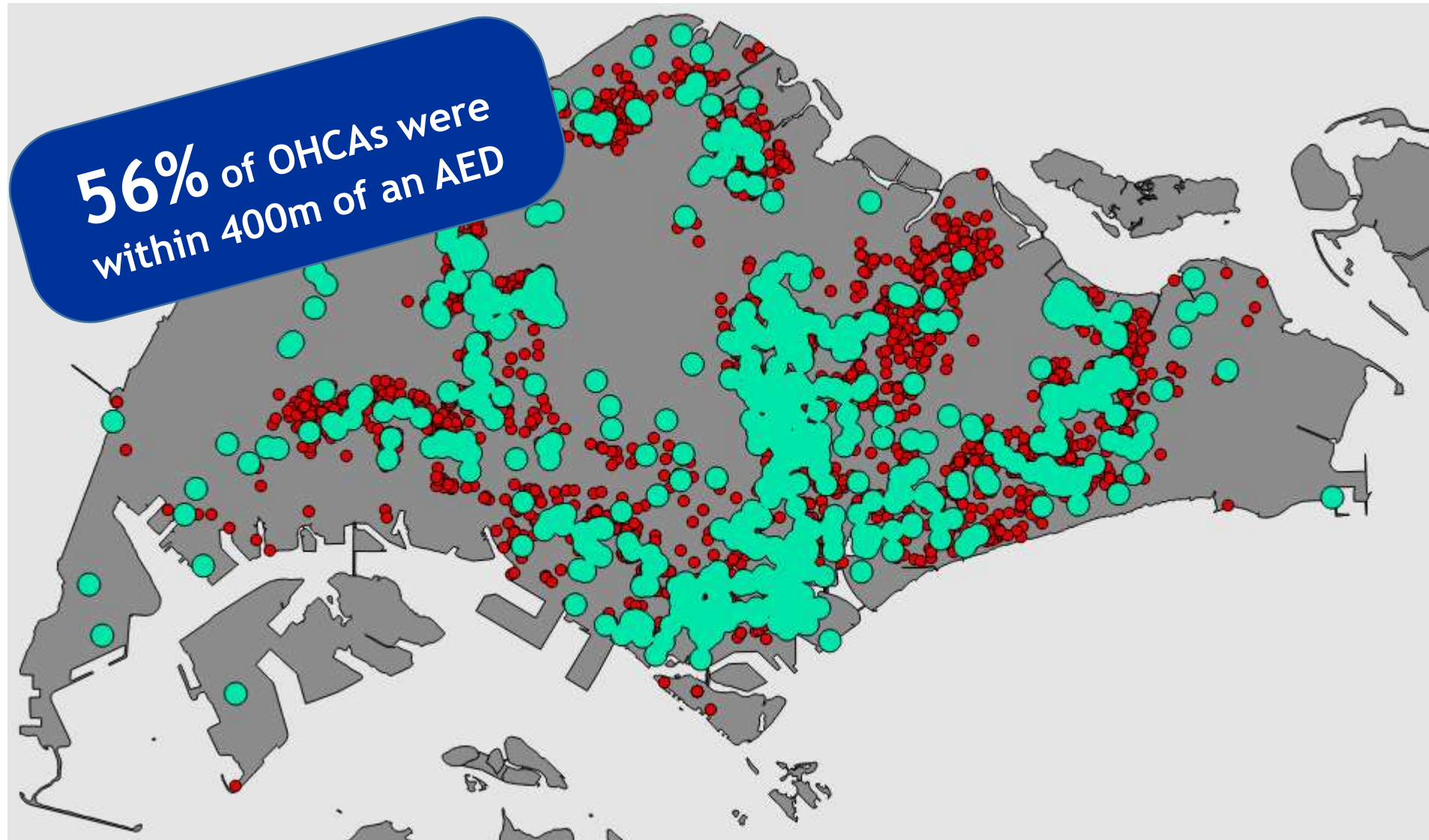


OHCA and AED Locations in Singapore



On paper, it seems like we have great coverage

56% of OHCAs were within 400m of an AED





Housing (71.4%)



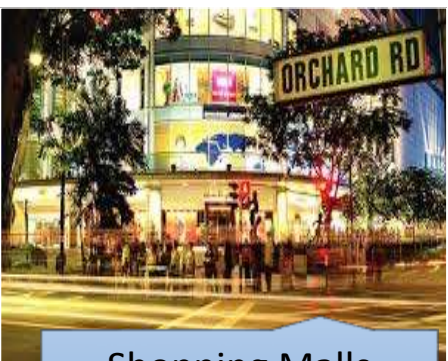
Vehicles (7.1%)



Medical Facilities
(5.9%)



Offices (2.8%)



Shopping Malls
(2.4%)



Roadside (2.4%)



Sports Facilities
(1.6%)



Community Clubs
(1.4%)



Checkpoints (1.0%)



Hotel (1.0%)



Transport (0.9%)



Schools (0.7%)

How many AEDs are there in Singapore?

- Guesstimate by experts 4000 – 8000
- R-AEDi today still only has 2000+ AEDs on the registry

Schools to get 149 defibrillators as facilities are opened to public

149 defibrillators for users of fields, sports halls in sports council scheme

Published on
Mar 26, 2013
9:02 AM



17

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Dumhaea thic



An automated external defibrillator being used on a dummy in a demonstration. Members of the public now have access to the device. – PHOTO: LIANHE ZAOBAO

Defibrillators for all SAF camps soon

From June, the life-saving devices will be kept in common areas for easy access

Published on
Mar 31, 2013
9:19 AM



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SAF camps and bases will be progressively equipped with public access automated external defibrillators. The Singapore Armed Forces (SAF) is planning to put automated external defibrillators in all camps from June this year. -- FILE PHOTO: MINDEF

By Jermyn Chow Defence Correspondent

The Singapore Armed Forces (SAF) is planning to put automated external defibrillators in all camps from June this year.

Makes a



EMBA

And yet, only 1% are
shocked with a Public
Access Defibrillator.
Why?

You can try
and
improvise...



**“You got a better idea? The paddles are
BROKEN. Just turn the key.”**

Or have a real strategy....



The Registry for Automated
External Defibrillator Integration

Integration of
AED use into
EMS



Install
where
OHCA
happens

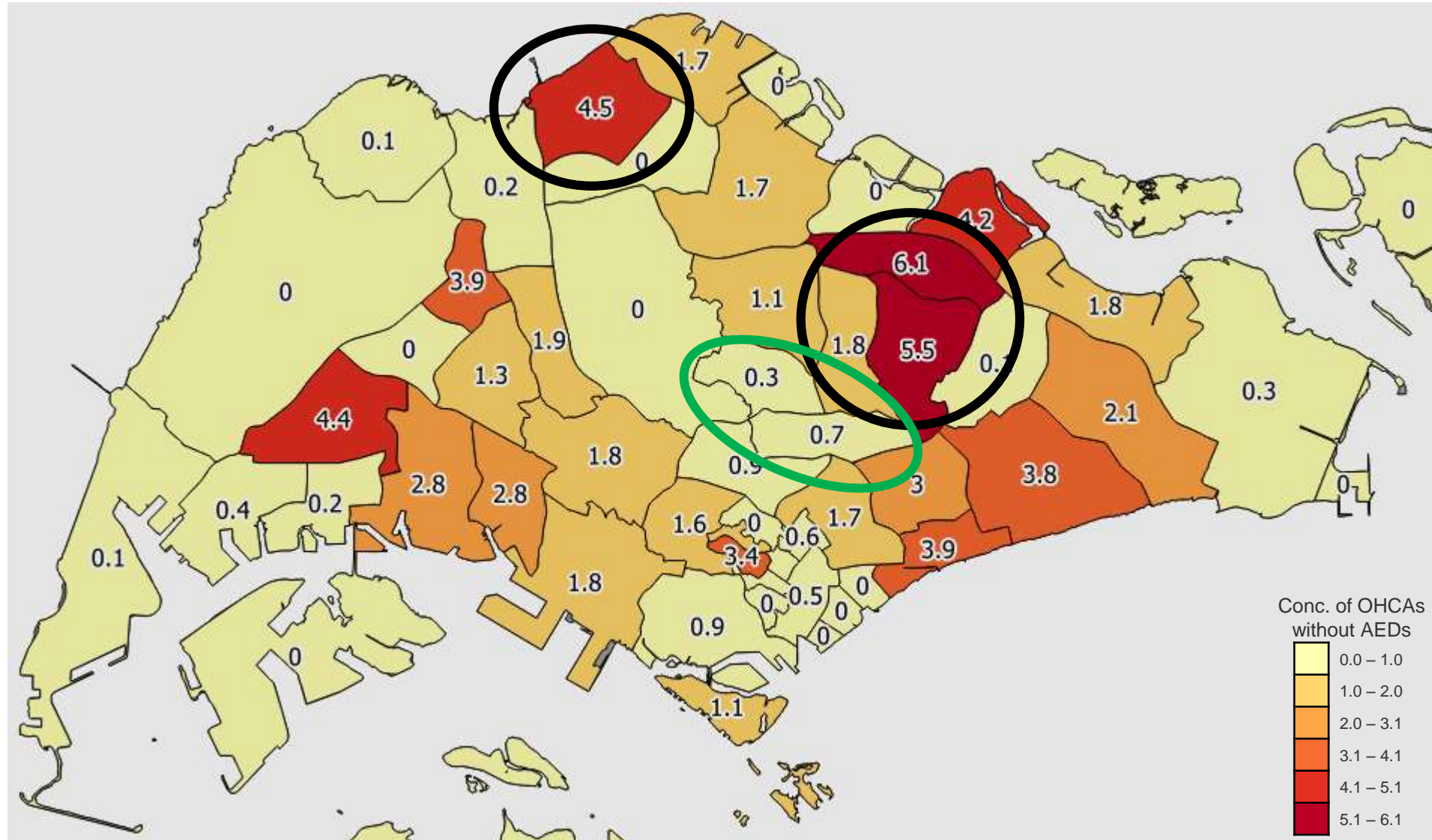


Promote
standardization
& maintenance



Promote
active
citizenry

Identify areas of OHCAs with low AED coverage (black)

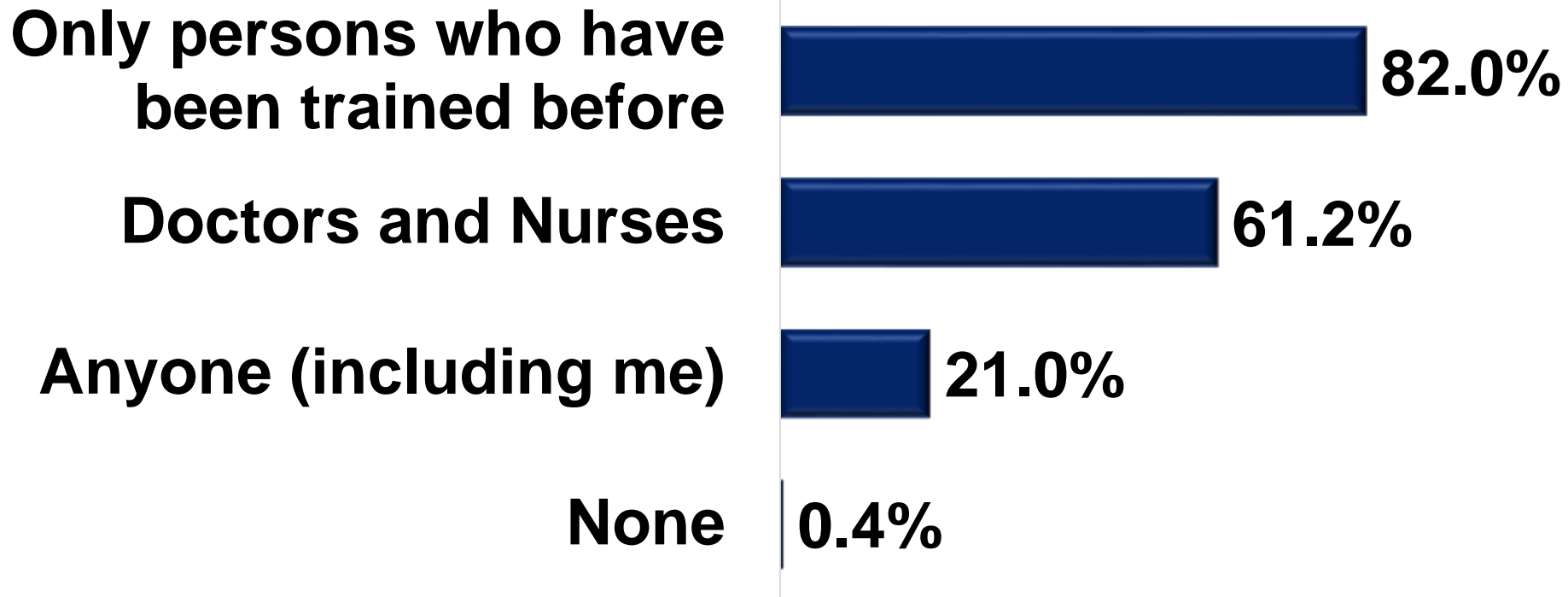


What percent of Singaporeans recognise what this sign means?



54%

Who is allowed to use a Public Access Defibrillator?



Total Sample: n =1,001

Cardiovascular Perspectives

Can You Find an Automated External Defibrillator If a Life Depends on It?

Raina M. Merchant, MD, MSHP; David A. Asch, MD, MBA

Every year, approximately 300 000 Americans have an out-of-hospital cardiac arrest, and survival rates are dismal—approximately 6.4%.¹ Automated external defibrillators (AEDs) can restart the heart and provide life-saving audible cardiopulmonary resuscitation (CPR) instructions to aid victims. For patients with ventricular fibrillation, rapid defibrillation with CPR can improve chances of survival to more than 50%.²⁻⁴ AEDs can be easily and effectively used by untrained laypersons and are located in public places such as airports, recreation centers, banks, casinos, churches, gyms, and schools.⁵

Despite the life-saving potential of AEDs, they are of no value if they cannot be located and brought to the victim. Further, there is no US map of AED locations, nor do we even know where all the AEDs are located. Devices are purchased by distributors who then sell them on the Internet, in bulk, or individually. AED registration is the responsibility of the

walked past daily and yet never sufficiently register in memory to be recalled when needed. With current technologies, we can do better. Imagine instead an Internet and mobile-media based nationwide map of those devices. Such a Google-style map could easily be read from a smart phone application that would automatically note the location of the rescuer's phone and the location of nearby AEDs to direct the rescuer to the nearest one. This application (app) could be preloaded on the phone or the information could be embedded in other apps used routinely to locate resources, people, or directions. A bystander calling 911 could also be directed to an AED located by emergency dispatchers: "Emergency medical personnel are on their way. Continue chest compressions. There is an AED in the nearby bookstore, just at the checkout register. If available, send someone who is not performing chest compressions to retrieve the AED."

www.raedi.sg



R-AEDI

The Registry for Automated
External Defibrillator Integration



Verify, Map and Educate

National AED Registry



The SCDF myResponder App

myResponder

SCDF
The Life Saving Force

myResponder App

Available on the
App Store

ANDROID APP ON
Google play



AED

BLK. 517

DEFIBRILLATOR
ZOLL

- “The intention is that *by 2019*, this will be rolled out to all constituencies, in all HDB estates.”
- The SCDF Workplan Seminar 2016 - Speech by **Mr K Shanmugam**, *Minister for Home Affairs* and Minister for Law - 06 May 2016

SCDF HDB Save-A-Life Initiative

B TRAGIC HOLIDAY SINGAPOREAN DROWNED IN ITALY B13
BREADTALK STERN WARNING FROM CASE B16

HOME



SNAPPED BY COURIER
NO CUSTOMER PHOTO
NEEDED: SINGPOST B18

Ensuring help is nearby to save a life

SCDF app lists AED locations, alerts CPR-trained volunteers when someone has cardiac arrest

Ng Huiwen

When business adviser Martin Wong was called to assist a man seen vomiting and perspiring at a food centre in June, he feared the man was suffering a heart attack.

Mr Wong, who is trained to give cardio-pulmonary resuscitation (CPR), ran 400m from his Republic Plaza office to Golden Shoe for what turned out to be a false alarm.

"I was aware that every second counts and performing CPR quickly can really save lives," he said.

The 44-year-old was alerted by the Singapore Civil Defence Force's (SCDF) myResponder app, which calls qualified volunteers to suspected heart attack cases until emergency services arrive.

It is part of SCDF's Save-A-Life initiative, which was officially launched yesterday by Deputy Prime Minister Teo Chee Hean, who placed an automated external defibrillator (AED) at a Pasir Ris block.

Save-A-Life aims to increase the survival rate of cardiac arrest victims by building a network of trained community responders.

"Having the 'heartware' is to make sure we have community responders who can react to an emergency," said DPM Teo, who is also Minister for Home Affairs.

The SCDF's chief medical officer, Dr Ng Yih Yng, said the myRespond-



er mobile app is the "first of its kind on a national level" to be integrated with the SCDF's emergency dispatch and ambulance services.

"When someone calls 995, we can send out an alert to people within 400m of the cardiac arrest case and they will be able to help," he added.

AEDs listed on the app are drawn from National AED Registry, which was created by the Singapore Heart Foundation (SHF) and SCDF in

April. There are about 800 AEDs on the registry now and although other unofficial lists contain more, Dr Yih said those on the registry are publicly accessible at all times and that data is kept updated by SHF together with business owners.

The move was welcomed by Pasir Ris resident Chen Ruiqi, 41, whose father-in-law collapsed and died of a heart attack in 2003. She could not help then, but has since gone for

CPR-AED skills training. "With the AEDs now available at the HDB blocks and residents going for training, I feel more confident to help if an emergency happens," she said.

There are currently 160 AEDs in the lift lobbies of HDB blocks in six constituencies, including Pasir Ris West. SCDF plans to increase the number in these areas to about 400 by 2017. Ultimately, it hopes to have one AED for every two to three

HDB blocks nationwide.

Individuals trained in CPR and AED use can register as community first responders on the app.

The public can also submit photos of AEDs with "geo-tagged" location data if they find new locations not in the registry. The SHF will approach AED owners for permission before listing them on the registry.

nghuiwen@sph.com.sg

DPM Teo Chee Hean at yesterday's launch of the Save-A-Life initiative, which aims to build a network of community responders.

ST PHOTO
MATTHIAS HO

Taxi with AEDs

“If you can’t get the AED, we can bring the AED to you!”



SINGAPORE

Automated External Defibrillators installed on 100 SMRT taxis

The initiative is part of a three-year pilot programme called SMRT-Temasek Cares AED on Wheels, which aims to increase the availability of AEDs within the community.

POSTED: 27 Nov 2015 21:43 UPDATED: 27 Nov 2015 23:59

VIDEOS PHOTOS



SMRT taxi driver Simon Ngiam Shu Leng with the AED which will be installed in his taxi. (Photo: SMRT)

Loan an AED

- Started in 2015
- 5 AEDs
- Non-commercial events
- At least 2 pax must go for introductory training



AED LOAN PROGRAMME

Are you holding an event which requires an Automated External Defibrillator (AED)?
Loan it from us at ZERO cost!

For more information, visit

www.myheart.org.sg

Feel confident, knowing that your event is heart safe.

Why should I loan an AED?

- ✓ The venue lacks an AED & the organiser cannot afford to purchase it
- ✓ Attendees may be at risk of a cardiac arrest
- ✓ Large-scale event with more than 50 participants

Type of events that require an AED on-site:

- ✓ Community events
- ✓ Company / School events
- ✓ Activities for elderly participants
- ✓ Large events / gathering with more than 50 participants
- ✓ Sporting or athletic events

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Supported by:



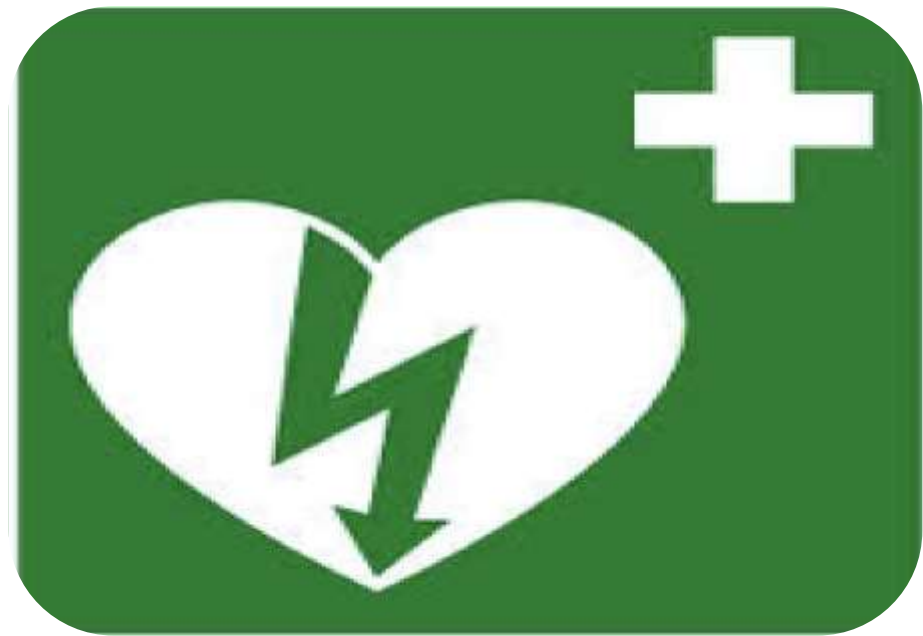


<http://www.myheart.org.sg/article/heart-safe-singapore/aed-loan-programme/aed-loan-programme/403>

Standardisation



AHA AED
signage



European AED
sign

Direction arrows and Signages



Directions
(with distance)



'3D' signs

Accessible and Viewable



Don't lock it!



Don't use a metal box!

More Accessibility issues



WARNING - ALARM SYSTEM

AED to be used by authorized personnel
approved by the mall management only.

For assistance, please call 67536990

AMC_{USA}

SCHEIBER



**Don't hide
it in the
corner!**

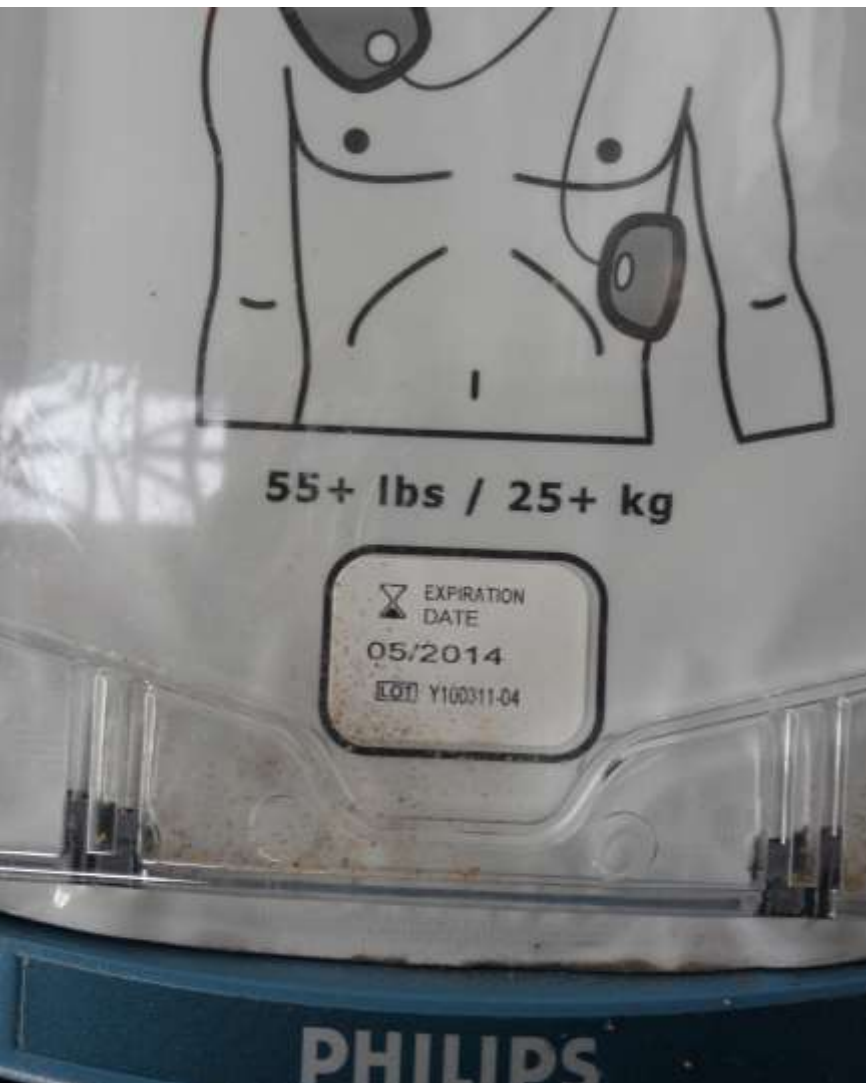
Don't forget to
ask for a loan
set when
servicing is
needed!



SHF staff
checking on
maintenance
and providing
decals to put
useful
information

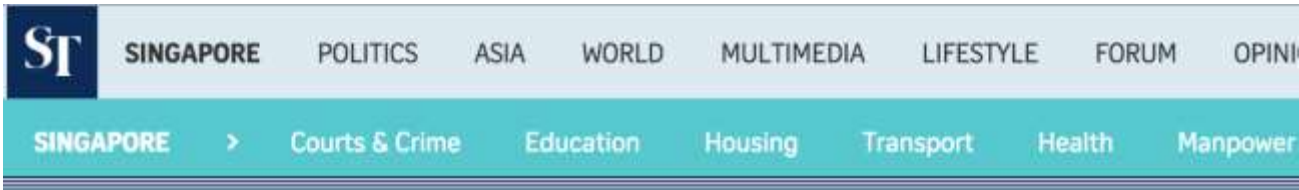


120 out of 1698 AEDs (7%) checked by Singapore Heart Foundation were faulty



Success Stories

Outside Spectra Secondary School



In this series of screengrabs from a video posted on Facebook by user Robin Sim, the off-duty paramedic checks for a pulse before performing CPR on the jogger. -- PHOTO: ROBIN SIM/FACEBOOK

Mr Jusman



Bouquets

Duo saved husband's life

ON SUNDAY evening, my husband was playing football at the field at Bedok South Secondary School when he collapsed and became unresponsive.

People came to his aid and two of them, Military Expert 2 Gerald Tan Sheng Hong and Master Warrant Officer Royston Low, successfully resuscitated my husband using cardiopulmonary

resuscitation and an automated external defibrillator.

The doctor at Changi General Hospital said the duo's timely application of their life-saving skills kept my husband alive until the ambulance arrived.

My husband is now under observation in the Intensive Care Unit. I thank ME2 Tan and MWO Low for bringing him back to me. My family and I are extremely grateful to them.

People came to his aid and two of them, Military Expert 2 Gerald Tan Sheng Hong and Master Warrant Officer Royston Low, successfully resuscitated my husband using cardiopulmonary resuscitation and an automated external defibrillator.

Enhancing
Community
Responsiveness

Duo saved husband's life
ON SUNDAY evening, my husband was playing football at the field at Bedok South Secondary School when he collapsed and became unresponsive.

What's ahead?



New AED placement standards

- Siting
- Maintaining

Enhance AED legislation

- Workplaces
- AED maintenance

Crowdsourcing (Stomp an AED!)

- AEDs locations
- fault reporting

Get your CPR trained colleagues to download it

23:51 98%

Dashboard

REGISTERED RESPONDERS: **8583**

RESPONSES TO CASES: **1105**

CASES IN SEP: **319**

JUN: 426 | JUL: 499 | AUG: 424

RECENT CASES

995 AED

2:29 pm 100%

Case

CASE DETAILS

Accept

🕒 3/6/2015 6:08:51 PM

📍 MAPLETREE BUSINESS CITY
10 PASIR PANJANG ROAD SINGAPORE 117438
#01-10

On the right side of the entrance

👤 Female in her 30s

👤 0 Rescuer(s) at scene

995 AED

2:12 pm 88%

AED

Mouth Elizabeth Medical Centre

- ♥ Inside the Consultation Room
- ♥ In Treadmill Room
- ♥ At Treadmill Room

995 AED

Towards Vision 2025, A Nation of Life Savers



Questions?