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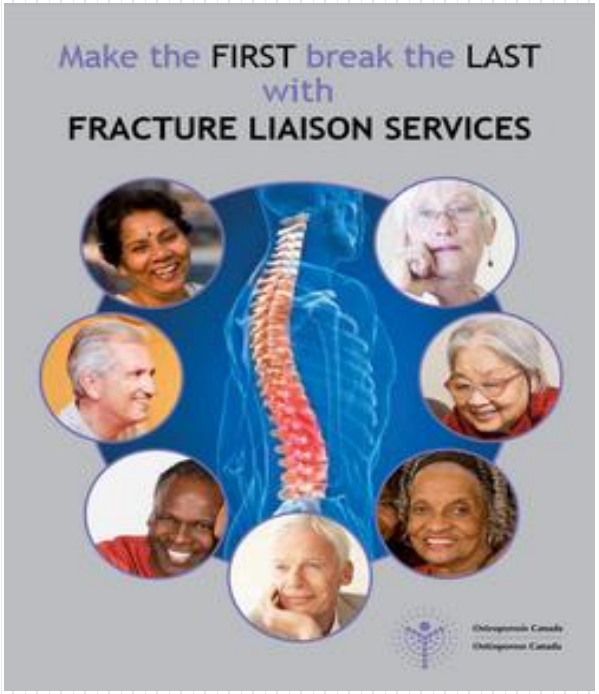
FLS Forum 2017



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FLS around the world

Paul Mitchell

Managing Director, Synthesis Medical NZ Limited
Chair, Board of Trustees, Osteoporosis New Zealand
Adjunct Senior Lecturer, University of Notre Dame Australia

25th February 2017
Osteoporosis Canada, FLS Forum 2017

Crowne Plaza Toronto Airport Hotel, Toronto, Canada

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To Dorcas' point …

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‘*We are not here to comment upon the world,*

We are here to change it’

Professor David Marsh
President - Fragility Fracture Network
1st FFN Global Congress
6th September 2012, Berlin, Germany

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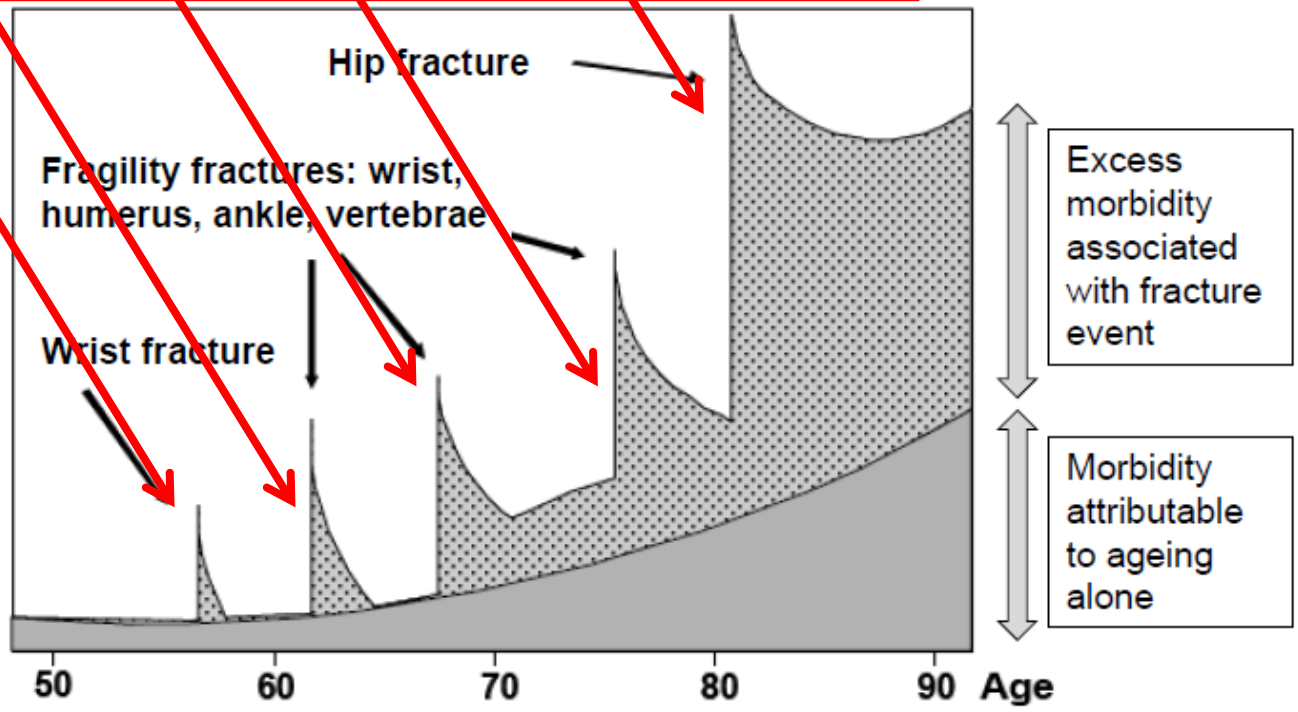
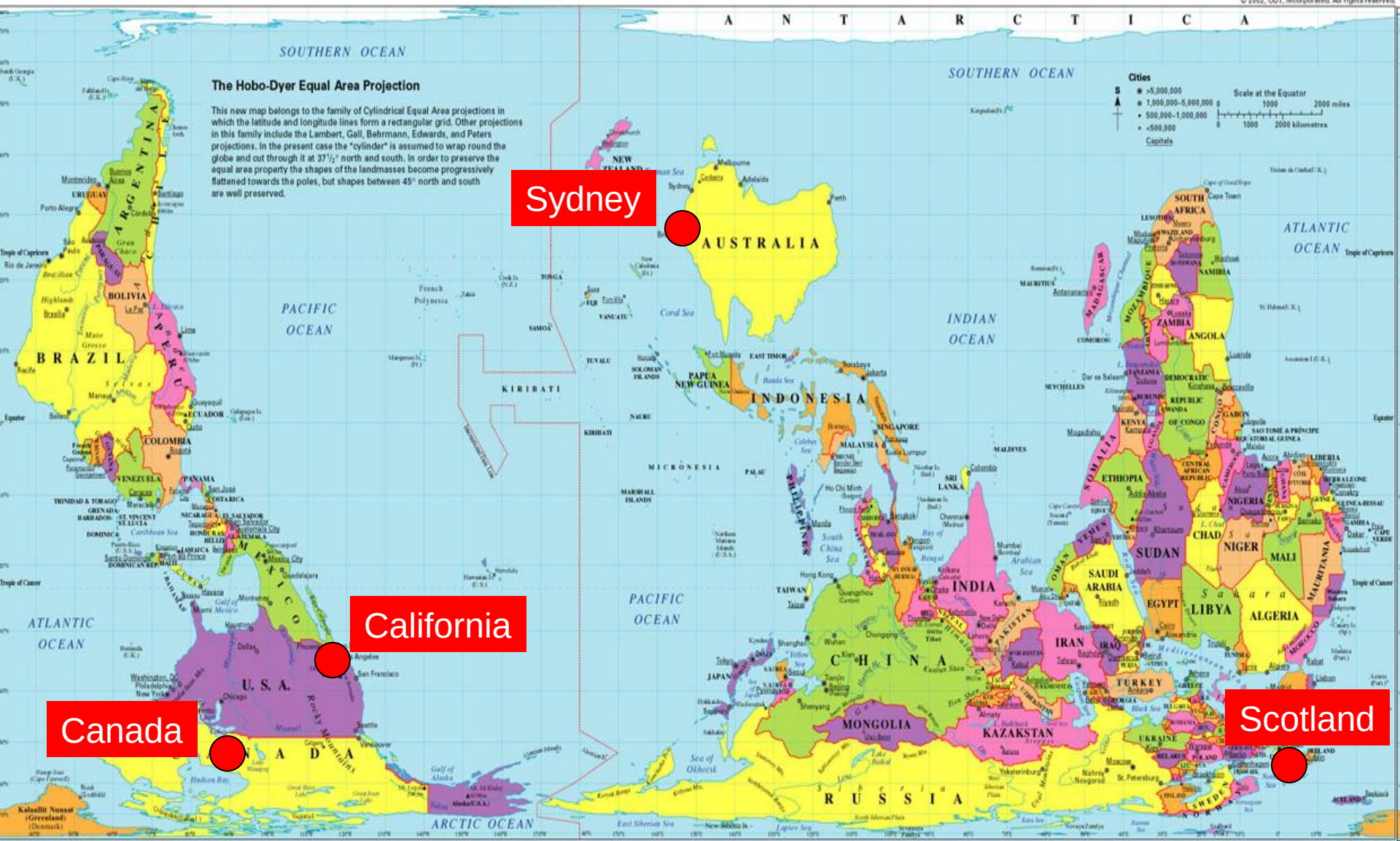
Opportunities for intervention



'Hip fracture is all too often the final destination of a thirty year journey fuelled by decreasing bone strength and increasing falls risk'[2]

1. *J Endocrinol Invest* 1999;30:583-588 Kanis JA & Johnell O
2. *Osteoporosis Review*. 2009;17(1):14-16 Mitchell PJ

Fracture Liaison Services
A local solution to a global problem



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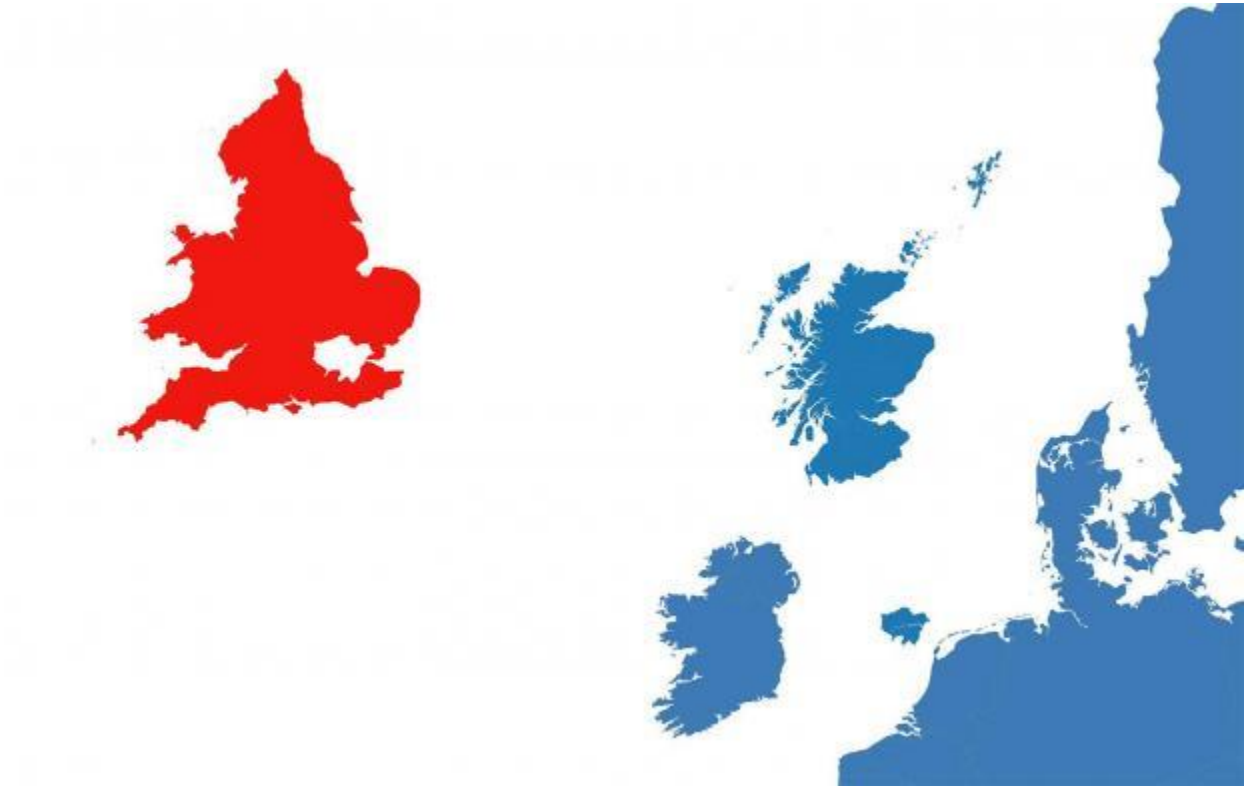
United Kingdom

The Formerly United Kingdom



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The Glasgow Model: The first UK FLS Centre of Excellence

- Offer assessment to all patients over 50 years presenting with a fragility fracture
- Glasgow FLS is delivered by a Nurse Specialist supported by a Lead Clinician in Osteoporosis
- Nurse Specialist identifies patients with new fragility fractures:
  - admitted to the orthopaedic inpatient ward, and
  - managed as outpatients through the fracture clinic
- The Nurse Specialist arranges attendance of appropriate patients at the “one stop” FLS clinic where BMD is measured by DXA to assess future fracture risk
- Treatment for secondary fracture prevention initiated by the FLS when merited on basis of future fracture risk
- Older patients, where appropriate, are identified and referred onto the falls service/falls pathway
- **Long-term management plans agreed by protocol with local general practice**

1. *Best Prac Res Clin Rheum* 2005;19:6:1081-1094 Gallacher SJ
2. *Osteoporosis International* 2003;14(12):1028-1034 McLellan AR et al
3. *Calcif Tissue Int* 2007;81:85-91 Langridge CR et al

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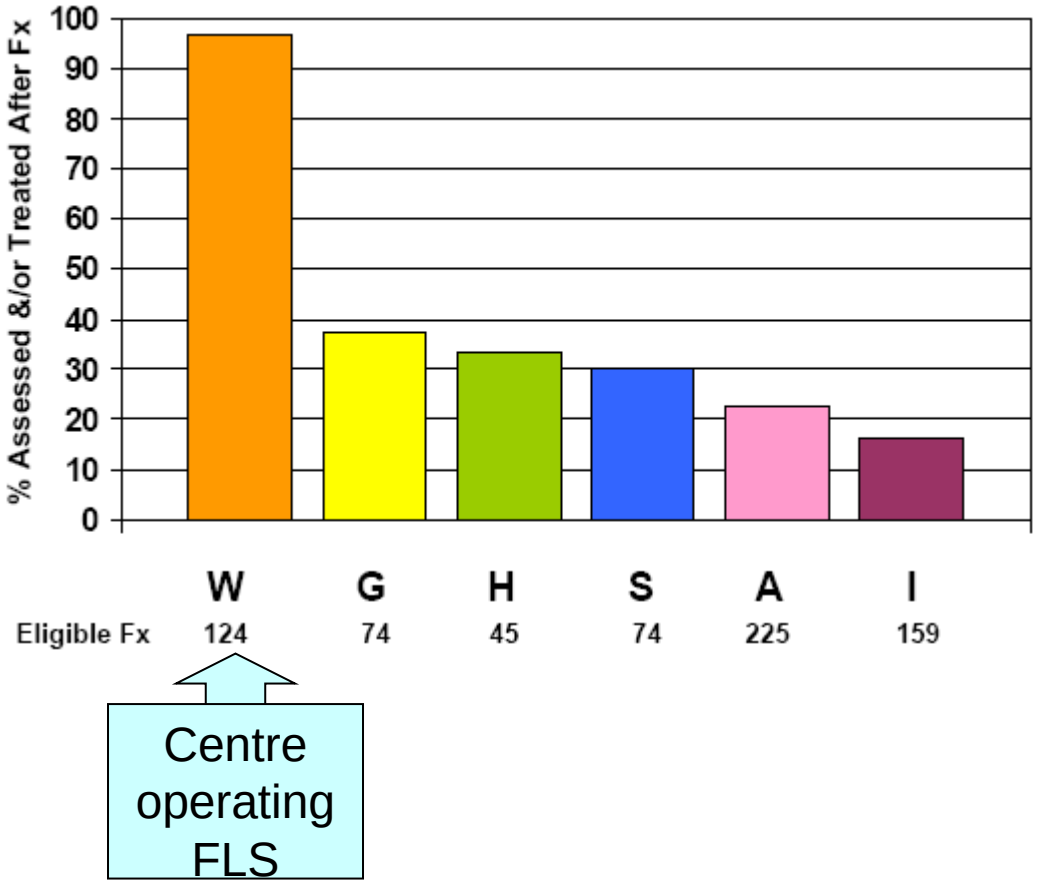
NHS Quality Improvement Scotland national audit
FLS vs other models: Outcome after hip fracture by centre



NHS Quality Improvement Scotland. Effectiveness of Strategies for the Secondary Prevention of Osteoporotic Fractures in Scotland. 2004. McLellan AR et al.

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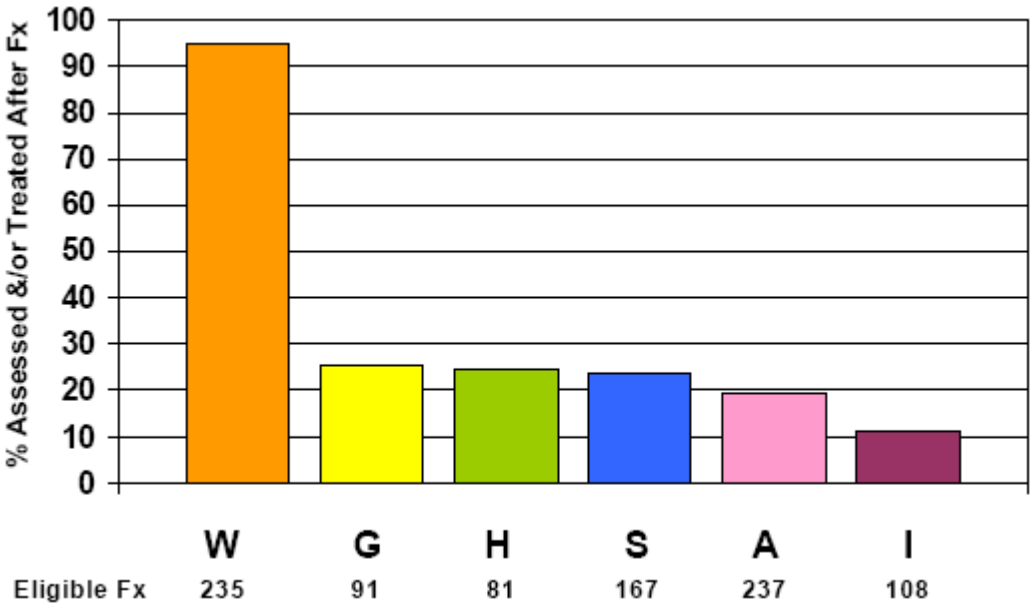
NHS Quality Improvement Scotland national audit
FLS vs other models: Outcome after <u>wrist</u> fracture by centre



Centre operating FLS

NHS Quality Improvement Scotland. Effectiveness of Strategies for the Secondary Prevention of Osteoporotic Fractures in Scotland. 2004. McLellan AR et al.

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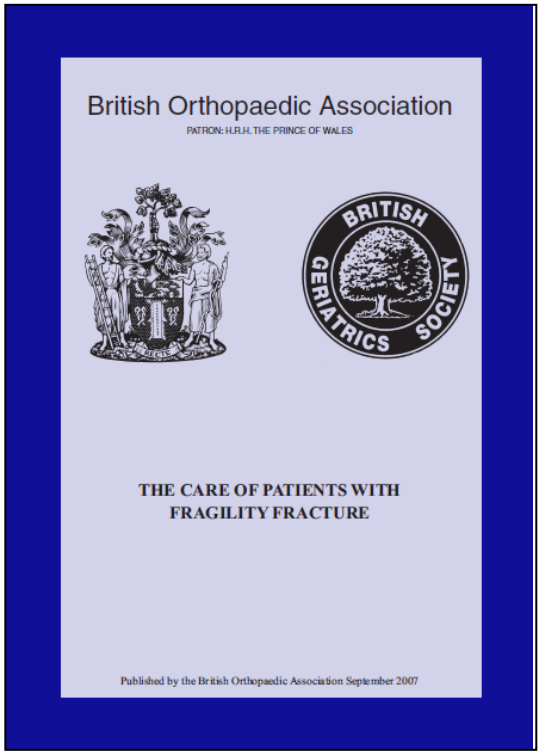
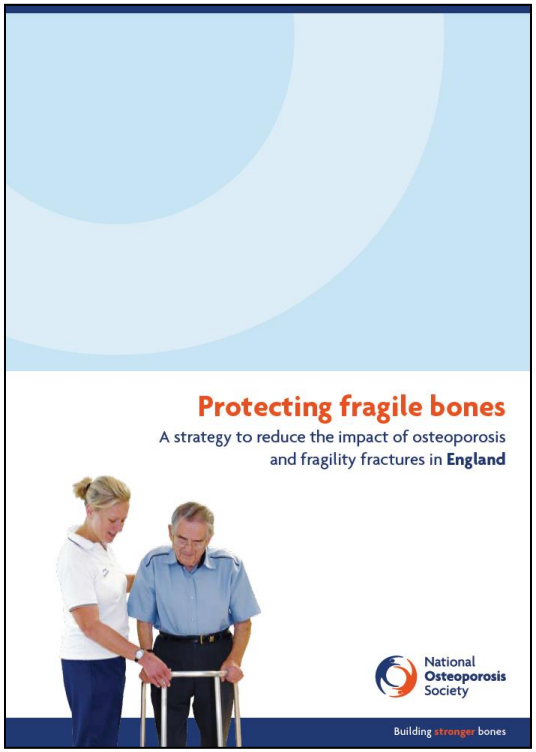
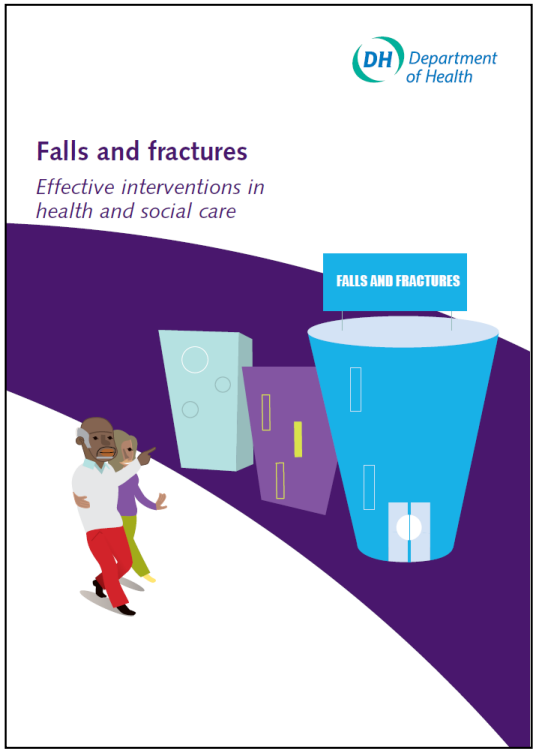
Hip fracture care and prevention in the UK
A consensus on a systematic approach



Professional organisations



Patient society



Policy makers

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Adoption of FLS across the UK

The NOS Manifestos for England/Scotland/Wales/N.I.

Five challenges

1: The management of falls, fragility fractures and osteoporosis

The challenge:

We want a Fracture Liaison Service linked to every hospital that receives fragility fractures, to ensure that every fragility fracture patient gets the treatment and care they need.

4. **The indicators that influence primary care**
   We want healthcare professionals working in primary care to be offered meaningful financial incentives to find and treat those at a high risk of fragility fracture.

5. **Public awareness and education**
   We want measures to improve understanding of bone health amongst individuals of all ages, with positive messages communicated in schools.

http://www.nos.org.uk/NetCommunity/Page.aspx?pid=818

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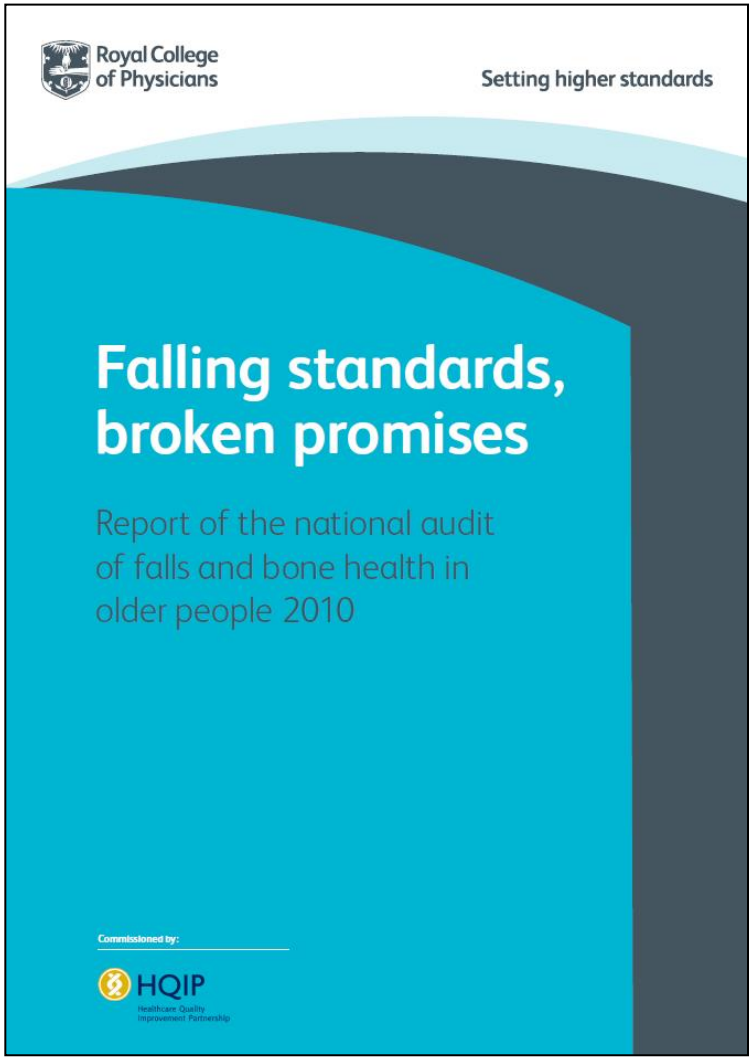
Royal College of Physicians national audit 2010



Key findings:

- Majority of high-risk patients miss the best or only opportunity for their falls and fracture risk to be identified in the majority of hospitals and most primary care organisations lack adequate services for secondary falls and fracture prevention

- 37% of local health services provide any kind of Fracture Liaison Service

- 32% of non-hip fracture and 67% of hip fracture patients had a clinical assessment for osteoporosis and/or fracture risk

- 33% of non-hip fracture and 60% of hip fracture patients received appropriate management for bone health

Key recommendations:

- All localities should commission a Fracture Liaison Service

- All acute care providers should introduce routine screening of older people, presenting to EDs or minor injury units (MIUs), for falls and fractures and that this is audited at least annually

1. National Audit of the Falls and Bone Health for Older People. 2011.

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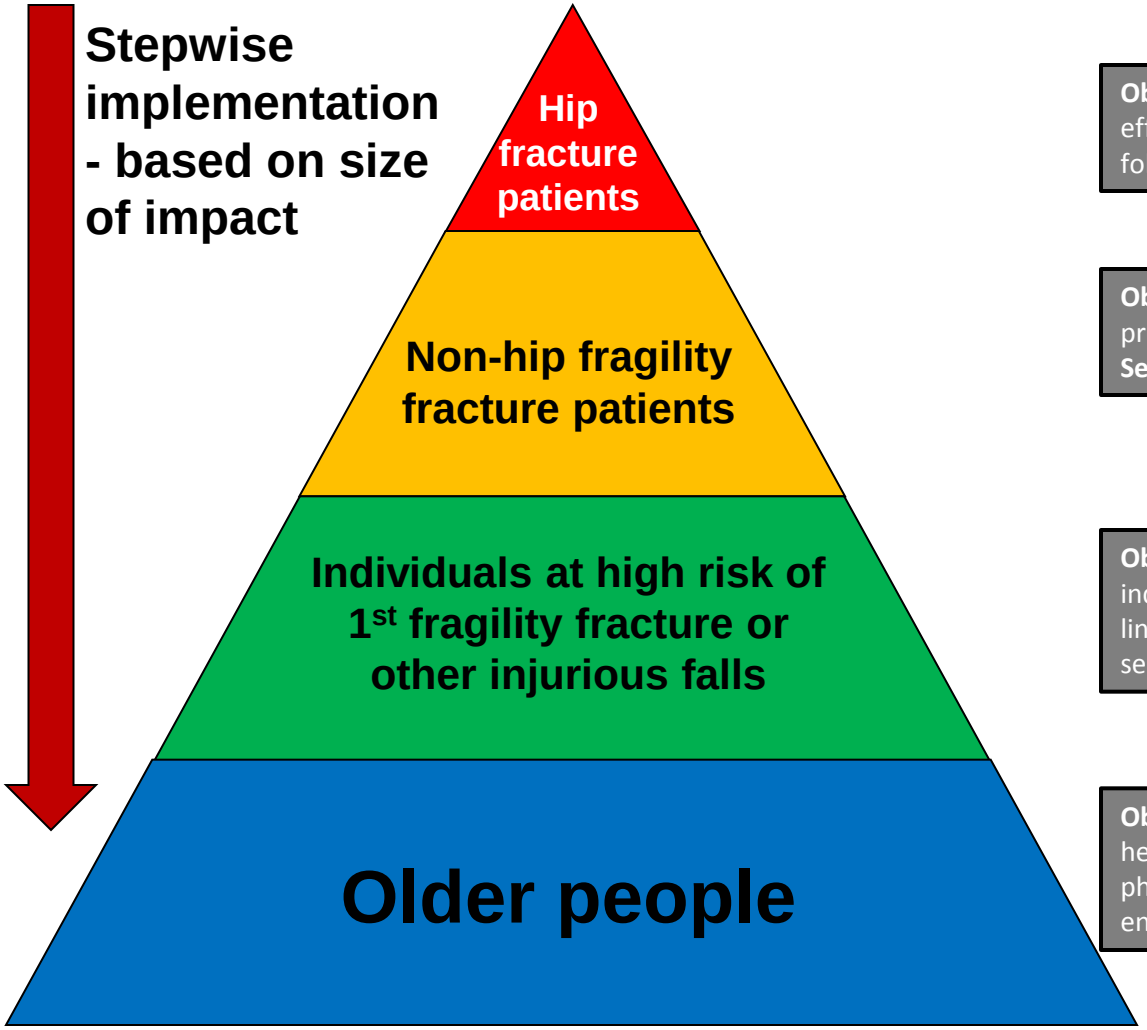
Department of Health for England: A road map for a systematic approach



Objective 1: Improve outcomes and improve efficiency of care after hip fractures – by following **the 6 "Blue Book" standards**

Objective 2: Respond to the first fracture, prevent the second – through **Fracture Liaison Services** in acute and primary care

Objective 3: Early intervention to restore independence – through **falls care pathway** linking acute and urgent care services to secondary falls prevention

Objective 4: Prevent frailty, preserve bone health, reduce accidents – through preserving physical activity, healthy lifestyles and reducing environmental hazards

1. DH Prevention Package for Older People

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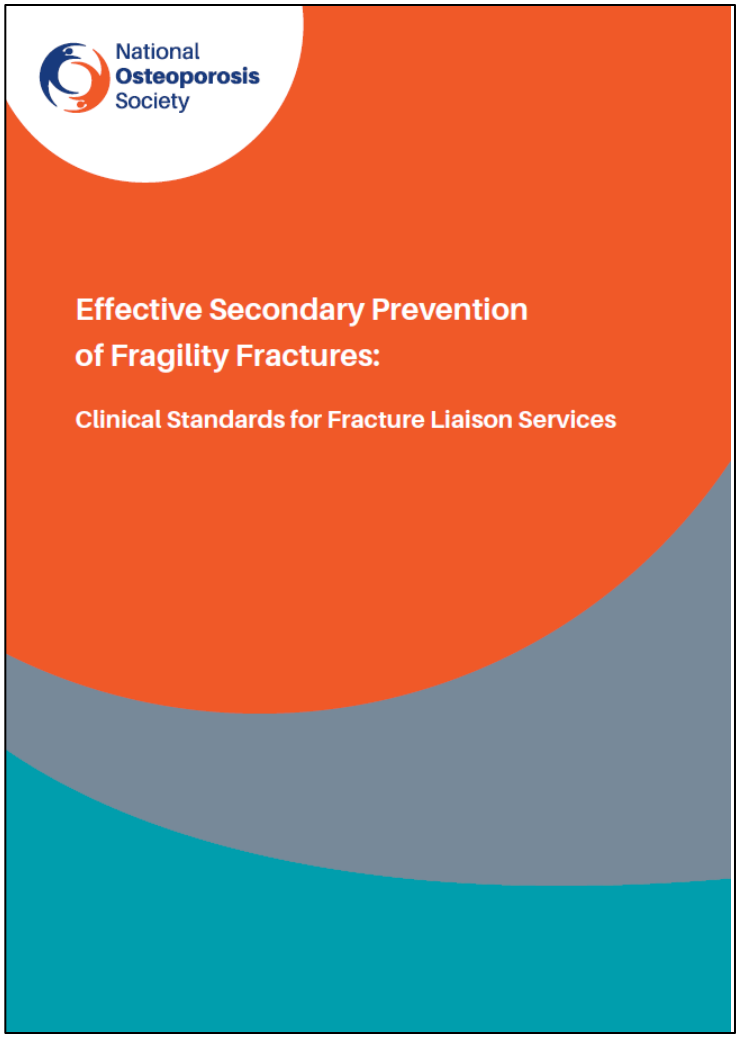
UK NOS Clinical Standards for FLS



Osteoporos Int
DOI 10.1007/s00198-016-3639-y

ORIGINAL ARTICLE

Delivering a quality-assured fracture liaison service in a UK teaching hospital—is it achievable?

K. E. Shipman[1] · J. Stammers[2] · A. Doyle[3] · N. Gittoes[4]

Received: 25 February 2016 / Accepted: 12 May 2016

Abstract
Summary To determine whether new national guidance on the specifications of a fracture liaison service are realistically deliverable, 1 year of data on the performance of such a service were audited. Audit targets were mostly met. This audit demonstrates that these standards are deliverable in a real world setting.
Introduction UK service specifications for a fracture liaison service (FLS) have been produced (National Osteoporosis Society, NOS) to promote effective commissioning and delivery of the highest quality care to patients with fragility fractures. How deliverable these standards are has not as yet been methodically reported. Our FLS was modelled on the ten NOS standards; performance was audited after 1 year to determine whether these standards could be delivered and to describe the lessons learnt.
Methods Performance was audited against the NOS FLS Service Standards, with management based on the Fracture Risk Assessment Tool (FRAX®), the four-item Falls Risk Assessment Tool (FRAT), National Institute for Health and Care Excellence (NICE) and the National Osteoporosis Guideline Groups (NOGG) guidance. Data were recorded prospectively on a database. The FLS commenced in May 2014, was fully operational in August 2014 and data were captured from 1 September 2014 to 1 September 2015.
Results The FLS detected 1773 patients and standards were largely achieved. Most, 94 %, patients were seen within 6 weeks, 533 DXA requests were generated, 804 outpatient FRAT assessments were recorded (134 required falls intervention) and 773 patients had bone treatments started. On follow-up at 3 months, between 78–79 % were still taking medication.
Conclusions Preliminary evaluation of a FLS implemented according to UK NOS standards demonstrates that the model is practical to apply to a large teaching hospital population. Collection and review of outcome and cost effectiveness data is required to determine the performance of this model in comparison with existing models.

Keywords Audit · Falls · Fracture liaison service · Fragility fracture · Management · Osteoporosis

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[3] Falls and Fracture Prevention Service, University Hospitals Birmingham, Birmingham, UK
[4] Centre for Endocrinology, Diabetes and Metabolism, Birmingham Health Partners & Department of Endocrinology, Queen Elizabeth Hospital, 3rd Floor Heritage Building, Birmingham, UK

Introduction

Fragility fractures are common and costly. Estimated to affect 1 in 2 women and 1 in 5 men over 50 [1], they cost the UK NHS approximately UK £1.9 billion a year [2]. Associated morbidity and mortality are high including loss of independence [3]. Provision of a fracture liaison service (FLS) reduces re-fracture risk [4] cost effectively, estimated by some to be a risk reduction of at least 30 % [5–7] with possible additional reductions in mortality [6]. Most outcome data however are based on FLS models incorporating identification of fragility

Published online: 18 May 2016

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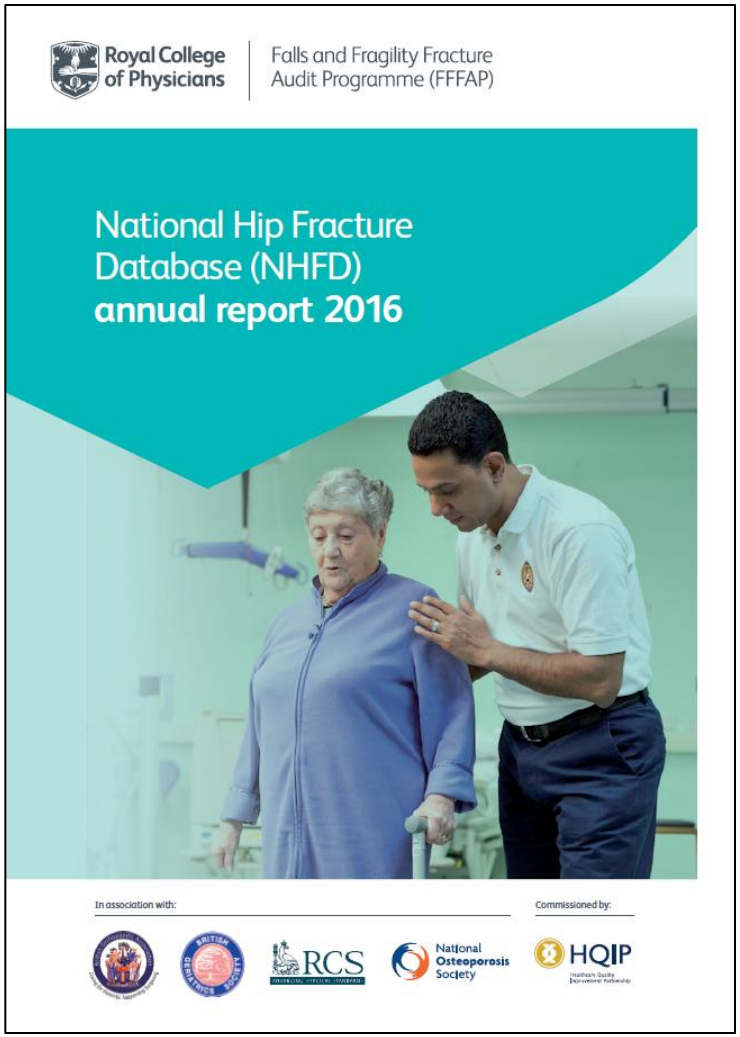
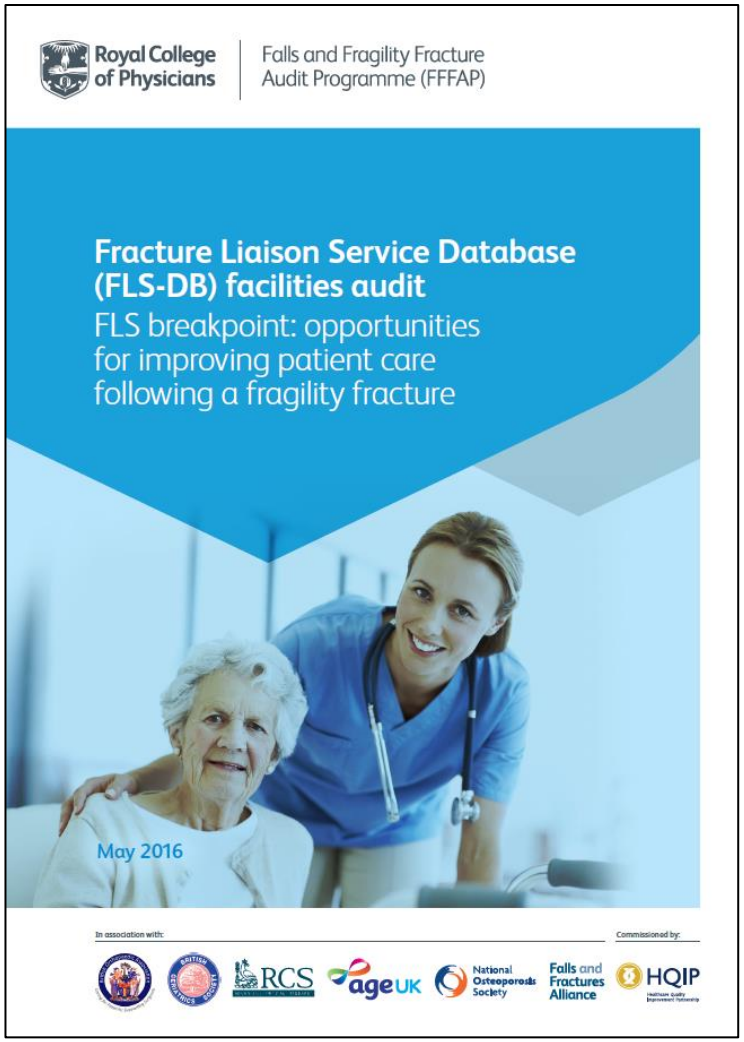
National Audit Programs in the UK





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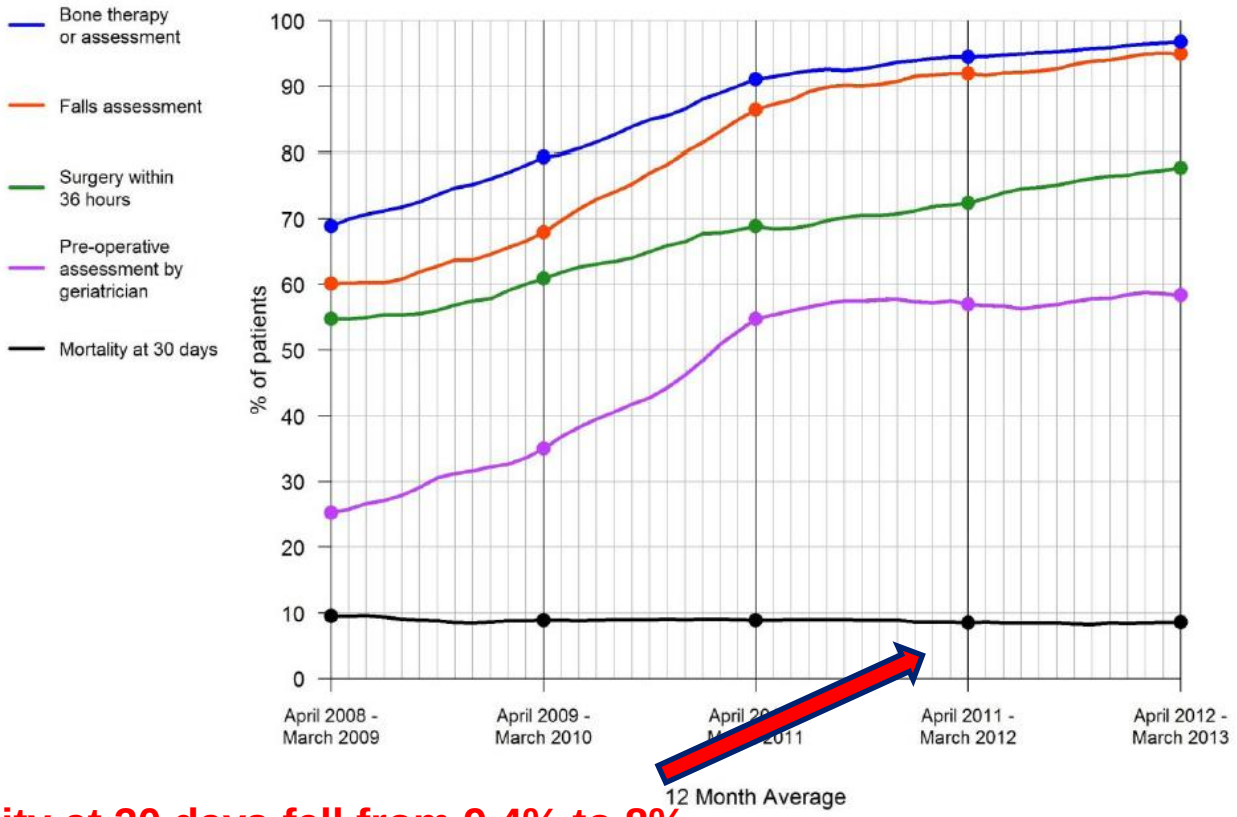
Trends in care, secondary prevention and mortality: April 2008 to March 2013



Average mortality at 30 days fell from 9.4% to 8%

Data taken from 46794 patients from 27 hospitals with good data completion and case ascertainment over the period 1st April 2008 - 31st March 2013

2013 NHFD Report. Available from www.nhfd.co.uk

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The Antipodes

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FLS implementation in Australia and NZ
ANZ Hip Fracture Registry Facilities Audit 2013

	NSW	VIC	NT	Qld	ACT	WA	TAS	SA	NZ	Overall Total
Number of hospitals performing hip fracture surgery.	37	24	2	13	1	6	3	8	22	116
Hospitals with dedicated orthopaedic bed available	68% (range 14-45)	75% (range 5-44)	50% (32 beds)	85% (range 18-48)	100% (34beds)	83% (range 16-45)	33% (18beds)	50% (range 15-60)	82% (range 10-90)	83/116 (72%)
Hospitals with Geriatric service available	62%	46%	50%	54%	100%	67%	33%	38%	55%	63/116 (54%)
Hospitals which have a fracture liaison service	22%	17%	0%	15%	0%	17%	0%	25%	0%	17/116 (15%)
Collect local hip fracture data.	38%	67%	50%	69%	100%	83%	0%	38%	64%	63/116 (54%)
Barriers to proposed hip fracture service redesign	59%	58%	50%	62%	100%	50%	67%	75%	64%	72/116 (62%)

http://www.anzhfr.org/

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New Zealand

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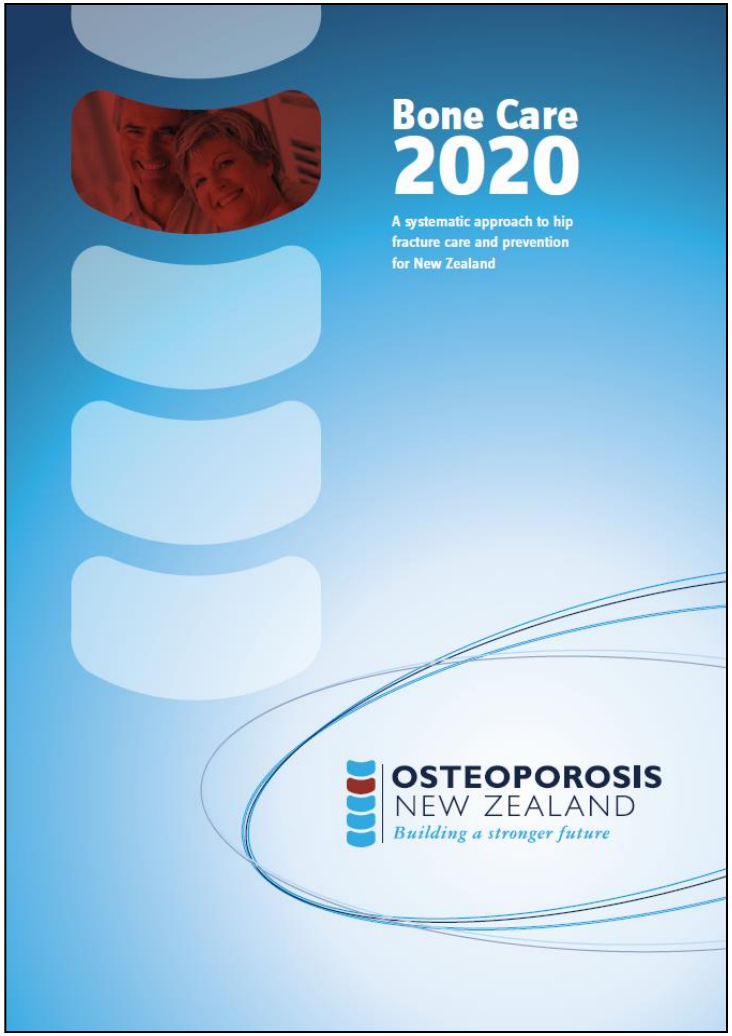
BoneCare 2020: Osteoporosis New Zealand
A systematic approach for New Zealand



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10 TOPICS in reducing harm from falls

open FOR BETTER CARE Hāpai ake te toiora

TOPIC 6 Why hip fracture prevention and care matters

It seems hard to imagine a family in New Zealand not touched by hip fracture – everyone has an elderly relative, neighbour or friend who has broken their hip, usually after a fall. Loss of independence and poor recovery are such common outcomes that hip fracture is understood as a significant threat to an older person. But risk of hip fracture can be predicted and osteoporosis treated, along with interventions for an older person's falls risks. Moreover, improvements in care for hip fracture patients can prevent avoidable complications which compromise recovery.

The significance of hip fracture requires a system-wide approach. The required reading includes an overview of four objectives for improvements in hip fracture prevention and care which integrate population health, and primary and secondary care approaches and services. Also in the required reading is a study of older persons' experience of the 'precarious and unstable conditions of life after hip fracture.'

The burden of hip fracture

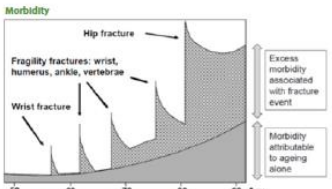
Hip fractures matter because, quite literally, they frequently shatter the lives of those who suffer them. The impact on individuals – and their families/whānau – can be catastrophic.

- Only half of those who survive a hip fracture will walk unaided again,[1] and many will not regain their former degree of mobility.[2]
- Between 10 and 20 percent will be admitted to residential care as a result of the fracture.[3,4]
- Sixty percent will require assistance with activities of daily living a year after the event.[5]
- Twenty-seven percent will die within a year of their hip fracture, and of these, just under two-thirds would not have died if they had not fractured their hip.[6]

The most recent study available quantifying direct costs reported a figure of $105 million incurred for the 3800 people who presented to New Zealand hospitals in 2007 with a hip fracture.[7] Hip fractures place significant demands on health and social care professionals, and consume considerable financial resources that are, and increasingly will be, needed elsewhere. In the absence of a system-wide approach to hip fracture prevention and care, the situation is likely to worsen significantly in the next and subsequent decades.

The 'osteoporotic career'

Hip fracture has been described as '… *all too often the final destination of a 30-year journey fuelled by decreasing bone strength and increasing falls risk*'.[8] This 'journey' of fracture experience through the life cycle – also referred to as the 'osteoporotic career' – is illustrated below.[9]



Adapted from Kanis JA Johnell O. 1999. The burden of osteoporosis. Journal of Endocrinological Investigation 22(8): 583-588

Having adequate dietary intake of calcium and circulating levels of vitamin D throughout life are essential for good bone health. The balance between continuous bone resorption and deposition of calcium changes as we age, and as bone breakdown exceeds formation, the resulting bone loss increases the risk of osteoporosis. Osteoporosis is a long-term condition which manifests itself clinically in the form of fragility fractures. Fragility fractures have been defined as fractures which would not have been expected if the same event had happened in a healthy young person.[10]

With the exception of fractures of the vertebrae attributable to osteoporosis, the majority of fragility fractures occur as a result of a fall from standing height. Since epidemiological studies suggest that the bulk of fragility fractures occur among both women and men aged 50 years and over, fractures in this age group should be considered osteoporotic until ruled out.[10]

Continued over

Health Quality & Safety Commission New Zealand

National Patient Safety Campaign

newzealand.govt.nz

TOPIC 6 Strategies to improve hip fracture prevention and care

This supplementary information for Topic 6 introduces the national strategy proposed by Osteoporosis New Zealand, and is one of the readings required for the professional development activity.

Policymakers, professional organisations and patient societies in Australia,[1] Canada,[2] the UK[3] and the United States[4] have advocated implementation of a systematic approach to hip fracture prevention and care, as has the International Osteoporosis Foundation.[5]

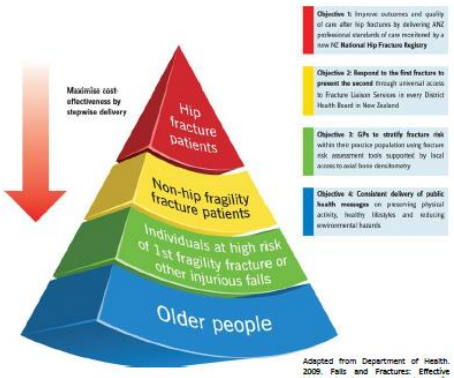
Bone Care 2020 A systematic approach to hip fracture care and prevention for New Zealand

In December 2012, Osteoporosis New Zealand published such a strategy, *BoneCare 2020: A systematic approach to hip fracture care and prevention for New Zealand.*[6]

The strategy is summarised below and specific steps for each objective are outlined overleaf, where you can identify those most relevant to your service.

The strategy proposes that particular groups are targeted sequentially, from highest to lowest risk, as the most effective approach from clinical and cost perspectives. In other words, we should prioritise our efforts to those most at risk of future fracture – the people who already have a fragility fracture.

A systematic approach to hip fracture prevention and care[6]



Adapted from Department of Health. 2009. Falls and Fractures: Effective interventions in Health and Social Care.[7]

Health Quality & Safety Commission New Zealand

http://www.hqsc.govt.nz/our-programmes/reducing-harm-from-falls/10-topics/

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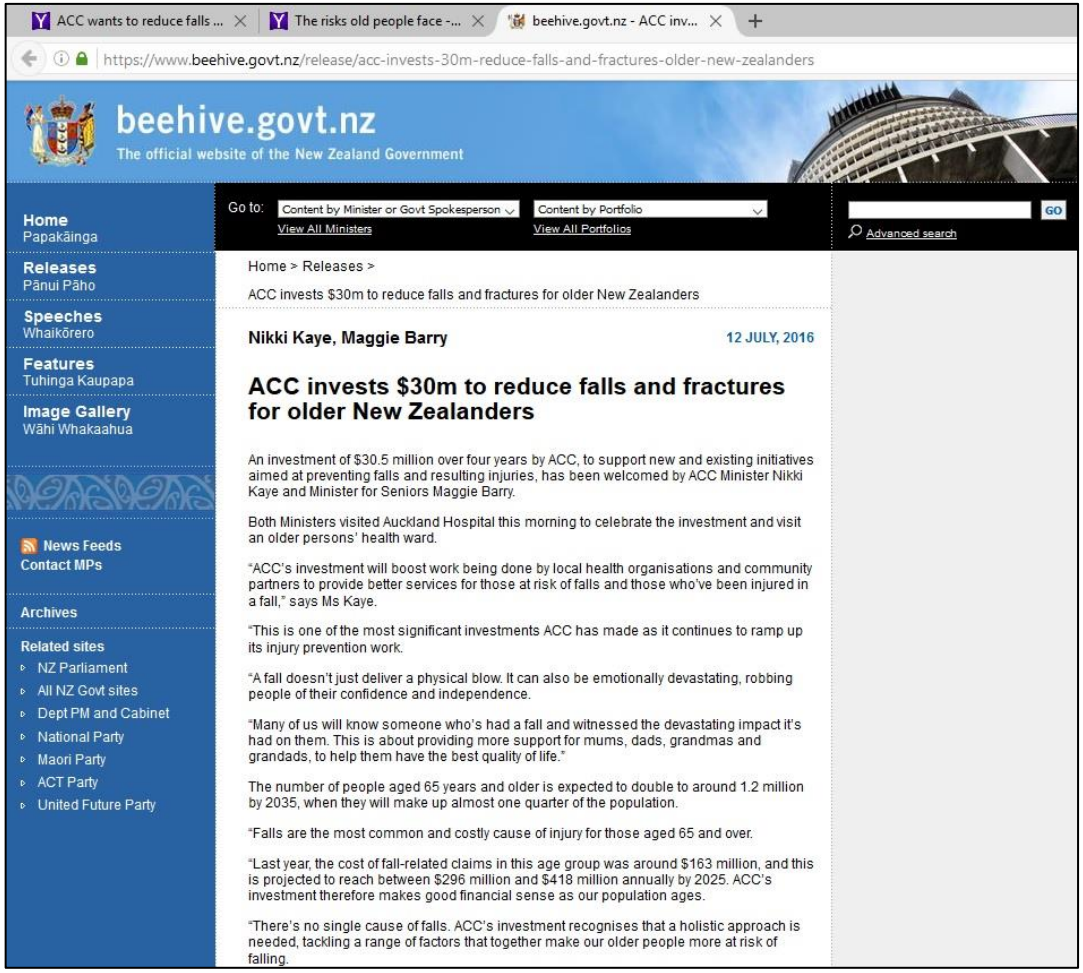
New Zealand – 12 July 2016

ACC to invest NZ$30 million into falls and fracture prevention



ACC wants to reduce falls ... | The risks old people face -... | beehive.govt.nz - ACC inv...

https://www.beehive.govt.nz/release/acc-invests-30m-reduce-falls-and-fractures-older-new-zealanders

beehive.govt.nz
The official website of the New Zealand Government

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ACC invests $30m to reduce falls and fractures for older New Zealanders

Nikki Kaye, Maggie Barry 12 JULY, 2016

ACC invests $30m to reduce falls and fractures for older New Zealanders

An investment of $30.5 million over four years by ACC, to support new and existing initiatives aimed at preventing falls and resulting injuries, has been welcomed by ACC Minister Nikki Kaye and Minister for Seniors Maggie Barry.

Both Ministers visited Auckland Hospital this morning to celebrate the investment and visit an older persons' health ward.

"ACC's investment will boost work being done by local health organisations and community partners to provide better services for those at risk of falls and those who've been injured in a fall," says Ms Kaye.

"This is one of the most significant investments ACC has made as it continues to ramp up its injury prevention work.

"A fall doesn't just deliver a physical blow. It can also be emotionally devastating, robbing people of their confidence and independence.

"Many of us will know someone who's had a fall and witnessed the devastating impact it's had on them. This is about providing more support for mums, dads, grandmas and grandads, to help them have the best quality of life."

The number of people aged 65 years and older is expected to double to around 1.2 million by 2035, when they will make up almost one quarter of the population.

"Falls are the most common and costly cause of injury for those aged 65 and over.

"Last year, the cost of fall-related claims in this age group was around $163 million, and this is projected to reach between $296 million and $418 million annually by 2025. ACC's investment therefore makes good financial sense as our population ages.

"There's no single cause of falls. ACC's investment recognises that a holistic approach is needed, tackling a range of factors that together make our older people more at risk of falling.

https://www.beehive.govt.nz/release/acc-invests-30m-reduce-falls-and-fractures-older-new-zealanders

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FRACTURE LIAISON SERVICES

New Zealand – 12 July 2016

ACC to invest $30 million into falls and fracture prevention

- In-home and community-based strength and balance programmes
- **Fracture Liaison Services**, to identify and treat those at risk of osteoporosis and further fractures
- Assessment and management of hazards in the home
- Medication review for people taking multiple medicines
- Vitamin D prescribing in Aged Residential Care
- Service integration across primary and secondary care to provide seamless pathways in the falls and fracture system

https://nz.news.yahoo.com/top-stories/a/32034301/the-risks-old-people-face/#page1

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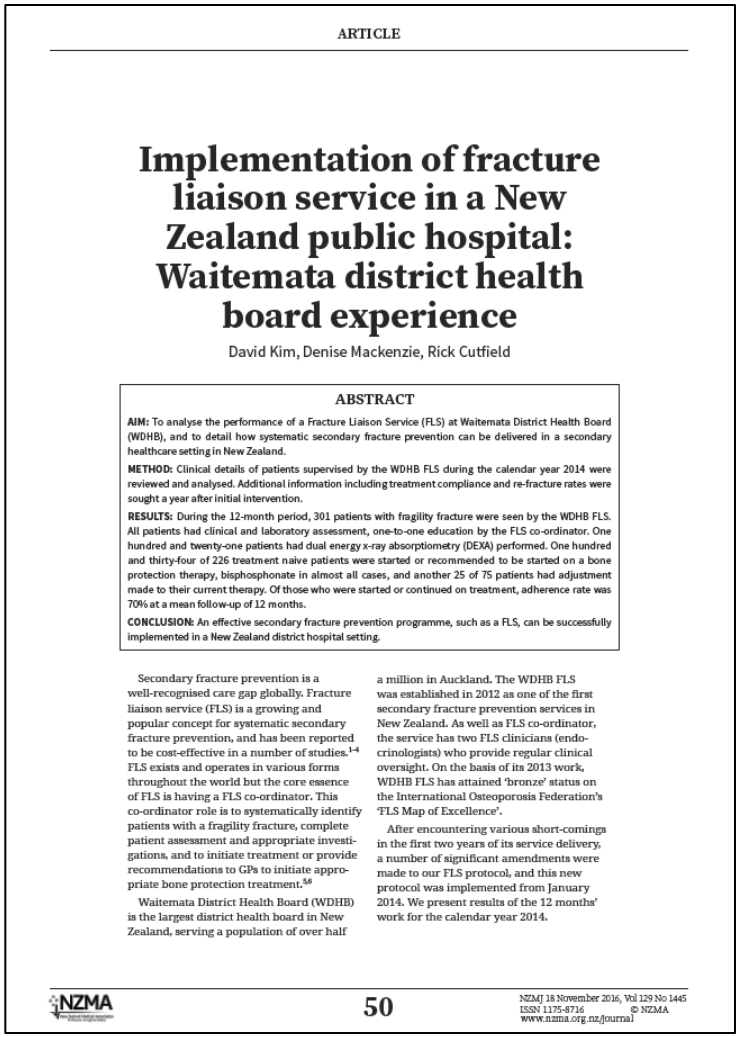
Make the FIRST break the LAST FRACTURE LIAISON SERVICES

New Zealand's first published FLS



ARTICLE

Implementation of fracture liaison service in a New Zealand public hospital: Waitemata district health board experience

David Kim, Denise Mackenzie, Rick Cutfield

ABSTRACT

AIM: To analyse the performance of a Fracture Liaison Service (FLS) at Waitemata District Health Board (WDHB), and to detail how systematic secondary fracture prevention can be delivered in a secondary healthcare setting in New Zealand.

METHOD: Clinical details of patients supervised by the WDHB FLS during the calendar year 2014 were reviewed and analysed. Additional information including treatment compliance and re-fracture rates were sought a year after initial intervention.

RESULTS: During the 12-month period, 301 patients with fragility fracture were seen by the WDHB FLS. All patients had clinical and laboratory assessment, one-to-one education by the FLS co-ordinator. One hundred and twenty-one patients had dual energy x-ray absorptiometry (DEXA) performed. One hundred and thirty-four of 226 treatment naive patients were started or recommended to be started on a bone protection therapy, bisphosphonate in almost all cases, and another 25 of 75 patients had adjustment made to their current therapy. Of those who were started or continued on treatment, adherence rate was 70% at a mean follow-up of 12 months.

CONCLUSION: An effective secondary fracture prevention programme, such as a FLS, can be successfully implemented in a New Zealand district hospital setting.

Secondary fracture prevention is a well-recognised care gap globally. Fracture liaison service (FLS) is a growing and popular concept for systematic secondary fracture prevention, and has been reported to be cost-effective in a number of studies.[1-4] FLS exists and operates in various forms throughout the world but the core essence of FLS is having a FLS co-ordinator. This co-ordinator role is to systematically identify patients with a fragility fracture, complete patient assessment and appropriate investigations, and to initiate treatment or provide recommendations to GPs to initiate appropriate bone protection treatment.[5,6]

Waitemata District Health Board (WDHB) is the largest district health board in New Zealand, serving a population of over half a million in Auckland. The WDHB FLS was established in 2012 as one of the first secondary fracture prevention services in New Zealand. As well as FLS co-ordinator, the service has two FLS clinicians (endocrinologists) who provide regular clinical oversight. On the basis of its 2013 work, WDHB FLS has attained 'bronze' status on the International Osteoporosis Federation's 'FLS Map of Excellence'.

After encountering various short-comings in the first two years of its service delivery, a number of significant amendments were made to our FLS protocol, and this new protocol was implemented from January 2014. We present results of the 12 months' work for the calendar year 2014.

N Z Med J. 2016 Nov 18;129(1445):50-55.

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New Zealand's first published FLS

N Z Med J. 2016 Nov 18;129(1445):50-55.

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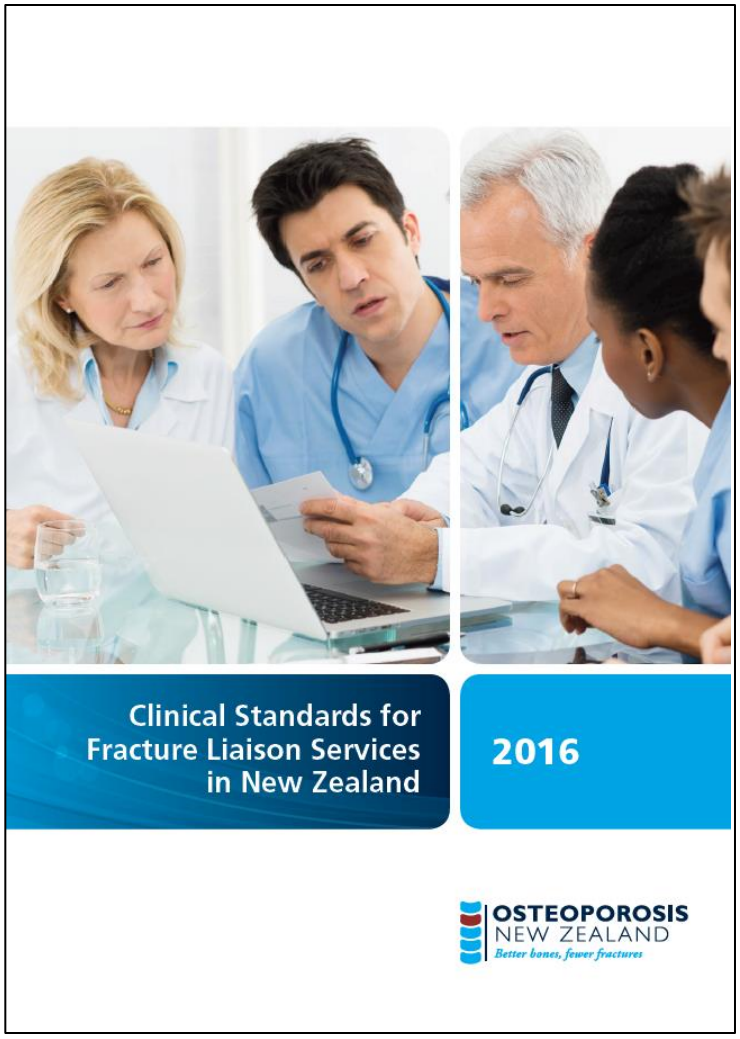
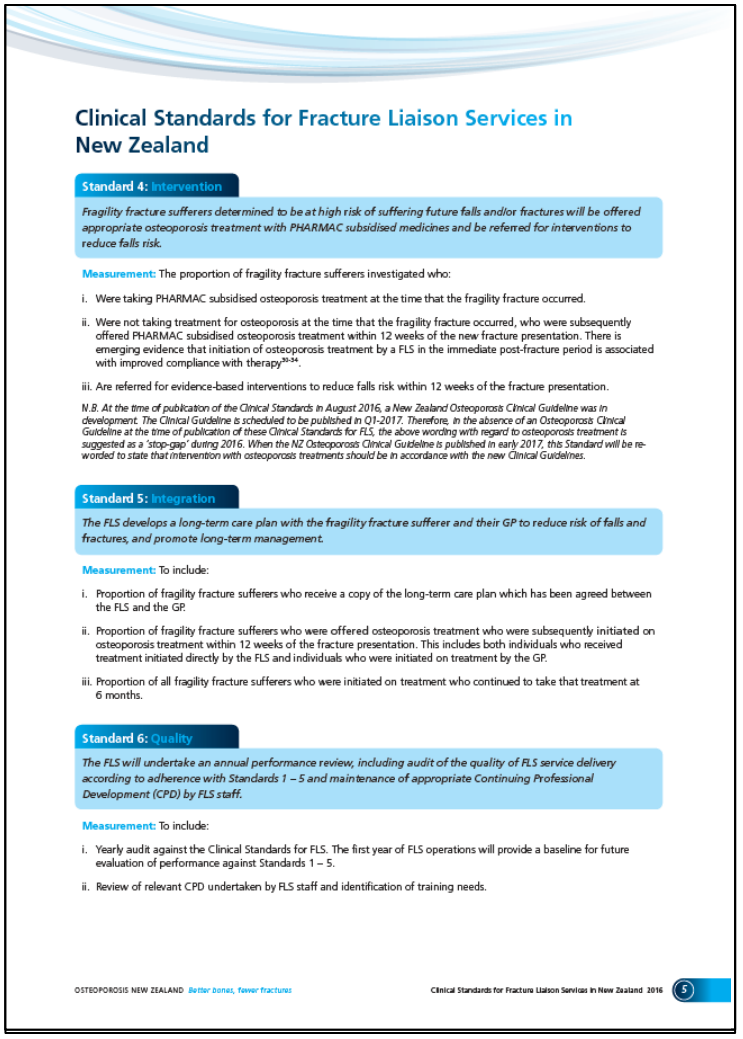
Clinical Standards for FLS in New Zealand





Clinical Standards for Fracture Liaison Services in New Zealand

Standard 4: Intervention

Fragility fracture sufferers determined to be at high risk of suffering future falls and/or fractures will be offered appropriate osteoporosis treatment with PHARMAC subsidised medicines and be referred for interventions to reduce falls risk.

Measurement: The proportion of fragility fracture sufferers investigated who:

i. Were taking PHARMAC subsidised osteoporosis treatment at the time that the fragility fracture occurred.

ii. Were not taking treatment for osteoporosis at the time that the fragility fracture occurred, who were subsequently offered PHARMAC subsidised osteoporosis treatment within 12 weeks of the new fracture presentation. There is emerging evidence that initiation of osteoporosis treatment by a FLS in the immediate post-fracture period is associated with improved compliance with therapy[30-34].

iii. Are referred for evidence-based interventions to reduce falls risk within 12 weeks of the fracture presentation.

N.B. At the time of publication of the Clinical Standards in August 2016, a New Zealand Osteoporosis Clinical Guideline was in development. The Clinical Guideline is scheduled to be published in Q1-2017. Therefore, in the absence of an Osteoporosis Clinical Guideline at the time of publication of these Clinical Standards for FLS, the above wording with regard to osteoporosis treatment is suggested as a "stop-gap" during 2016. When the NZ Osteoporosis Clinical Guideline is published in early 2017, this Standard will be re-worded to state that intervention with osteoporosis treatments should be in accordance with the new Clinical Guidelines.

Standard 5: Integration

The FLS develops a long-term care plan with the fragility fracture sufferer and their GP to reduce risk of falls and fractures, and promote long-term management.

Measurement: To include:

i. Proportion of fragility fracture sufferers who receive a copy of the long-term care plan which has been agreed between the FLS and the GP.

ii. Proportion of fragility fracture sufferers who were offered osteoporosis treatment who were subsequently initiated on osteoporosis treatment within 12 weeks of the fracture presentation. This includes both individuals who received treatment initiated directly by the FLS and individuals who were initiated on treatment by the GP.

iii. Proportion of all fragility fracture sufferers who were initiated on treatment who continued to take that treatment at 6 months.

Standard 6: Quality

The FLS will undertake an annual performance review, including audit of the quality of FLS service delivery according to adherence with Standards 1 – 5 and maintenance of appropriate Continuing Professional Development (CPD) by FLS staff.

Measurement: To include:

i. Yearly audit against the Clinical Standards for FLS. The first year of FLS operations will provide a baseline for future evaluation of performance against Standards 1 – 5.

ii. Review of relevant CPD undertaken by FLS staff and identification of training needs.

http://osteoporosis.org.nz/resources/health-professionals/clinical-standards-for-fls/

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Osteoporosis New Zealand Strategy 2017-2020

http://osteoporosis.org.nz/about-us/our-strategy/

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Australia

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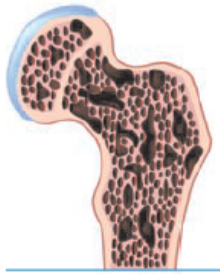
FLS in Australia



No more excuses: fracture liaison services work and are cost-effective

Time to find a systems-level model for a serious, undermanaged, but preventable problem

Markus J Seibel
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Professor of Endocrinology

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doi: 10.5694/mja11.11201

For over 20 years, we have known that osteoporotic fractures predispose to further fractures and significant morbidity.[1,2] We also understand that first and subsequent fragility fractures are associated with premature death.[2-4] However, surprisingly little has happened over the past two decades to translate this knowledge into good clinical practice for our patients. Of course, anyone presenting with a low-trauma fracture to an Australian hospital will get it fixed in due time. But little happens after that. Nobody seems to ask why that person had a low-trauma fracture (or a second or third one) to begin with. Indeed, 75%–80% of patients who have had an osteoporotic fracture are neither being investigated nor treated for their underlying condition — osteoporosis.[5,6] This systematic failure is all the more shocking as we have available to us not only one of the world's best medical systems, but also subsidised pharmacotherapies with proven efficacy to reduce the risk of (re)fracture.[7] within 1–2 years of the initial event. This accounted for 16 225 essentially unnecessary admissions with a startling average length of stay of 22 days. Of those with refractures, 17% died during the period studied.[8] These numbers represent a medical nightmare and a health care systems failure of huge and growing dimensions. Because the Australian population is ageing, the prevalence of osteoporosis has been steadily rising over the past few decades. Currently, 2.2 million Australians live with osteoporosis, and this number is projected to increase to 3 million by 2021.[9] While 67 000 osteoporotic fractures were recorded in Australia in 2001, this figure had risen to more than 87 000 in 2007.[9] In 2001, the annual total cost of osteoporosis to the Australian health system was estimated at $7.4 billion,[10] and it does not require much imagination to anticipate that we will soon spend an even larger amount of our nation's income on a medical problem that can be treated and, more importantly, effectively prevented.

Med J Aust. 2011 Nov 21;195(10):566-7.

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ANZ Bone and Mineral Society Position Paper: A platform for an Australian National Alliance

Australian and New Zealand Bone and Mineral Society

Position Paper on Secondary Fracture Prevention

Programs: A Call to Action

ANZBMS

April 2015

Australian and New Zealand Bone and Mineral Society Position Paper on Secondary Fracture Prevention Programs

Endocrine Society of Australia

esa endocrine society of australia

Medical Oncology Group of Australia

MOGA MEDICAL ONCOLOGY GROUP OF AUSTRALIA INCORPORATED

New Zealand Rheumatology Association

Royal Australasian College of Physicians

The Royal Australasian College of Physicians

This Position Paper has been endorsed by the following governmental organisations:

Accident Compensation Corporation

Health Quality & Safety Commission New Zealand*

HEALTH QUALITY & SAFETY COMMISSION NEW ZEALAND

Kupu Taurangi Hauora o Aotearoa

3

https://www.anzbms.org.au/downloads/ANZBMSPositionPaperonSecondaryFracturePreventionApril2015.pdf

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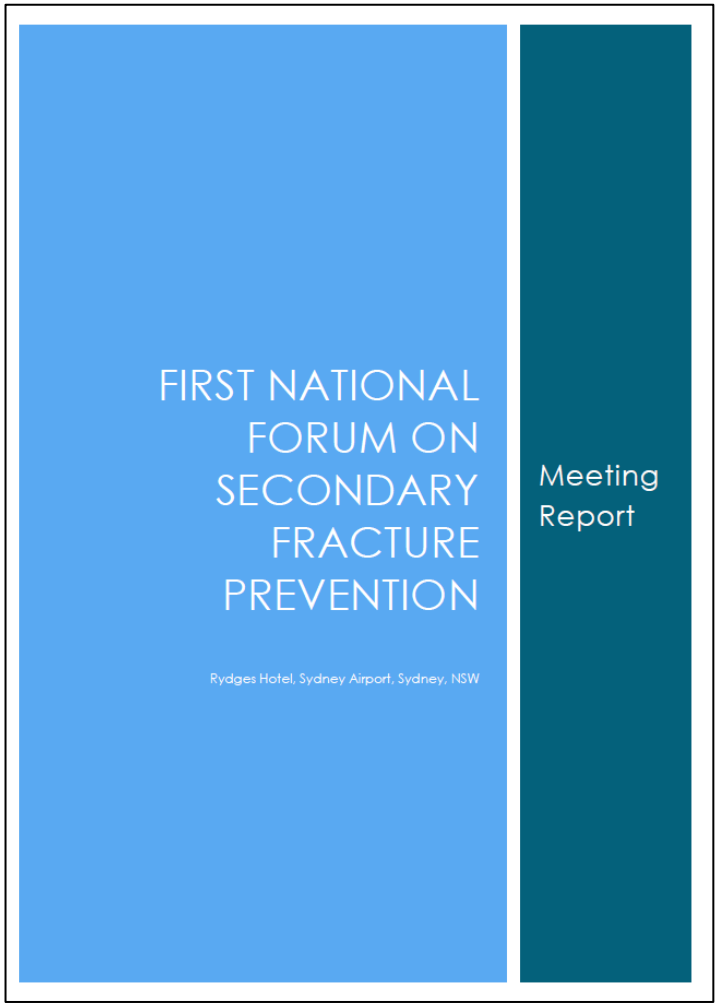
SOS Fracture Alliance Inaugural Forum 2015



https://www.anzbms.org.au/downloads/FirstNationalForumonSecondaryFracturePrevention-Reportrevised2Dec2015.pdf

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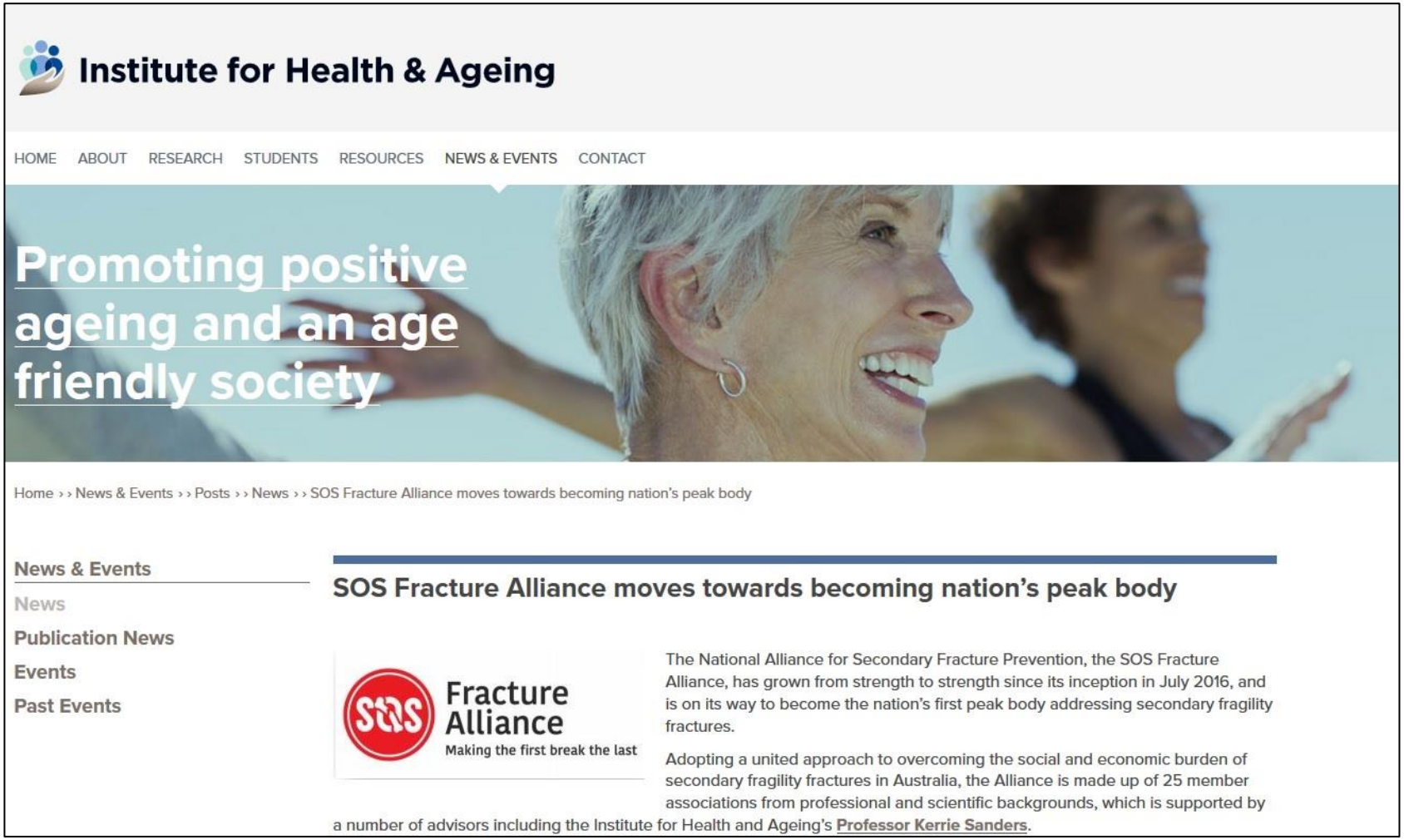
SOS Fracture Alliance



http://iha.acu.edu.au/2017/01/10/sos-fracture-alliance-moves-towards-becoming-nations-peak-body/

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SOS Fracture Alliance

Fracture Alliance
Making the first break the last

NEWSLETTER #1

December 2016

Welcome to the first newsletter of the SOS Fracture Alliance!

On 20th November 2015, representatives from 22 organisations gathered in Sydney to attend the inaugural National Forum on Secondary Fracture Prevention. As a direct result of this meeting, a National Alliance was formed in mid-2016 to finally close the osteoporosis care gap that has been in place for all too long. This Alliance is now known under the name of "SOS Fracture Alliance", where "SOS Fracture" not only stands for "*Stop Osteoporotic Secondary Fracture*" but also for the urgency of what we are trying to achieve.

Already in 2015, a good number of organisations and key stakeholders endorsed the ANZBMS Position Paper on Secondary Fracture Prevention, which drew attention to the appalling lack of effective osteoporosis care in Australia, and the shocking fact that 80% of patients who suffer a fragility fracture receive no treatment to prevent further fractures.

The case for addressing the lack of osteoporosis awareness, both among health professionals and patients, has been made repeatedly over the past 15 years. However, despite the inclusion of osteoporosis as part of the 7th Australian National Health Priority in 2002, little or no progress has been made. A major reason for this failure was the lack of a peak body that encompassed all stakeholders and spoke with one voice.

The SOS Fracture Alliance is on its way to becoming this peak body. With currently 25 member organisations, amongst them professional and scientific colleges and societies, regional and rural organisations, patient organisations and medical research institutes, the Alliance is already supported by an important segment of relevant professions and the Australian public and poised to tackle the burden of secondary fragility fractures.

In the words of Nelson Mandela: "We know it well that none of us acting alone can achieve success. We must therefore act together."

Fracture Alliance
Making the first break the last

Dr Greg Lyubomirsky is the Chief Executive of Osteoporosis Australia. Greg has decades of experience in the healthcare industry and in chronic disease management. He is passionate about patient support and achieving better outcomes for patients.

Dr Gabor Major is the Director of Rheumatology at Hunter New England Health Service, Co–Chair of the Musculoskeletal Network, NSW Agency for Clinical Innovation, and Conjoint Senior Lecturer at the School of Medicine and Public Health, Faculty of Health and Medicine, Newcastle University. He has a long standing interest in fragility fracture prevention, and was instrumental in setting up a service at the John Hunter Hospital.

Dr Davor Saravanja is an orthopaedic and spine surgeon specialising in complex deformities (scoliosis, kyphosis), tumours, degenerative and paediatric spinal conditions. He holds appointments at both Macquarie University and Sydney Children's Hospital. Davor is involved in numerous research projects and has completed world leading research in the field of primary bone tumours affecting the spine.

Professor Markus Seibel is an Endocrinologist at the University of Sydney and heads the Department of Endocrinology & Metabolism at Concord Hospital, Sydney. He is an active clinician in the field of bone and mineral metabolism and passionate about improving fracture prevention for all Australians. Markus has many years of experience in running and analysing secondary fracture prevention programs, and currently chairs the Alliance's Steering Committee.

Our Advisors

Dr Peter MacIsaac works for Hunter New England Health and Hunter Medical Research Institute in Clinical and Research Informatics, Innovation and change management. His health background is in rural and urban General Practice. Peter is supporting the Alliance with input on primary care prevention of fractures and liaison with the RACGP and Primary Healthcare Networks.

http://iha.acu.edu.au/2017/01/10/sos-fracture-alliance-moves-towards-becoming-nations-peak-body/

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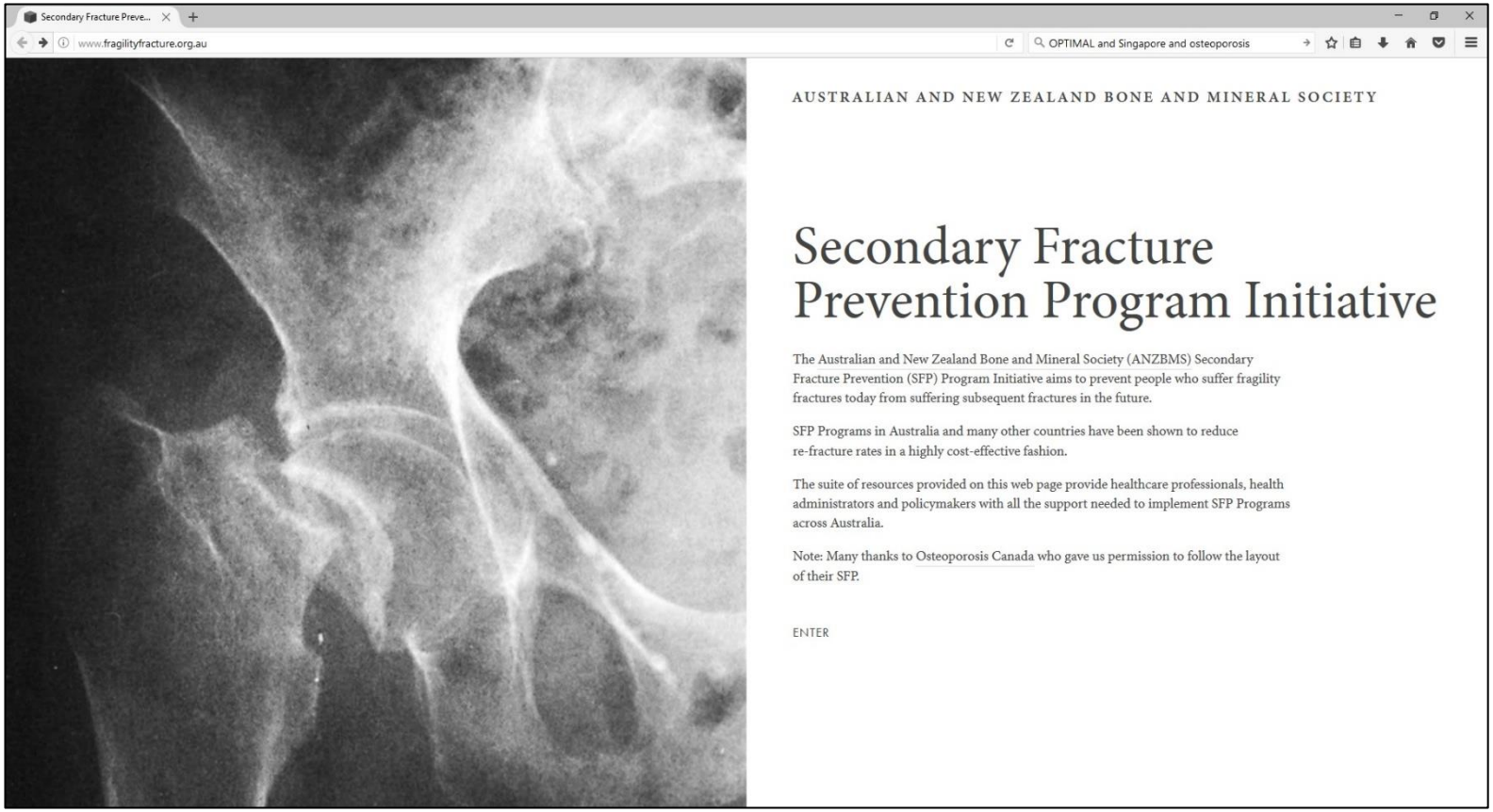
Australian FLS Implementation Resources … with thanks to OC



http://www.fragilityfracture.org.au/

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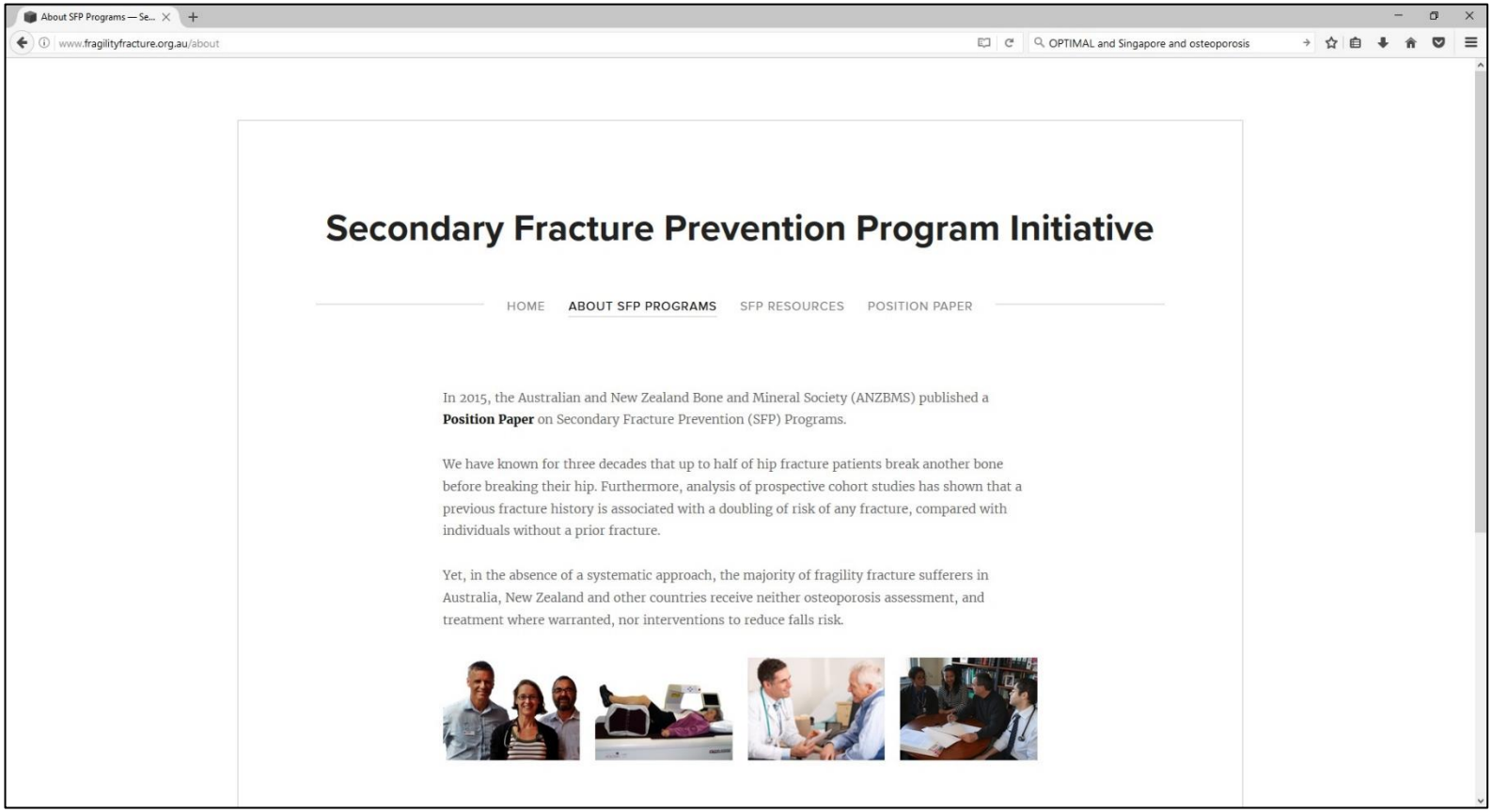
Australian FLS Implementation Resources … with thanks to OC



http://www.fragilityfracture.org.au/about

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United States

NBHA

STRONG BONES AMERICA

A Public-Private Partnership Dedicated to Enhancing the Nation's Bone Health

NATIONAL BONE HEALTH ALLIANCE

Overview

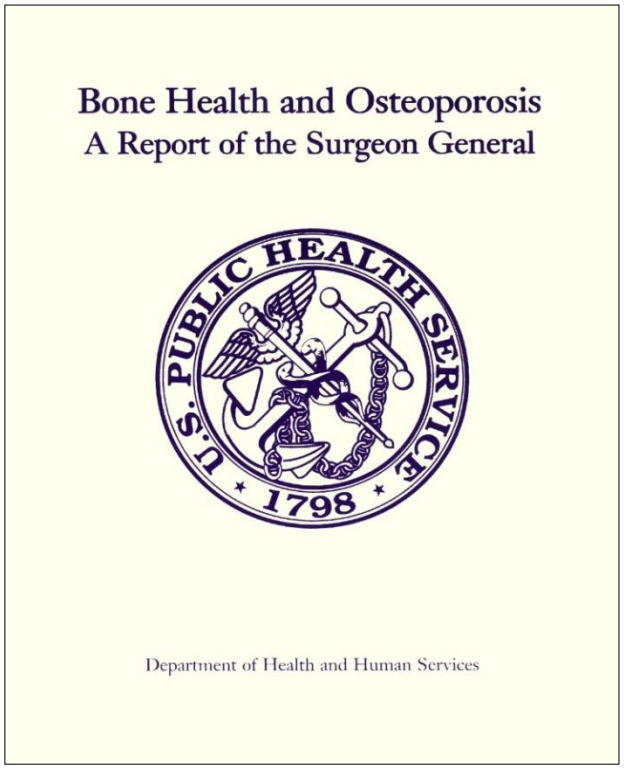
- Launched in late 2010 as a public-private partnership that brings together the expertise/resources of its public, private and non-profit sector partners
- **54 organizational participants**
  - ***29*** *non-profit members*
  - ***20*** *private sector members*
  - ***5*** *government agency liaisons (CDC, CMS, FDA, NASA, NIH)*
- ***Collective reach: over 100,000 health care professionals and 10 million consumers***
- ***Vision*****: to improve the overall health and quality of life of all Americans by enhancing their bone health**
- Addressing the priorities of the Bone Health Summit *National Action Plan:*
  - Promote bone health and prevent disease
  - Improve diagnosis and treatment
  - Enhance research, surveillance and evaluation

With sincere thanks to David Lee, Executive Director, NBHA

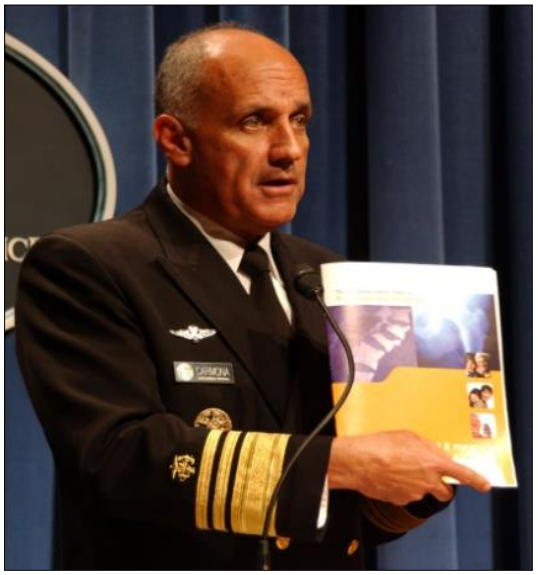
History (1)

The creation of the NBHA stems from two major activities:

***Bone Health and Osteoporosis: A Report of the Surgeon General* (2004)** called for public and private stakeholders to join forces to develop a national action plan on bone health



2014:
10th anniversary of publication of the U.S. Surgeon General Report

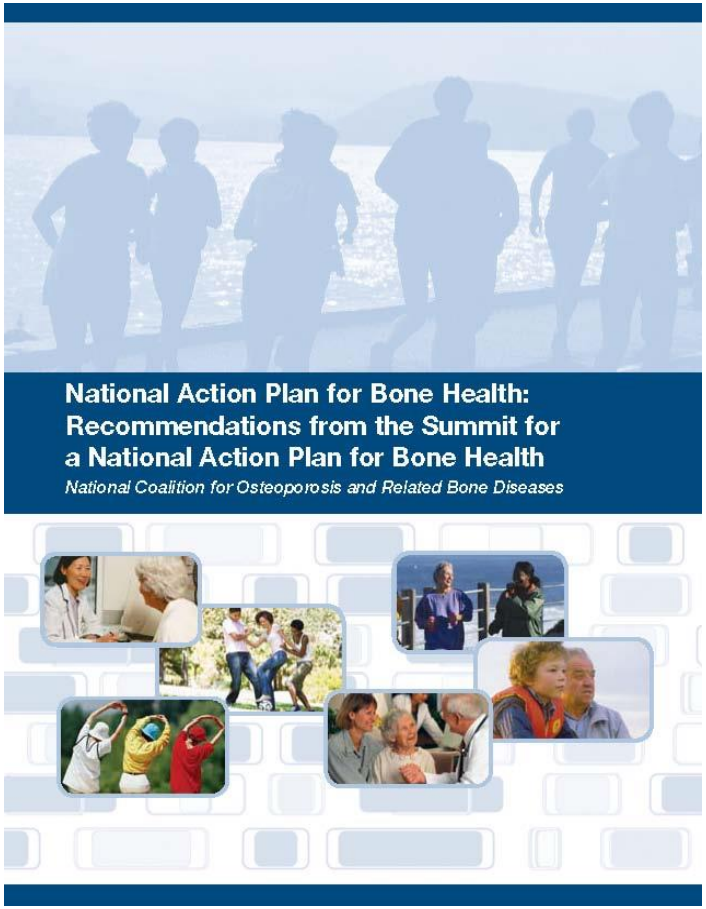


With sincere thanks to David Lee, Executive Director, NBHA

History (2)

Following up on the recommendation of the ***Surgeon General's Report*** to develop a National Action Plan on bone health, the ***Summit for a National Action Plan for Bone Health*** was convened in June 2008, which involved more than 150 individuals representing:

- individuals and families
- health care professionals
- health systems
- health care purchasers
- Communities/community-based organizations
- government
- voluntary health organizations
- professional associations
- academic institutions
- industry



With sincere thanks to David Lee, Executive Director, NBHA

Implementation Timeline

2010

NBHA launch (Oct)

2011

Establish 20/20 Vision (Aug)

NBHA/Kaiser FLS Summit (Nov)

2012

2Million2Many launch (April)

Bone turnover paper published (July)

POSITION PAPER

National Bone Health Alliance Bone Turnover Marker Project: current practices and the need for US harmonization, standardization, and common reference ranges

D. Bauer · J. Krege · N. Lane · E. Leary · C. Libanati · P. Miller · G. Myers · S. Silverman · H. W. Vesper · D. Lee · M. Payette · S. Randall

Received: 20 March 2012 / Accepted: 5 June 2012
© International Osteoporosis Foundation and National Osteoporosis Foundation 2012

Abstract

Summary This position paper reviews how the National Bone Health Alliance (NBHA) will execute a project to help assure health professionals of the clinical utility of bone turnover markers; the current clinical approaches concerning osteoporosis and the status and use of bone turnover markers in the USA; the rationale for focusing this effort

Introduction Osteoporosis is a major global health problem, with the prevalence and incidence of osteoporosis for at-risk populations estimated to be 44 million Americans. The potential of bone markers as an additional tool for health care professionals to improve patient outcomes and impact morbidity and mortality is crucial in providing better health care and addressing rising health care costs. This need to advance

2013

Fracture Prevention CENTRAL launch (March)

FLS Demonstration Project (Dec)

2014

QCDR Osteoporosis Registry launched (Sept)

Clinical diagnosis of osteoporosis paper (May)

The clinical diagnosis of osteoporosis: a position statement from the National Bone Health Alliance Working Group

Rare Bone Workshop (Sept)

2015

FLS Consult Service (May)

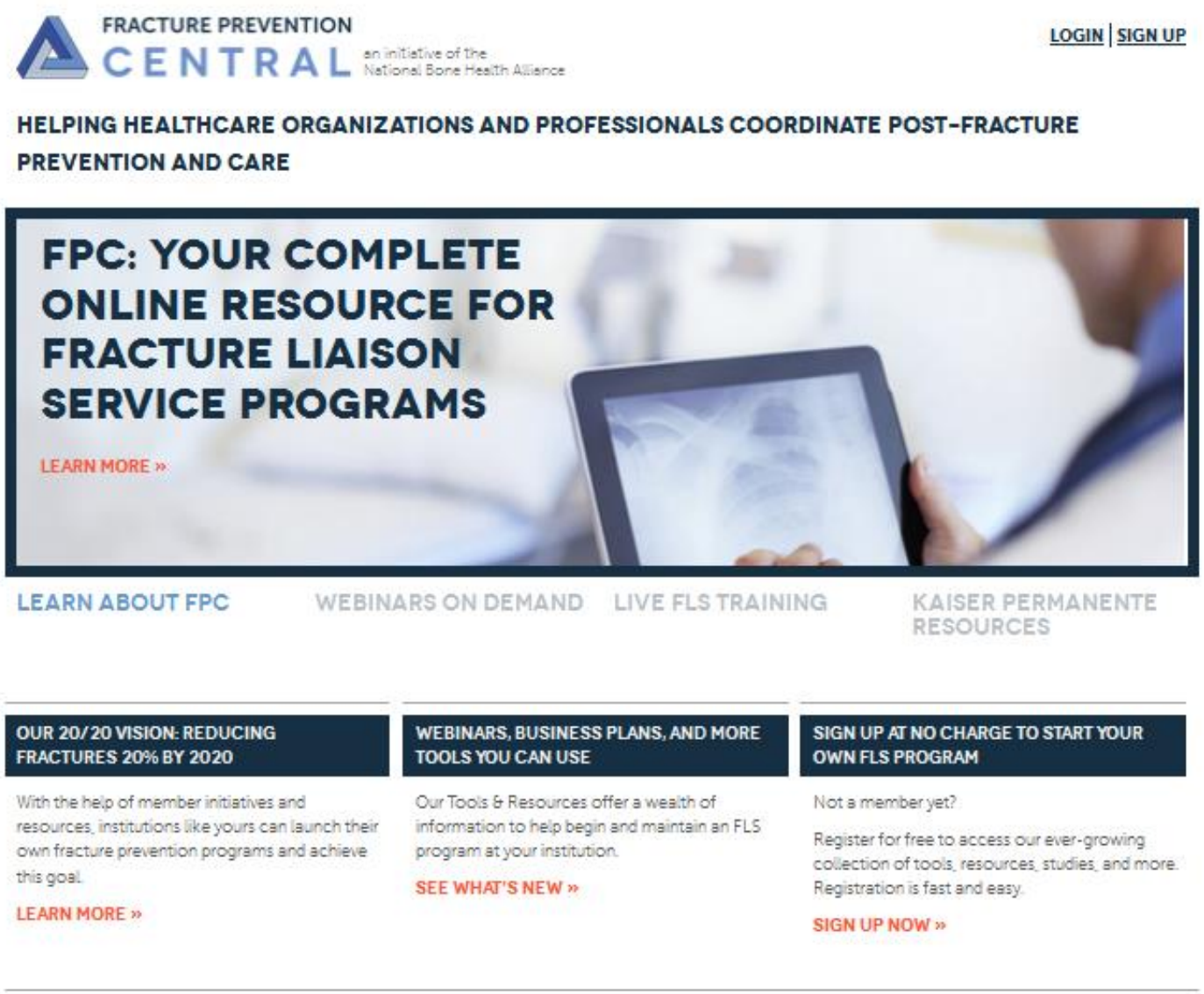
Drug Holiday/ Reference Range launch (Jan)

With sincere thanks to David Lee, Executive Director, NBHA

The Impact of Osteoporosis and Bone Breaks in the United States

"Cast Mountain" represents just <u>1 DAY</u> of fractures caused by osteoporosis in the U.S.

www.FracturePreventionCENTRAL.org

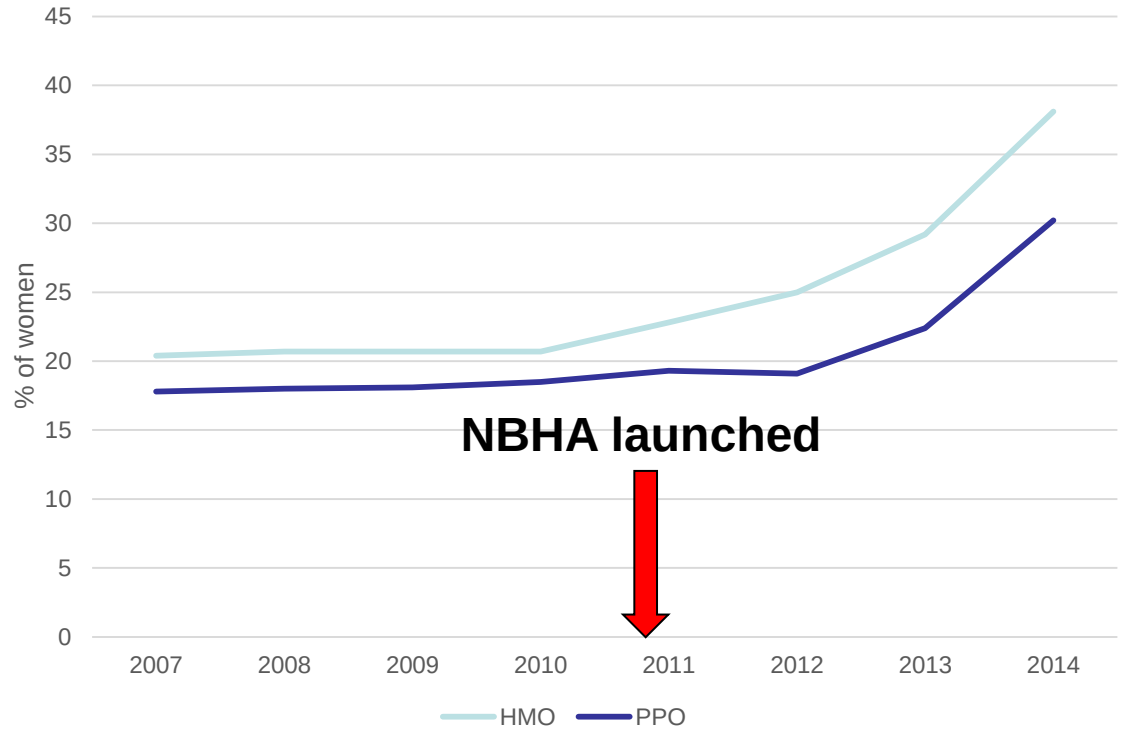


More than 3,100 individual users have signed up to access these tools since March 2013

With sincere thanks to David Lee, Executive Director, NBHA

NBHA
Post-fracture osteoporosis care in the United States

Proportion of women aged 65 - 85 years who had bone mineral density (BMD) testing and/or treatment for osteoporosis



National Committee on Quality Assurance (NCQA)
The State of Health Care Quality 2015
www.ncqa.org/publications

Singapore

ADDRESSING THE CARE GAP IN SECONDARY FRACTURE PREVENTION IN A SINGAPOREAN HOSPITAL: "OPTIMAL"

Manju Chandran, M.D, FACP, FACE, FAMS

Senior Consultant and Director, Osteoporosis and Bone Metabolism Unit, Department of Endocrinology, Singapore General Hospital

OPTIMAL

Osteoporosis Patient Targeted and Integrated Management for Active Living

MOH Funded

7 Government Hospitals and 18 Polyclinics

Age more than 50 years, male or female

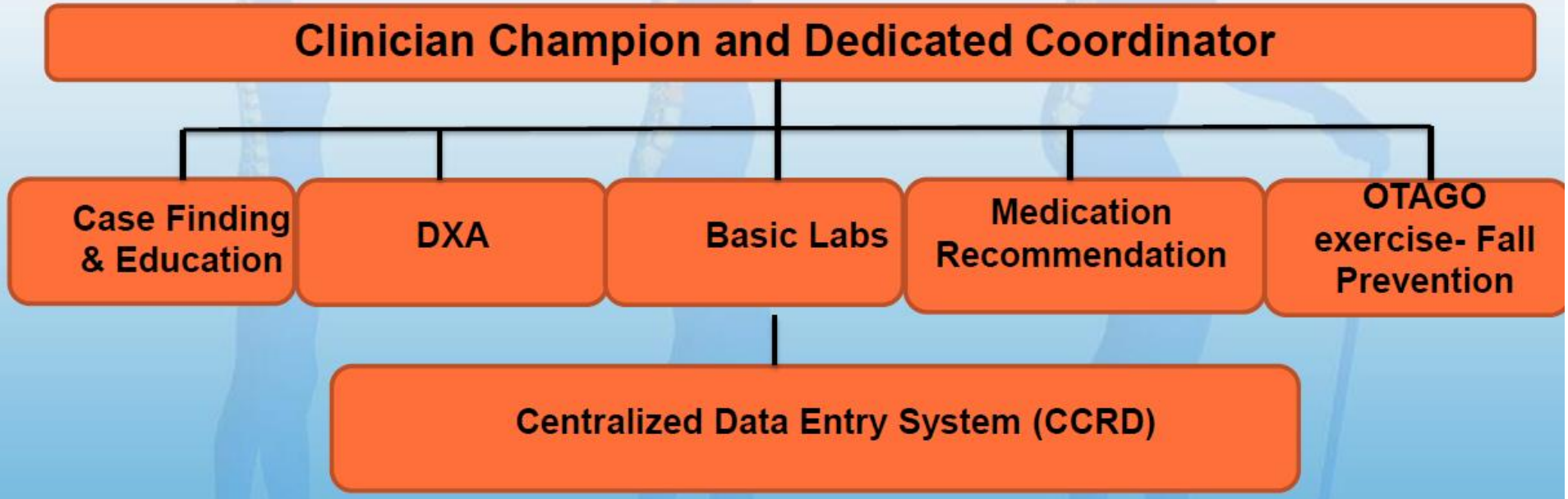
*Fragility Fracture

Able to comply with intervention and follow up for 2 yrs

* Exclude skull, below ankle and beyond wrist

OPTIMAL

Osteoporosis Patient Targeted and Integrated Management for Active Living



*Structured OTAGO exercise program (balance and strengthening): 10 one hour sessions over 6 weeks followed by recommendations for continuing at home/community gym or individual PT over the next 2 years

Highly Facilitated program

- Hired Case Managers with clear Job Descriptions

NOT FOR THE FAINT OF HEART!

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Canada

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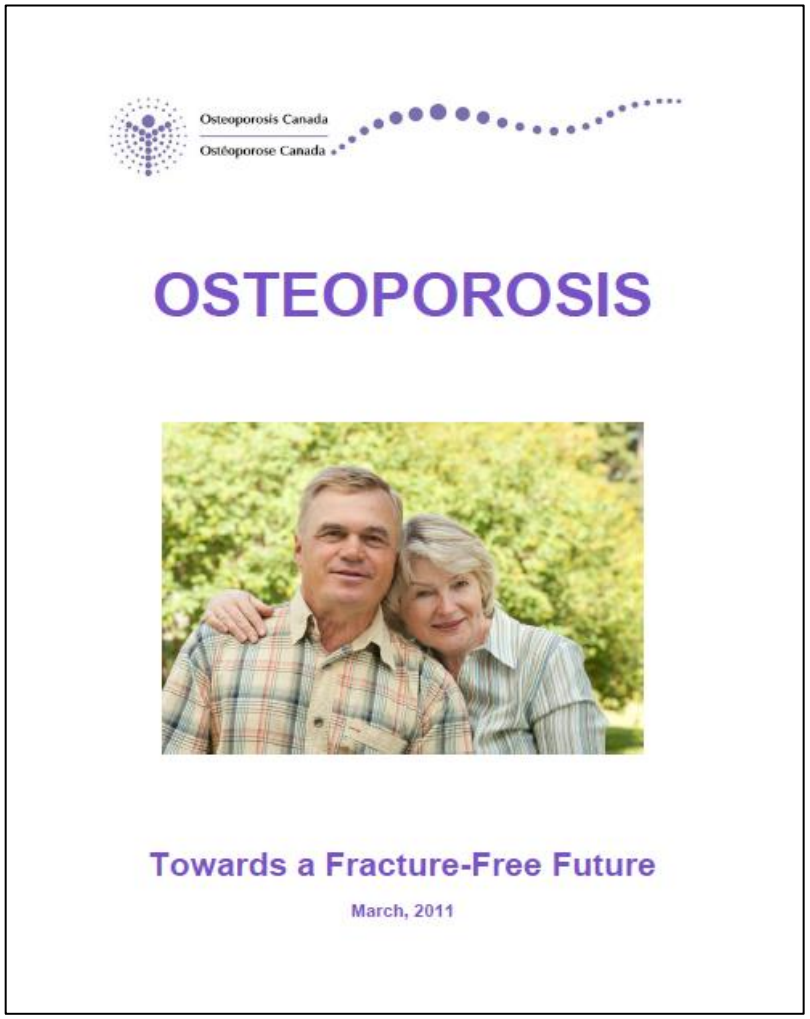
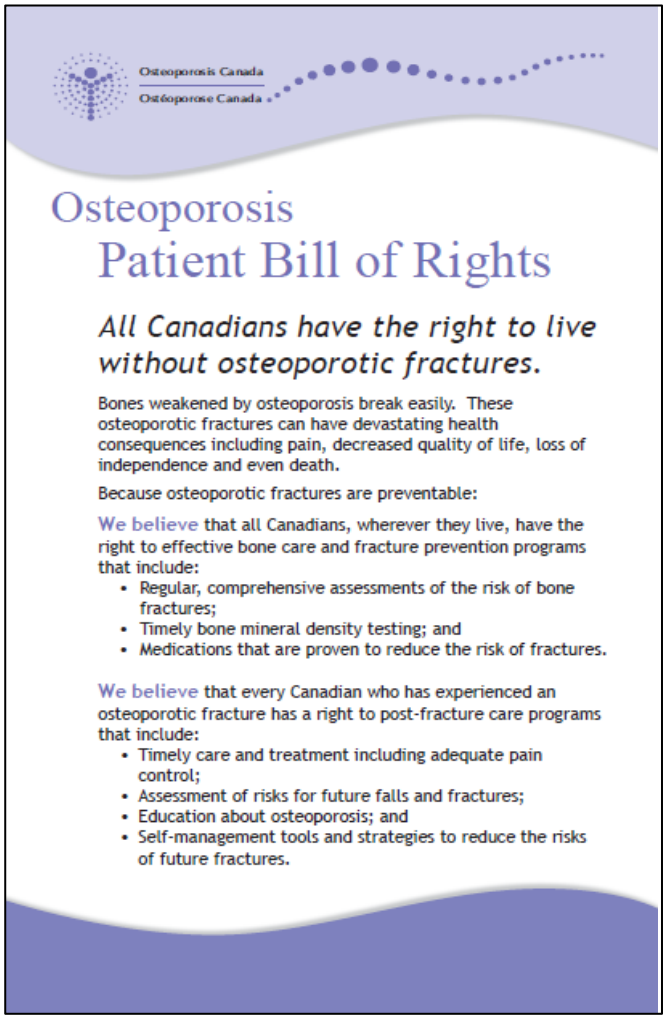
Towards a Fracture-Free Future





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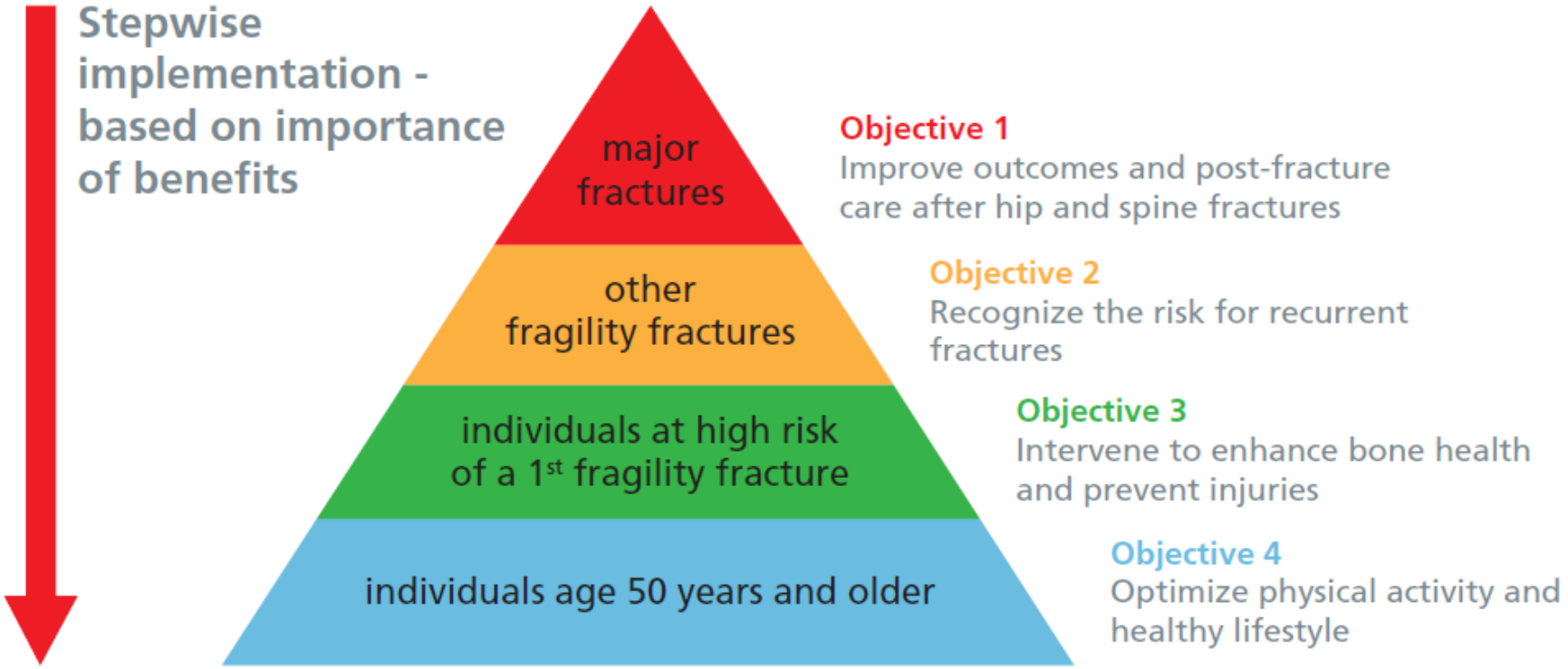
Towards a Fracture-Free Future
'Chipping away at the fracture pyramid'



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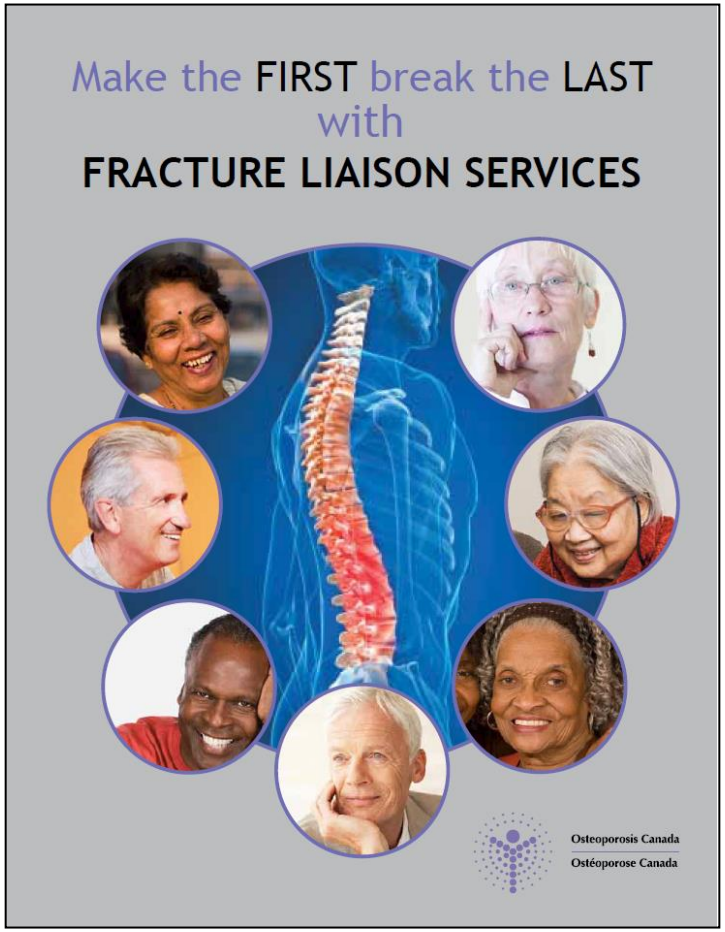
Making the FIRST break the LAST with FLS
A systematic approach for Canada



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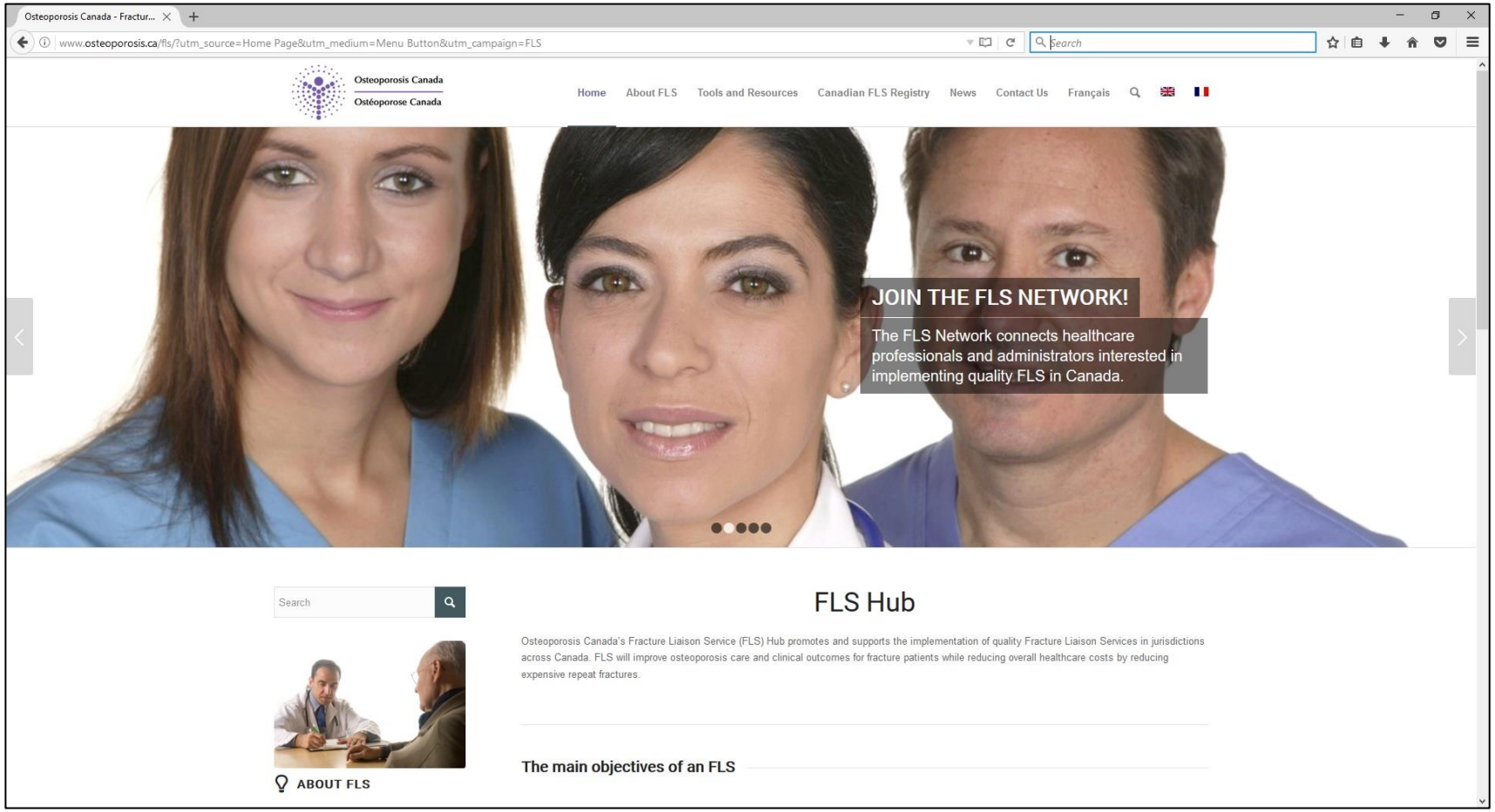
Make the FIRST break the LAST FRACTURE LIAISON SERVICES

Making the FIRST break the LAST with FLS
A systematic approach for Canada



http://www.osteoporosis.ca/

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International initiatives

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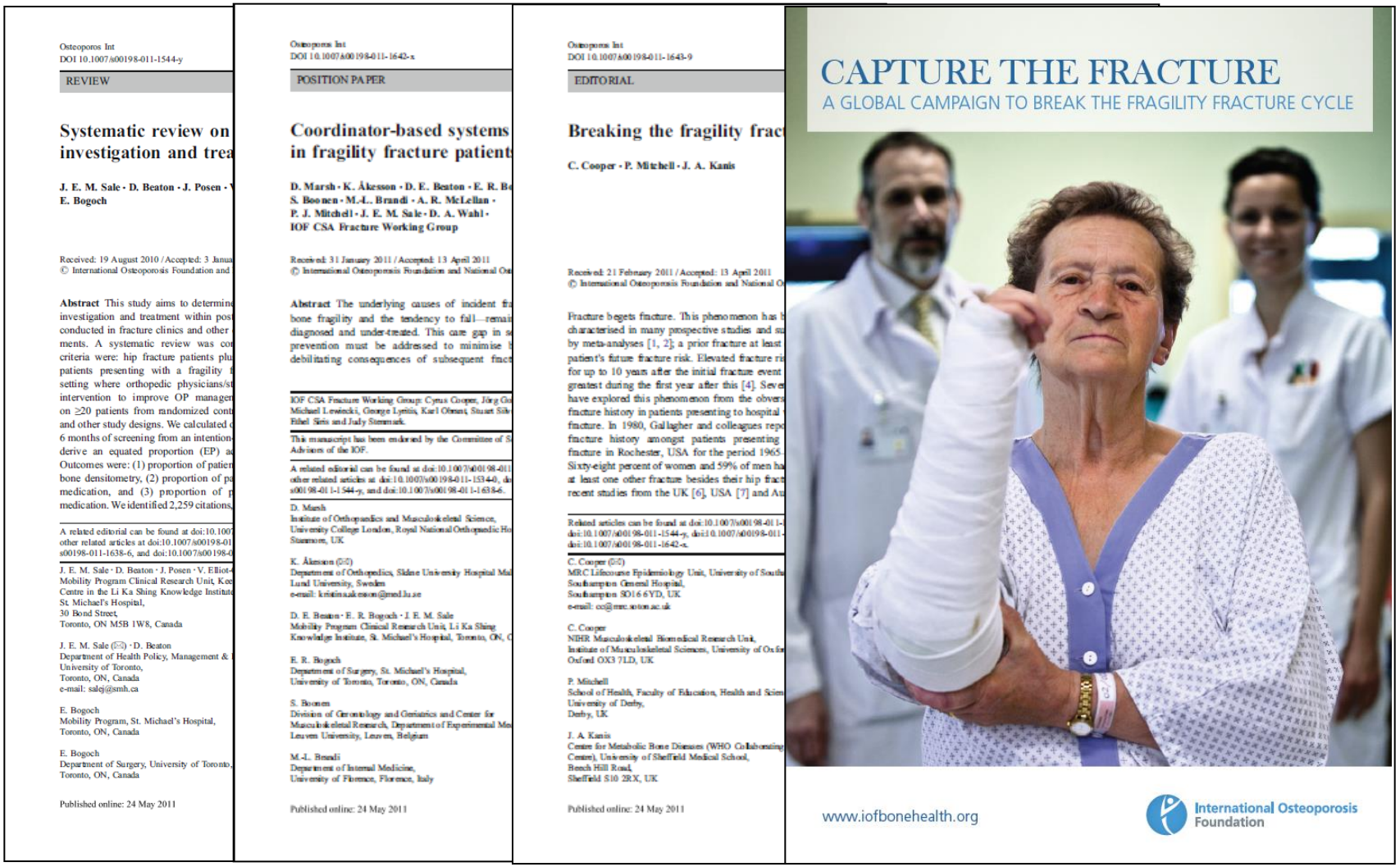
Make the FIRST break the LAST FRACTURE LIAISON SERVICES

IOF Capture the Fracture® Programme



Osteoporos Int
DOI 10.1007/s00198-011-1544-y

REVIEW

Systematic review on investigation and trea

J. E. M. Sale · D. Beaton · J. Posen · E. Bogoch

Received: 19 August 2010 / Accepted: 3 Janua
© International Osteoporosis Foundation and

Abstract This study aims to determine investigation and treatment within pos conducted in fracture clinics and other ments. A systematic review was co criteria were: hip fracture patients plu patients presenting with a fragility f setting where orthopedic physicians/st intervention to improve OP manage on ≥20 patients from randomized cont and other study designs. We calculated 6 months of screening from an intention derive an equated proportion (EP) a Outcomes were: (1) proportion of patie bone densitometry, (2) proportion of pa medication, and (3) proportion of p medication. We identified 2,259 citations,

A related editorial can be found at doi:10.100 other related articles at doi:10.1007/s00198-01 s00198-011-1638-6, and doi:10.1007/s00198-0

J. E. M. Sale · D. Beaton · J. Posen · V. Elliot Mobility Program Clinical Research Unit, Kee Centre in the Li Ka Shing Knowledge Institute St. Michael's Hospital, 30 Bond Street, Toronto, ON M5B 1W8, Canada

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POSITION PAPER

Coordinator-based systems in fragility fracture patient

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Abstract The underlying causes of incident fra bone fragility and the tendency to fall—remai diagnosed and under-treated. This care gap in s prevention must be addressed to minimise t debilitating consequences of subsequent fract

IOF CSA Fracture Working Group: Cyrus Cooper, Jörg Gi Michael Lewiecki, George Lyritis, Karl Ohnsti, Stuart Silv Ethel Siris and Judy Stenmark.

This manuscript has been endorsed by the Committee of S Advisors of the IOF.

A related editorial can be found at doi:10.1007/s00198-011 other related articles at doi:10.1007/s00198-011-1534-0, d s00198-011-1544-y, and doi:10.1007/s00198-011-1638-6.

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EDITORIAL

Breaking the fragility frac

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Fracture begets fracture. This phenomenon has b characterised in many prospective studies and su by meta-analyses [1, 2]; a prior fracture at least patient's future fracture risk. Elevated fracture ri for up to 10 years after the initial fracture event greatest during the first year after this [4]. Seve have explored this phenomenon from the obvers fracture history in patients presenting to hospital fracture. In 1980, Gallagher and colleagues repo fracture history amongst patients presenting fracture in Rochester, USA for the period 1965 Sixty-eight percent of women and 59% of men ha at least one other fracture besides their hip fract recent studies from the UK [6], USA [7] and Au

Related articles can be found at doi:10.1007/s00198-011- doi:10.1007/s00198-011-1544-y, doi:10.1007/s00198-011- doi:10.1007/s00198-011-1642-x.

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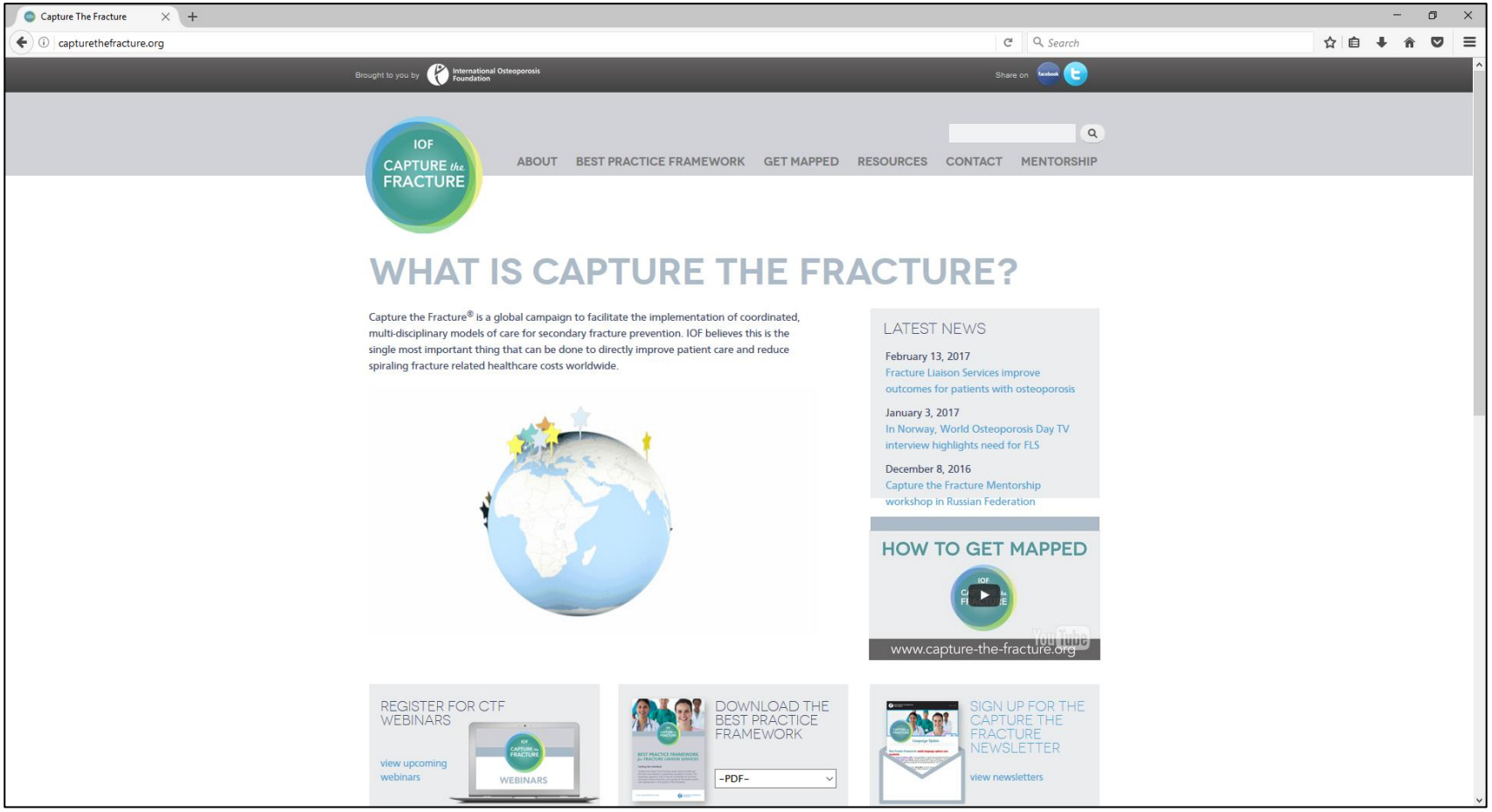

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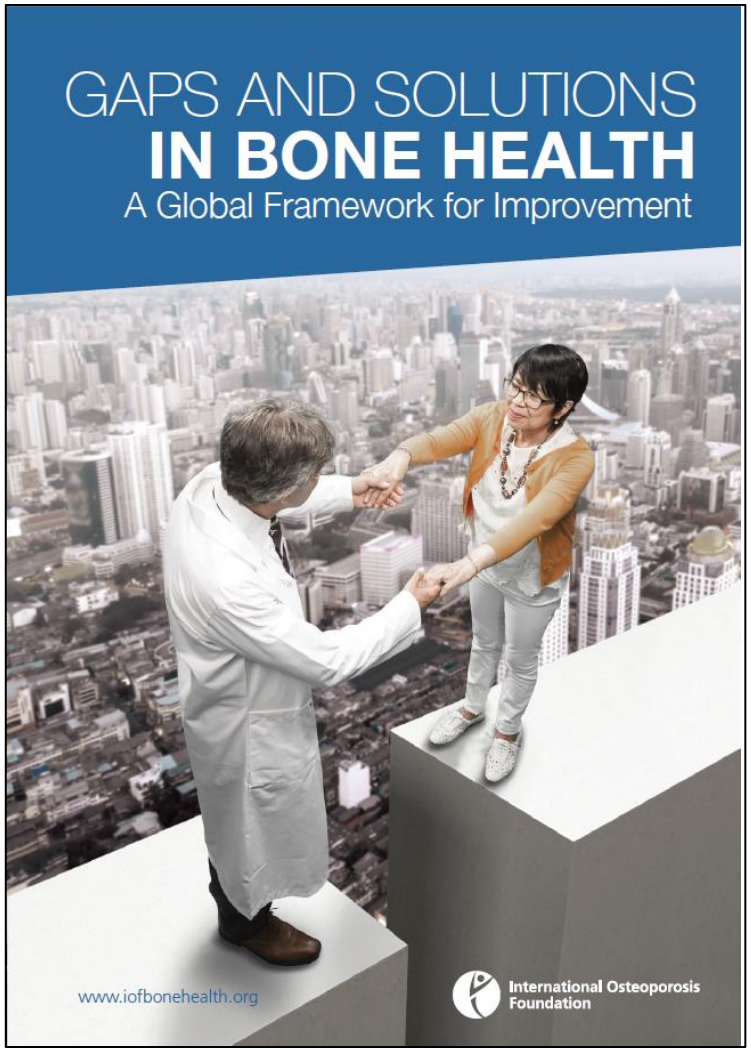

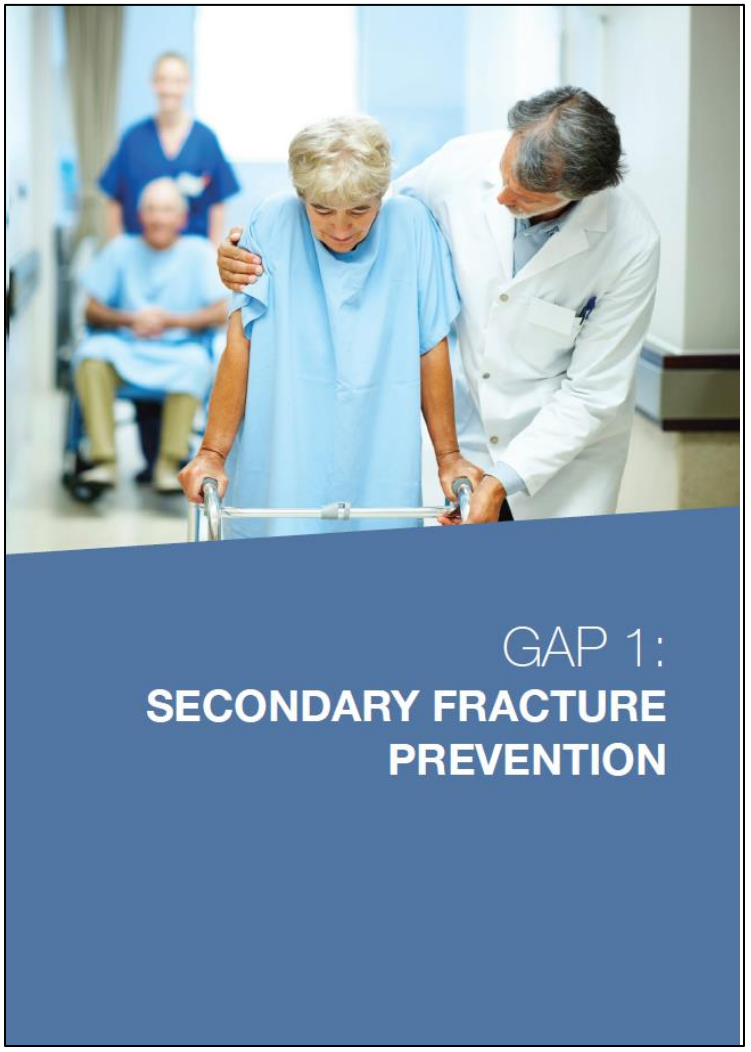

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REVIEW

Mind the (treatment) gap: a global perspective on current and future strategies for prevention of fragility fractures

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Abstract This narrative review considers the key challenges facing healthcare professionals and policymakers responsible for providing care to populations in relation to bone health. These challenges broadly fall into four distinct themes: (1) case finding and management of individuals at high risk of fracture, (2) public awareness of osteoporosis and fragility fractures, (3) reimbursement and health system policy and (4) epidemiology of fracture in the developing world. Findings from cohort studies, randomised controlled trials, systematic reviews and meta-analyses, in addition to current clinical guidelines, position papers and national and international audits, are summarised, with the intention of providing a prioritised approach to delivery of optimal bone health for all. Systematic approaches to case-finding individuals who are at high risk of sustaining fragility fractures are described. These include strategies and models of care intended to improve case finding for individuals who have sustained fragility fractures, those undergoing treatment with medicines which have an adverse effect on bone health and people who have diseases, whereby bone loss and, consequently, fragility fractures are a common comorbidity. Approaches to deliver primary fracture prevention in a clinically effective and cost-effective manner are also explored. Public awareness of osteoporosis is low worldwide. If older people are to be more proactive in the management of their bone health, that needs to change. Effective disease awareness campaigns have been implemented in some countries but need to be undertaken in many more. A major need exists to improve awareness of the risk that osteoporosis poses to individuals who have initiated treatment, with the intention of improving adherence in the

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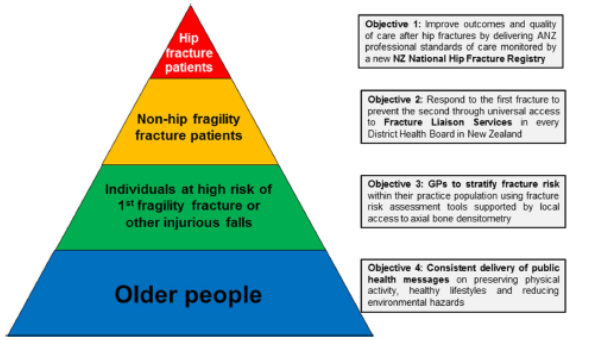

Fig. 1 A systematic approach to fragility fracture care and prevention for New Zealand [66, 67]. Reproduced with kind permission of Osteoporosis New Zealand

estimation of the potential treatment gap for each country in 2010. This approach assumed that all those treated were actually eligible for treatment and not at a lower level of risk, so may have underestimated the treatment gap among high-risk patients. In total in the EU, 10.6 million out of 18.4 million women who were eligible received treatment. Among men, 1.7 million men out of the 2.9 million men who were eligible received treatment.

Strategies to prevent first fractures could function through several 'tracks'. For example, the next two sections of this review, relating to osteoporosis induced by medicines and diseases associated with osteoporosis, will, in part, serve to deliver primary fracture prevention in a systematic fashion. The advent of absolute fracture risk calculators, such as the FRAX® tool, provides a means to stratify fracture risk in the entire older population. The UK National Osteoporosis Guideline Group (NOGG) has based its guidance on FRAX®, where an intervention threshold for 40 to 90 year olds is set at a risk equivalent to that expected in a woman with a prior fracture [79]. Many countries have subsequently adopted the approach taken by NOGG [9]. The US National Osteoporosis Foundation (NOF) guidance recommends initiation of treatment in the following three scenarios [80]:

- In those with hip or vertebral (clinical or asymptomatic) fractures.
- In those with T-scores ≤−2.5 at the femoral neck, total hip or lumbar spine by DXA.
- In postmenopausal women and men age 50 years old or older with low bone mass (T-score between −1.0 and −2.5, osteopenia) at the femoral neck, total hip or lumbar spine by DXA and a 10-year hip fracture probability ≥3% or a 10-year major osteoporosis-related fracture probability ≥20% based on the US version of FRAX®.

Table 4 Proportion of women in European countries with and without prior fracture history in 2010

Country	Women aged ≥50 years[a]	Women with prior history of ≥1 fracture[a] (%)	Women without prior fracture history[a] (%)	Reference
France	12,200	1272 (10.4)	10,928 (89.6)	Cawston et al. [70]
Germany	17,661	2490 (14.1)	15,171 (85.9)	Gauthier et al. [71]
Italy	12,900	2093 (16.2)	10,807 (83.8)	Piscitelli et al. [72]
Sweden	1836	0.418 (22.8)[b]	1418 (77.2)	Gauthier et al. [69]
UK	11,494	1544 (13.4)	9950 (86.6)	Gauthier et al. [73]

[a] In thousands
[b] Value for 2010 estimated by creation of linear series based on values for 2009 and 2020 specified in the publication

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- Consensus guidelines
- Quality standards
- Systematic performance measurement

for the care of older people with fragility fracture.

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http://fragilityfracturenetwork.org/

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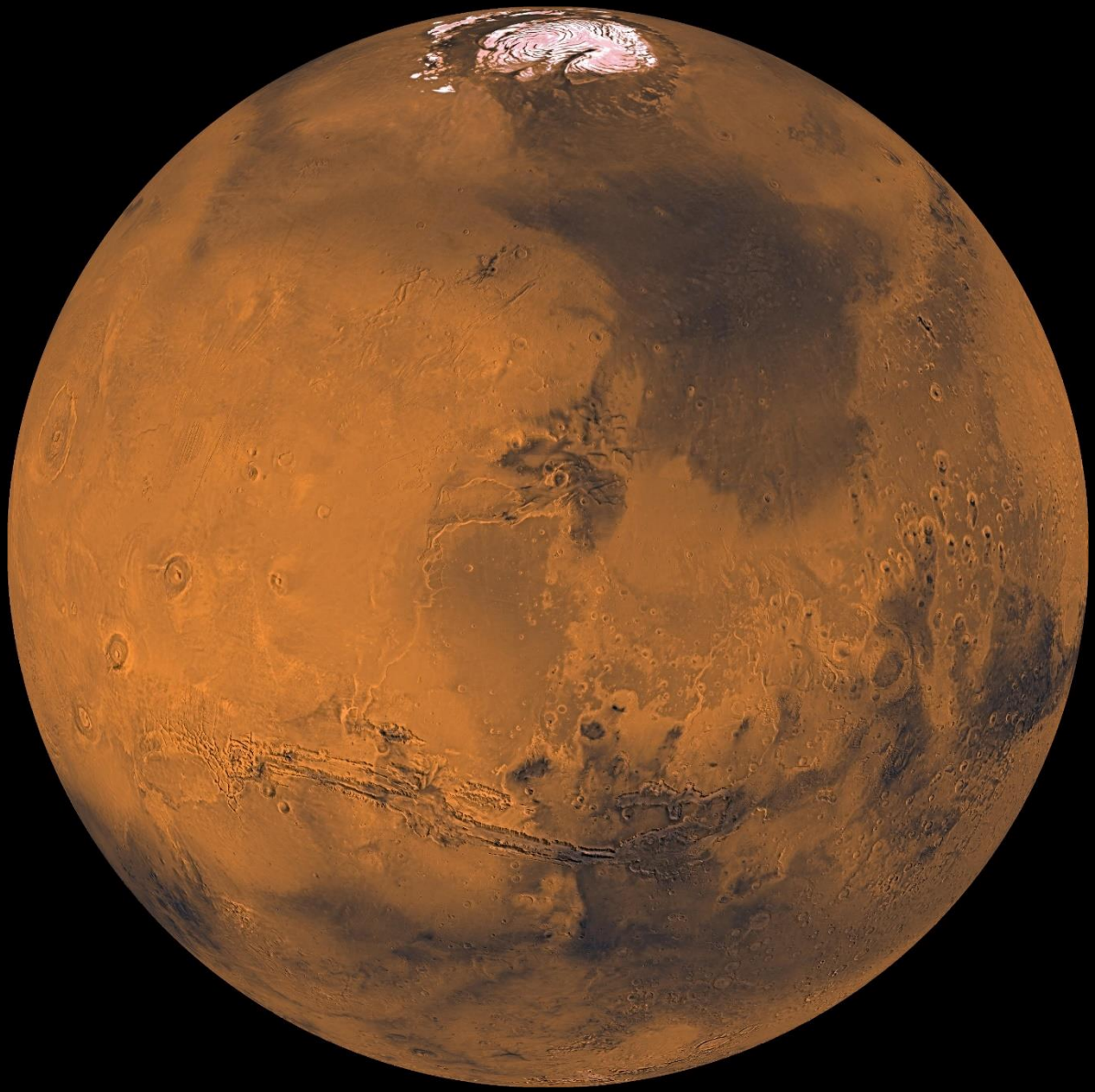
Where do we go from here?



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