

SELF MEDICATION – INTEGRATING COMPLEMENTARY MEDICINES WITH OTCS AND PRESCRIPTION MEDICINES

Dr Lesley Braun PhD

Snr Research Fellow

Dept Surgery, Monash University

Research Pharmacist, Alfred Hospital, Melbourne

Vice President National Herbalists Association of
Australia



MONASH University
Medicine, Nursing and Health Sciences

Where are we going today?

- Medication & professional services use by Australian pharmacy customers
 - ▣ Customer expectations of pharmacy practice and complementary medicine integration
 - ▣ Safety of OTC complementary medicine products & how consumers manage safety issues

- Pharmacy practice & integration of complementary medicine
 - ▣ Hospital and community settings

- Integrative solutions

- Integrative models emerging in community medical and pharmacy practice settings

Braun et al. *BMC Complementary and Alternative Medicine* 2010, **10**:38
<http://www.biomedcentral.com/1472-6882/10/38>



RESEARCH ARTICLE

Open Access

Perceptions, use and attitudes of pharmacy customers on complementary medicines and pharmacy practice

Lesley A Braun^{1,2*}, Evelin Tiralongo³, Jenny M Wilkinson⁴, Ondine Spitzer², Michael Bailey⁶, Susan Poole⁵, Michael Dooley⁵

Medication & professional services use by Australian pharmacy customers

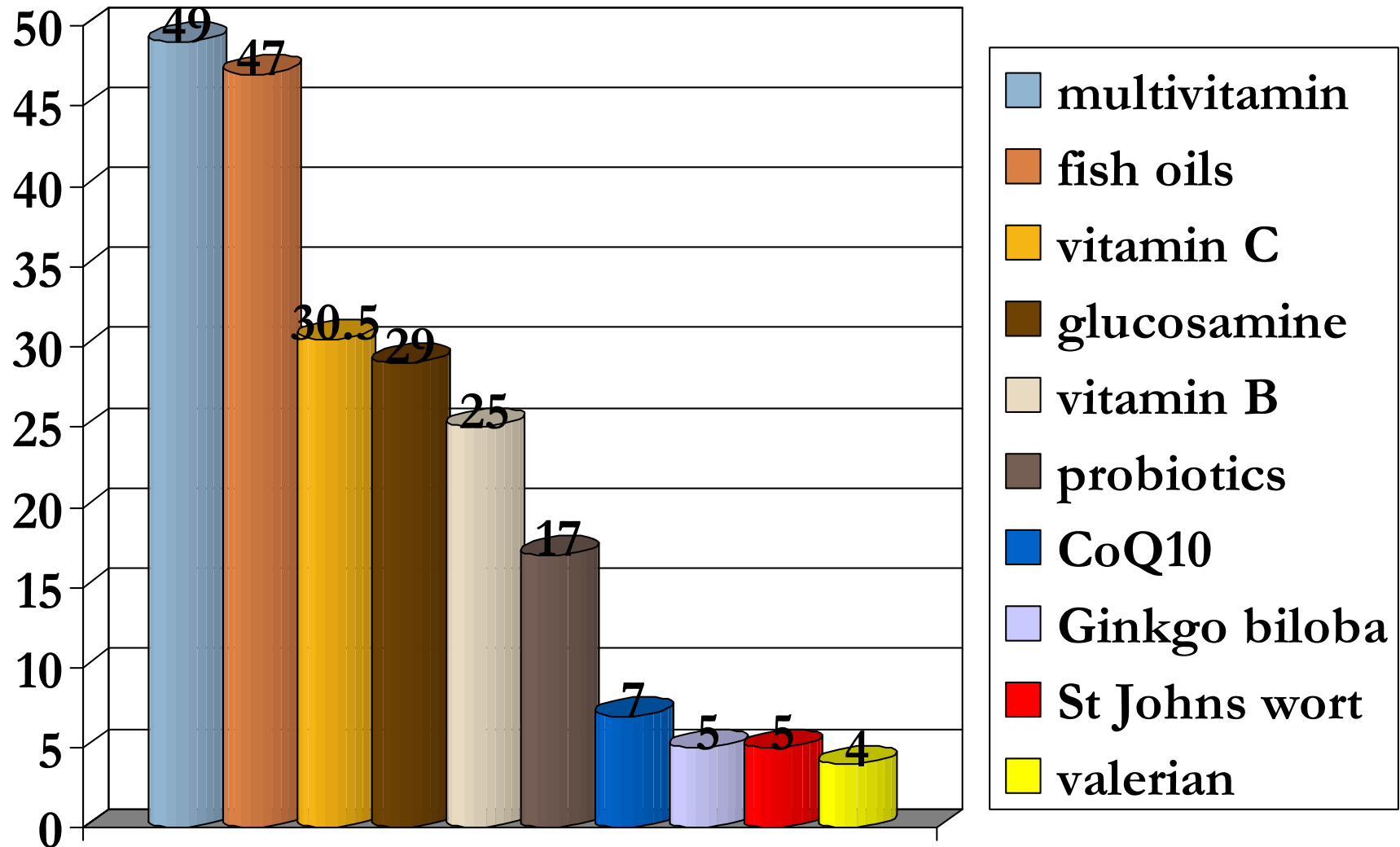
Survey of 1131 pharmacy customers attending
60 community pharmacies (Vic, NSW, Qld)

In the previous 12 months :

- ▣ 61% used prescription medicines
- ▣ 93% visited a medical doctor

- ▣ **71% took a CM product**
- ▣ 39% saw a CM practitioner

What CMs were taken ? (n=793)



Who recommends your CM products ?



- **Myself** 42%
- Medical doctor 32%
- Friends/family 20%
- Naturopath/herbalist 20%
- Pharmacy assistant 12.5%

Are your CMs effective ?

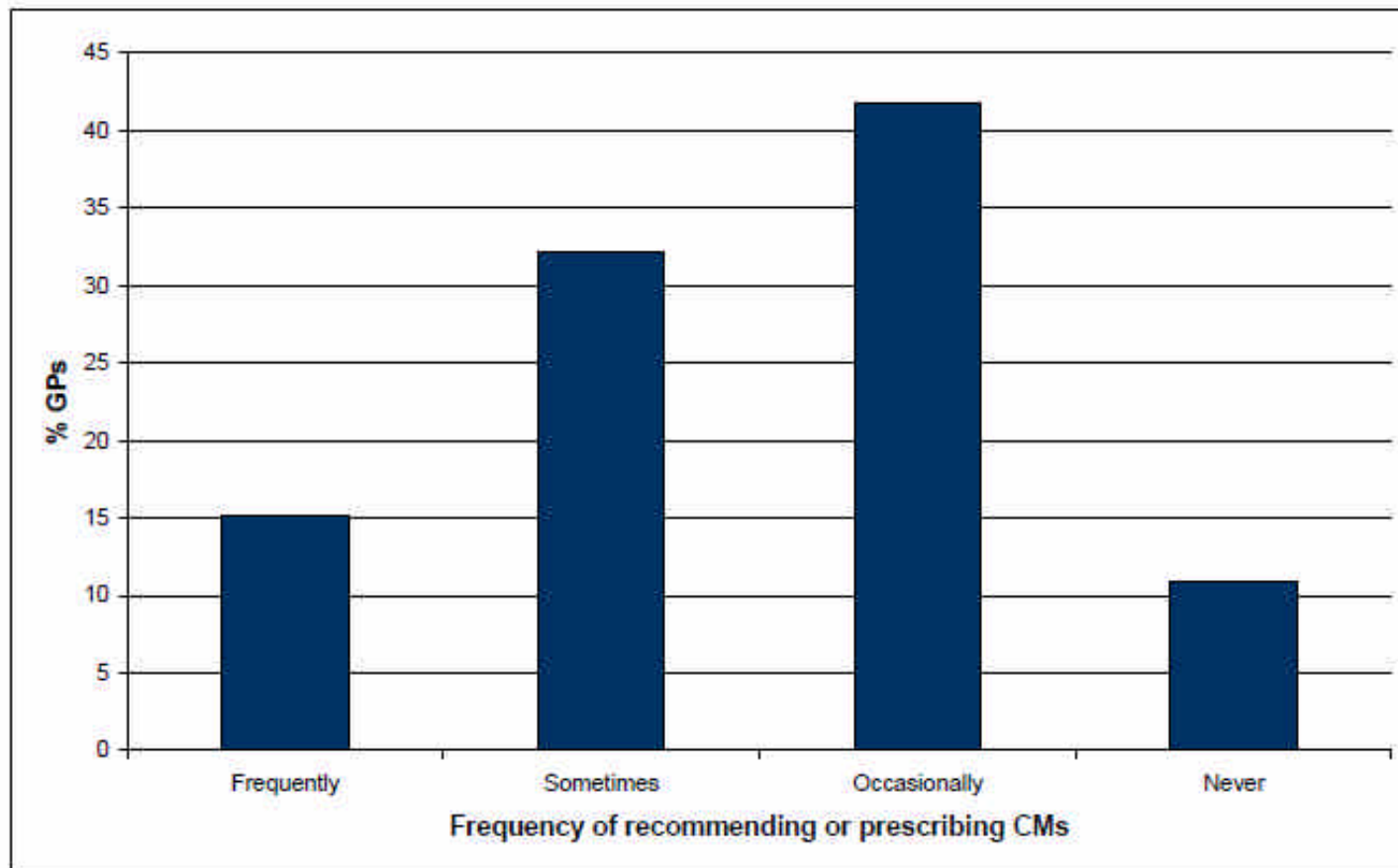


- 30% very effective
- 42% effective enough
- 10% somewhat effective
- 16% unsure
- 0.5% not effective



1/3rd GPs practice IM

Figure 2. GP's frequency of recommending or prescribing complementary medicines in the last 12 months, NPS Complementary Medicines GP Survey 2008, n=1178



Brown J, Morgan T, Adams J, Grunseit A, Toms M, Roufogalis B, Kotsirilos V, Pirotta M and Williamson M. Complementary Medicines Information Use and Needs of Health Professionals: General Practitioners and Pharmacists. National Prescribing Service, Sydney, December 2008.

Is self care with CM likely to increase?

- Yes, chiefly due to our **ageing population** & associated increased prevalence of chronic health conditions
 - ▣ By definition, these conditions have **no conventional medicine 'cure'**
 - So the role of CM in ameliorating symptoms, promoting health and enhancing healing seems **particularly relevant**.
 - Communities, friends and families play a crucial role in meeting continuing care needs of people with chronic health conditions
 - CM used to improve symptoms, reduce side effects of drug therapy, reduce reliance on drug therapy

Pharmacy customer survey



Use of CMs doesn't reduce with age


Over 50 yrs vs under 50:	71% vs 71%	NS
Over 60 yrs vs under 60:	69% vs 72%	NS

Braun L et al. BMC CAM July; 2010

Is self care with CM likely to increase?



- Yes, increased public access to information about CM
- Yes, increased sense of entitlement to good QOL
- Yes, increased interest in personal wellness & active healthcare
- Yes, decreased interest in paternalism

- 
- Patients are researching and exploring CM therapies on their own because mainstream medical communities provide little help

[Complementary Therapies in Clinical Practice;13\(4\)](#), 2007, 232-239

- Pharmacists are no better at providing guidance

Braun L et al. BMC CAM July; 2010

Customers expect more from pharmacists

(results from total sample ie CM users + non-users)



- 92% thought pharmacists should provide safety information about CMs
- 90% thought pharmacists should check for drug-CM interactions
- 87% thought pharmacists should recommend CMs if they are effective
- 77% thought pharmacists should record CM use in medication profiles

What do consumers want?



- More information on CM product labels
- More product information in general
- More information from pharmacists

- Access to naturopaths in pharmacy (!)
 - ▣ 56% of total sample
 - ▣ Approx 2/3rds of CM users

Safety of OTC CM products

IJPP
International Journal of
Pharmacy Practice

IJPP 2010, 18: 242–244
© 2010 The Authors
Journal compilation © 2010
Royal Pharmaceutical Society of
Great Britain
Received December 9, 2009
Accepted April 8, 2010
DOI
10.1111/j.2042-7174.2010.00036.x
ISSN 0961-7671

Short Communication

Adverse reactions to complementary medicines: the Australian pharmacy experience

Lesley A. Braun^{a,b}, Evilin Tiralongo^c, Jenny M. Wilkinson^d,
Susan Poole^e, Ondine Spitzer^b, Michael Bailey^f and
Michael Dooley^b

^aCardiothoracic Surgical Research Unit, Department of Surgery, Monash University Alfred Hospital, Melbourne, ^bDepartment of Pharmacy, Alfred Hospital, Melbourne, ^cDepartment of Pharmacy, Griffith University, Gold Coast, Queensland, ^dSchool of Biomedical Sciences, Charles Sturt University, Wagga Wagga, ^eFaculty of Pharmacy and Pharmaceutical Sciences, Monash University, Parkville and ^fDepartment of Epidemiology and Preventive Medicine School Public Health & Preventive Medicine, Monash University, Melbourne, Australia

Safety of OTC CM products



- Have you ever experienced a side effect to a CM product?

- ▣ 7% of CM users YES (n=56)

How serious was it?

- ▣ Of those reporting a side effect
 - 56% 'mild- no treatment required'
 - 19% 'moderate – required a visit to Dr or other healthcare provider'
 - 6% 'severe – required hospitalisation'

CM users
N=793

Side effect?

NO
N=738
(93%)


YES (7%)
N=56

**Decreased
the dose**
**0.5% CMs
users**
N=4

**Changed
to
another
CM product**
**0.9% of
CMs users**
N=7

**Got advice
From a
healthcare
Professional**
**0.9% of
CMs users**
N=7

**Stopped
Product**
**5% of
CMs users**
N=43

- 
- A substantial number of pharmacy customers choose CMs by themselves or based on advice from family and friends
 - Most think their CMs are effective
 - Few people using CMs are experiencing serious adverse reactions, according to self-report
 - If they do experience a side effect, most manage this on their own

***i.e. self care not only involves selecting CM products
but also managing CM-induced side effects***

Evolution of the pharmacy practice model



- 1970's
 - ▣ Distribution of pharmaceutical medicines
 - Automation virtually non-existent
 - Patient records were all paper-based
 - Relatively few prescription & OTC medicines compared to today
 - **Virtually no complementary medicine products**
OTC in pharmacy

Evolution of the pharmacy practice model & CM integration

Hospital pharmacy

Clinical pharmacists on wards providing advice on rational prescribing

Drug information specialists

Specialised drug preparation by pharmacists

Outreach pharmacists

Clinical trial pharmacists

Research pharmacists

Little integration with complementary medicine

Community pharmacy

Medication review specialists

Pharmacy specialists

wound care,

diabetes,

weight loss,

Integration of complementary medicine began in 1990s

OTC CM major category in pharmacy

IM specialist pharmacists??

Journal of Complementary and Integrative Medicine

Volume 7, Issue 1

2010

Article 37

Exploring the Integration of Complementary Medicines into Australian Pharmacy Practice with a Focus on Different Practice Settings and Background Knowledge

Evelin Tiralongo, *Griffith University*

Lesley A. Braun, *Monash University*

Jenny M. Wilkinson, *Charles Sturt University*

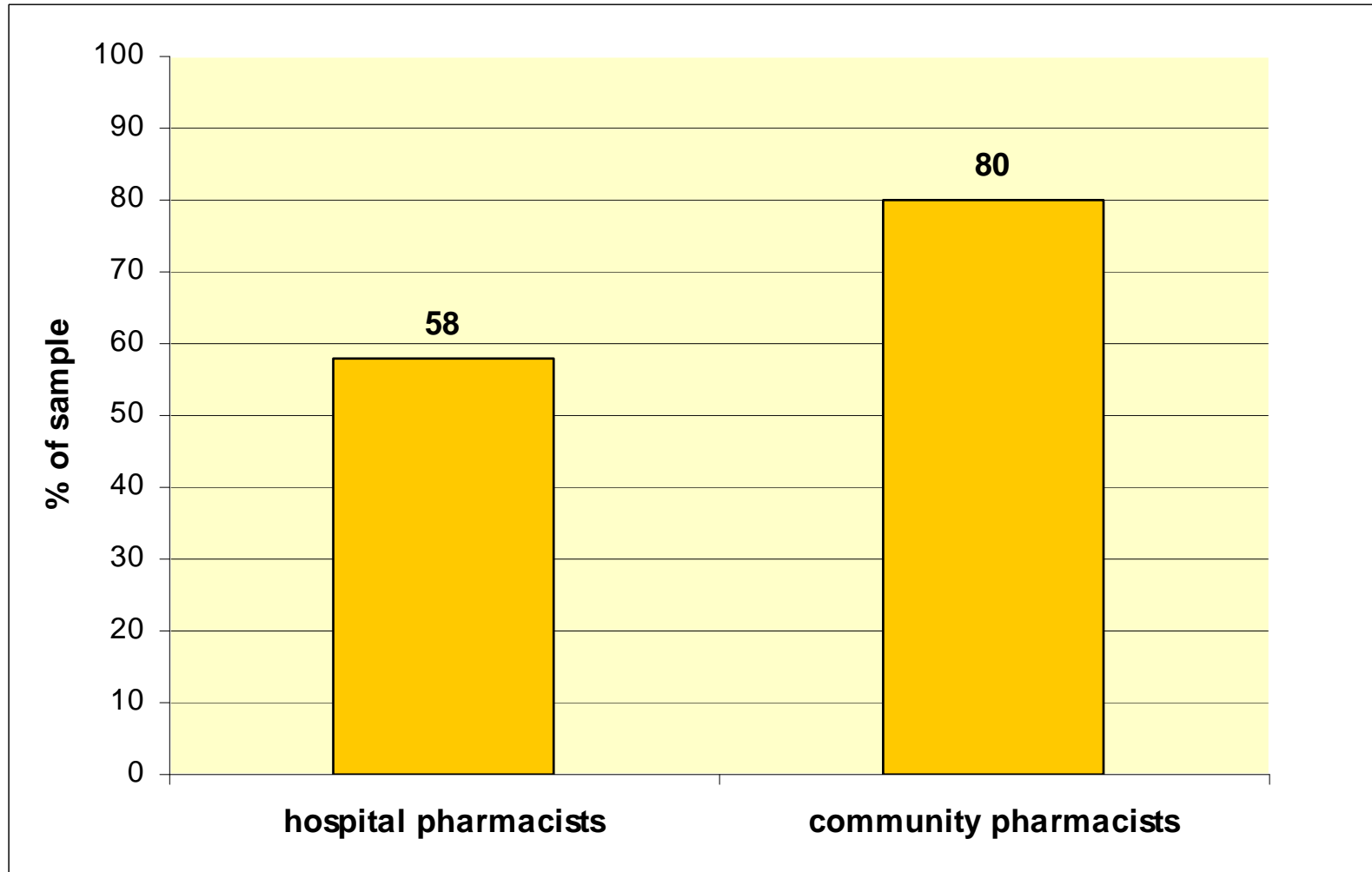
Ondine Spizer, *Alfred Hospital*

Michael Bailey, *Monash University*

Susan Poole, *Alfred Hospital*

Michael Dooley, *Alfred Hospital*

Pharmacists use of CM products (n=736)



National Pharmacist survey (n=736)

- **Over 80%** of the total sample strongly agreed or agreed that
 - ▣ 'Customers are now expecting more information about CMs from their pharmacist than 5 years ago'
 - ▣ 'pharmacists have a professional responsibility to counsel customers about CMs'
 - ▣ 'pharmacists should play a greater role in providing customers with safety and drug interaction information about CMs'.
- **76%** thought it was **very important** for under-graduate pharmacists to learn about evidence-based CMs
- **85%** themselves were interested in further training.

Why aren't pharmacists integrating CM products?

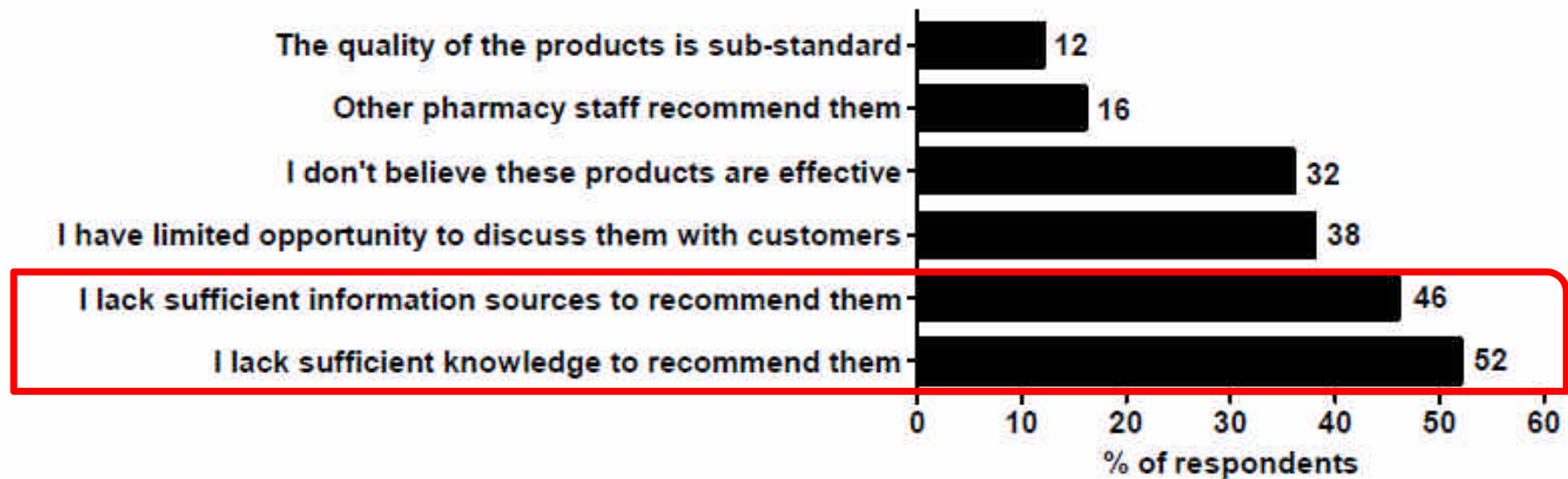


Figure 2: Factors preventing pharmacists from recommending CM products (up to 3 possible responses)

Beneficial interactions – Integrative medicine solutions



Potential patient benefits with integration of CM + pharma medicines

- 1. Reduced drug side effects
 - E.g. Probiotics preventing antibiotic-induced diarrhoea

PROBIOTICS IN THE PREVENTION OF ANTIBIOTIC-ASSOCIATED DIARRHEA IN CHILDREN: A META-ANALYSIS OF RANDOMIZED CONTROLLED TRIALS

HANIA SZAJEWSKA, MD, MAREK RUSZCZYŃSKI, MD, AND ANDRZEJ RADZIKOWSKI, MD

Objective To systematically evaluate the effectiveness of probiotics in preventing antibiotic-associated diarrhea (AAD) in children.


Study design The following electronic databases up to December 2005, in any language, were searched for studies relevant to AAD and probiotics: MEDLINE, EMBASE, and The Cochrane Library. Only randomized controlled trials (RCT) were considered for study inclusion.

Results Six placebo-controlled, RCTs (766 children) were included. Treatment with probiotics compared with placebo reduced the risk of AAD from 28.5% to 11.9% (relative risk, RR, 0.44, 95% CI 0.25 to 0.77, random effect model). Preplanned subgroup analysis showed that reduction of the risk of AAD was associated with the use of *Lactobacillus* GG (2 RCTs, 307 participants, RR 0.3, 95% CI 0.15 to 0.6), *S. boulardii* (1 RCT, 246 participants, RR 0.2, 95% CI 0.07-0.6), or *B. lactis* & *Str. thermophilus* (1 RCT, 157 participants, RR 0.5, 95% CI 0.3 to 0.95).

Conclusions Probiotics reduce the risk of AAD in children. For every 7 patients that would develop diarrhea while being treated with antibiotics, one fewer will develop AAD if also receiving probiotics. (*J Pediatr* 2006;149:367-72)

Potential patient benefits with integration of CM + pharma medicines

- 2. Improved surgical outcomes
 - ▣ E.g. CoQ10, fish oils, alpha lipoic acid, magnesium orotate before cardiac surgery
 - Significantly reduced incidence of post-surgery atrial fibrillation and reduced 24h troponin I (cardiac muscle damage)



Original Article

Perioperative metabolic therapy improves redox status and outcomes in cardiac surgery patients: A randomised trial

Jee-Yoong Leong, MBBS^a, Juliana van der Merwe, RN^a, Salvatore Pepe, PhD^a, Michael Bailey, PhD^b, Anthony Perkins, PhD^c, Robyn Lymbury, PhD^c, Donald Esmore, FRACS^a, Silvana Marasco, MS^a and Franklin Rosenfeldt, MD, FRACS^{a,b,*}

^a *Cardiac Surgical Research Unit, Alfred Hospital, Department of Surgery Monash University, Baker IDI Institute, Melbourne, Australia*

^b *Department of Epidemiology & Preventive Medicine, School Public Health & Preventive Medicine, Monash University Alfred Hospital, Melbourne, Australia*

^c *Heart Foundation Research Centre, School of Medical Science, Griffith University Gold Coast Campus, Queensland, Australia*

(Heart, Lung and Circulation 2010;19:584–591)

Potential patient benefits with integration of CM + pharma medicines

- 3. Improving tolerance to drug and reducing long-term side effects
 - E.g. Reducing the incidence of peripheral neuropathy caused by chemotherapy
 - 3 RCTs show adjunctive vitamin E significantly reduces incidence of peripheral neuropathy
 - Braun & Cohen, Herbs and natural supplements- an evidence based guide 3rd ed; 2010
 - Incidence ranges from **30- 40%** of patients receiving chemotherapy – can cause cessation of treatment and/or irreversible long-term damage

The role of an integrated approach

- To address particular health priorities which may not be currently addressed by their doctor
 - ▣ E.g. quality of life when not adequately addressed by drug therapies or surgery

- When conventional treatment concludes e.g. cancer
- When conventional treatment is ineffective or not effective enough
- To mitigate side effects of conventional medicine

- To maximise health and wellbeing
- As part of a preventative healthcare approach

- To be treated as a “whole person”

current & emerging models

- Current models in general practice/ pharmacy
 - ▣ Informed GP/pharmacist integrating CM recommendations
 - ▣ Pharmacist referring CM enquiries to pharmacy assistant
- Emerging models :
 - ▣ Pharmacists/GPs employing naturopaths to provide CM
 - ▣ Pharmacists/GPs collaborating with naturopaths

EMPLOYMENT OF NATUROPATHS IN THE PHARMACY SETTING

Eighteen percent (n=95) of the 525 community pharmacists reported that their pharmacy currently employs a naturopath. Of these community pharmacists, 64% (n=63) described the service provided by naturopaths as valuable, whereas 3% (n=3) reported it was not. Approximately half of the community pharmacists (51%, n=261) stated they would consider employing a naturopath.

The image is a collage with several elements. At the top left, there's a bowl of salad with tomatoes, cucumbers, and lettuce. To the right, there are two ears of yellow corn on the cob against a blue sky. Below the corn, there are three glass bottles, one containing a red liquid. At the bottom right, there are two heads of garlic, one whole and one partially peeled. The text is overlaid on these images in two slanted boxes.

Integrative
medicine is here to
stay and will only
get BIGGER

The safest & most effective recipes
for good health must use quality
ingredients & be based on good
information and advice &
sometimes ...professional input