

EBM Resources in the Palm of your Hand

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KFSH & RC, Feb. 2013



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Message:

106

How to practice EBM
using my iPad?

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Say.

What is mobile platform?

- * Platform = a standard for the hardware of a computer system, which determines what kinds of software it can run (Oxford)
 - * such as: such as Mac OS, Linux or Windows that controls a desktop computer or laptop
- * Mobile platforms:



What is the platform of your phone device?

1. Apple's iOS
2. Google's Android
3. Microsoft's Windows Mobile
4. RIM's BlackBerry OS
5. Nokia's Symbian
6. Palm OS
7. Feature phone
8. Other
9. None



What is the platform of your tablet device?

1. Apple's iOS (iPad)
2. Google's Android
3. Microsoft's Windows
4. RIM's BlackBerry OS
5. Other
6. None



Context drives device choice

Today consumers own multiple devices and move seamlessly between them throughout the day



The device we choose to use at a particular time is often driven by our **context**:



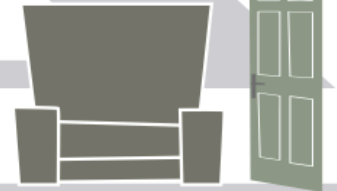
The amount of **time** we have or need



The **goal** we want to accomplish



Our **location**



Our **attitude** and state of mind

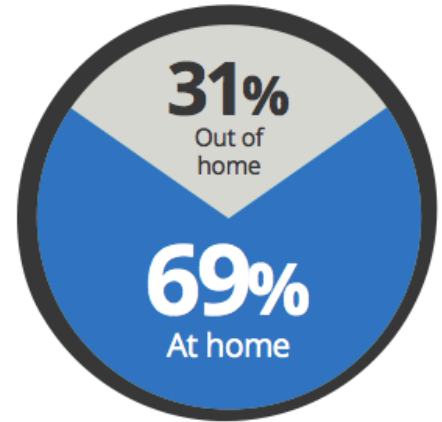
Computers keep us productive and informed

Context:

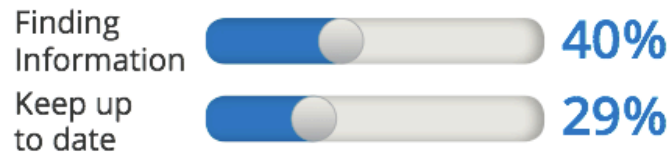
- *Office or home use*
- *Productive, task-oriented*
- *Requires lots of time & focus*
- *Serious, research intensive attitude*

24%

of our daily media interactions occur on a PC



PC use is motivated by:



Smartphones keep us connected

Context:

- On-the-go as well as at home
- Communicate and connect
- Short bursts of time
- Need info quickly and immediately

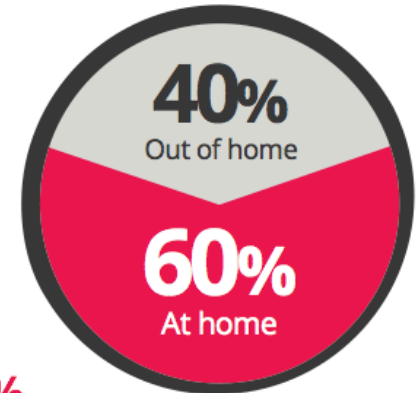
38%

of our daily media interactions occur on a smartphone

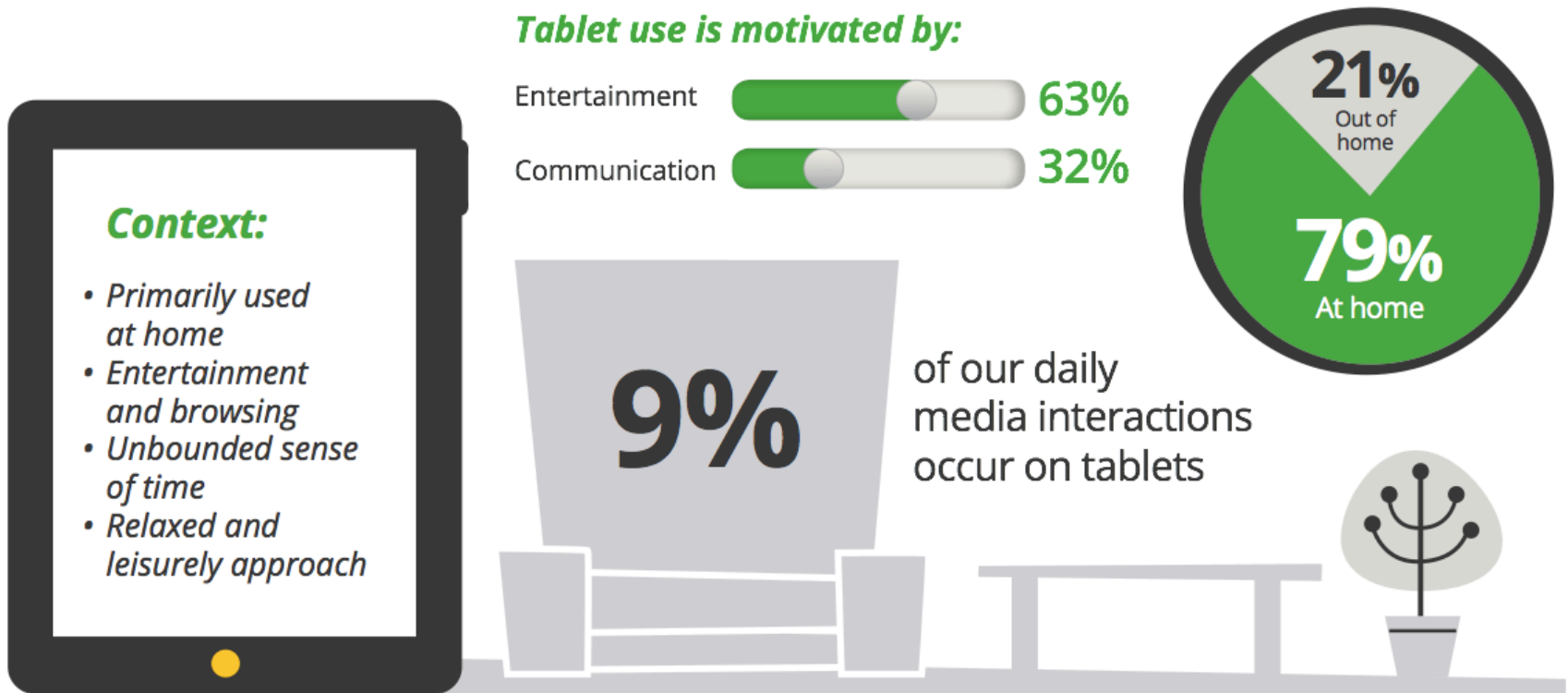
Smartphone use is motivated by:

Communication  54%

Entertainment  33%



Tablets keep us entertained



Consumer viewpoints on device differences



"My phone... I consider it my **personal device**, my go-to device. It's close to me, if I need that quick, precise feedback.

When I need to be more in depth, that's when I start using **my tablet**. The other part of it is where I **disconnect from my work** life and kind of go into where I want to be at the moment..... I'm totally removed from today's reality. I can't get a phone call, I don't check my email **it's my dream world**.

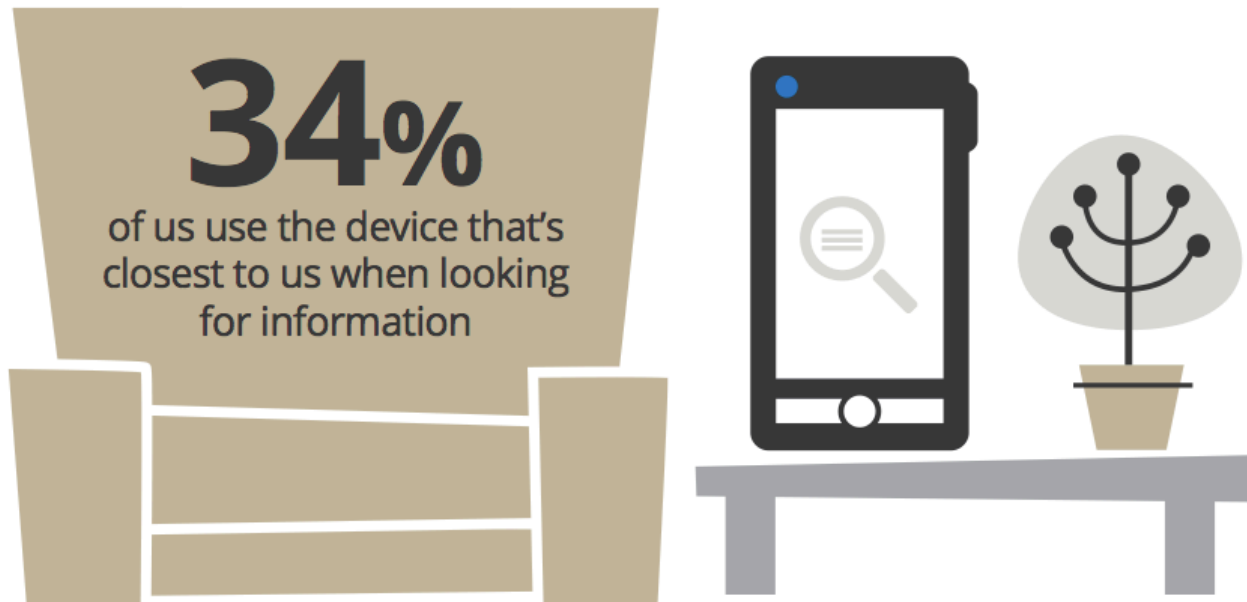
And then moving to the **laptop**, well, for me **that's business**. **That's work**. I feel like I've got to be crunching numbers or doing something."

- Bradley



Many times we turn to the screen that's closest

While we all have screen preferences for certain activities,
we are also creatures of convenience

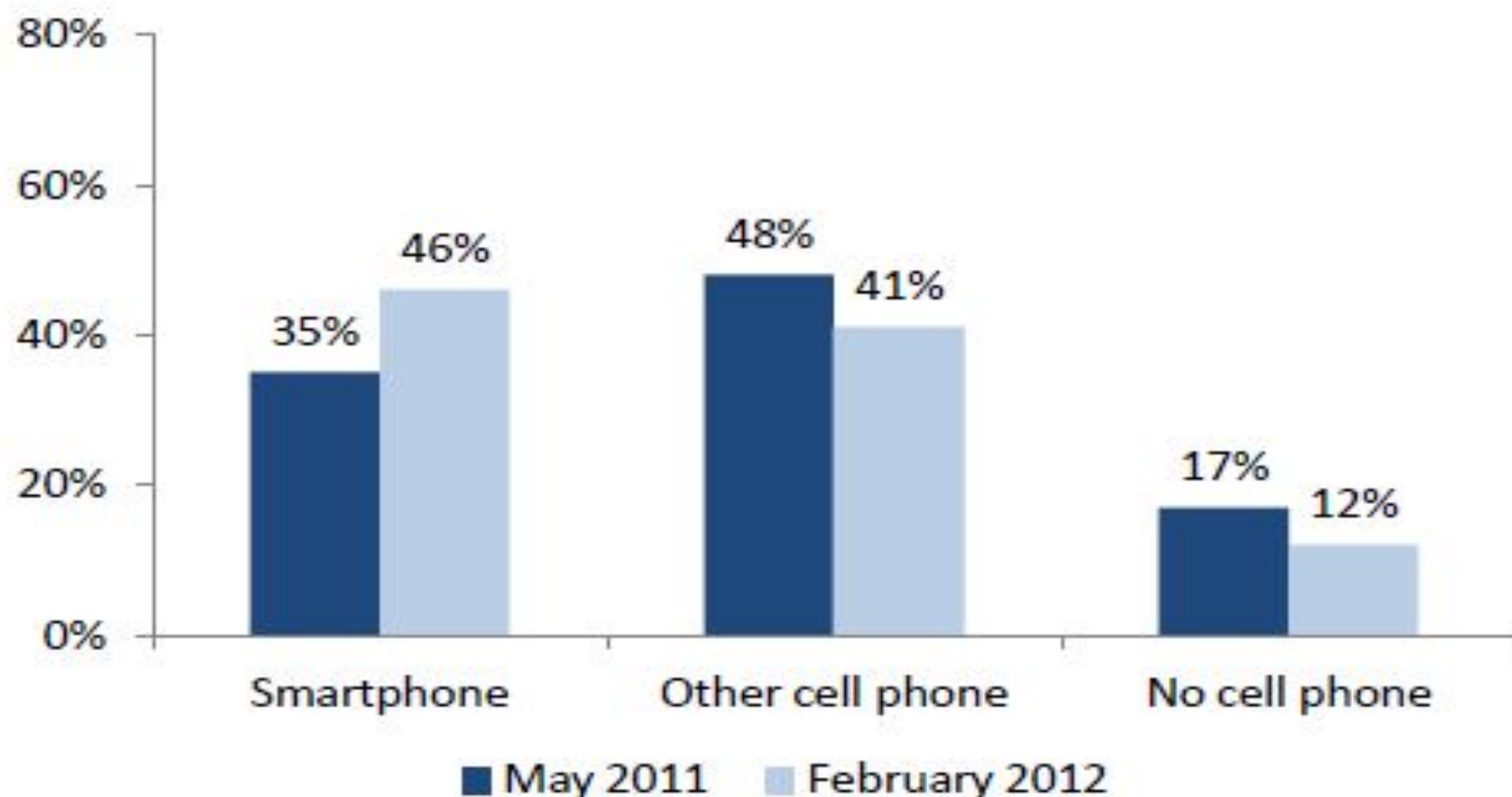


"If I'm watching TV I won't go upstairs to grab my laptop to follow up on a product I see, I'd just pull out my phone." - *Sophie*

http://services.google.com/fh/files/misc/multiscreenworld_final.pdf

Changes in smartphone ownership, 2011-2012

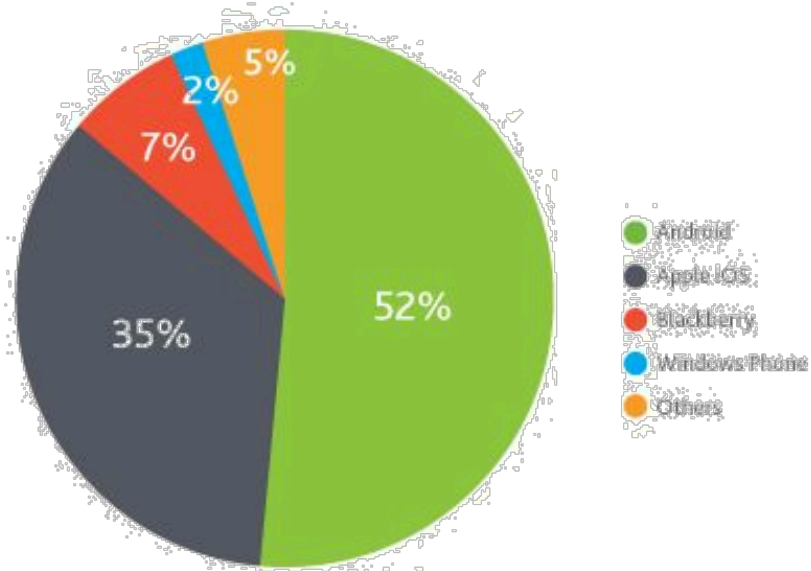
% of US adults who own...



Source: Pew Research Center's Internet & American Life Project April 26-May 22, 2011 and January 20-February 19, 2012 tracking surveys. For 2011 data, n=2,277 adults ages 18 and older, including 755 interviews conducted on respondent's cell phone. For 2012 data, n=2,253 adults and survey includes 901 cell phone interviews. Both 2011 and 2012 data include Spanish-language interviews.

Top U.S. Smartphone Operating Systems by Market Share

Q3 2012, Nielsen Mobile Insights

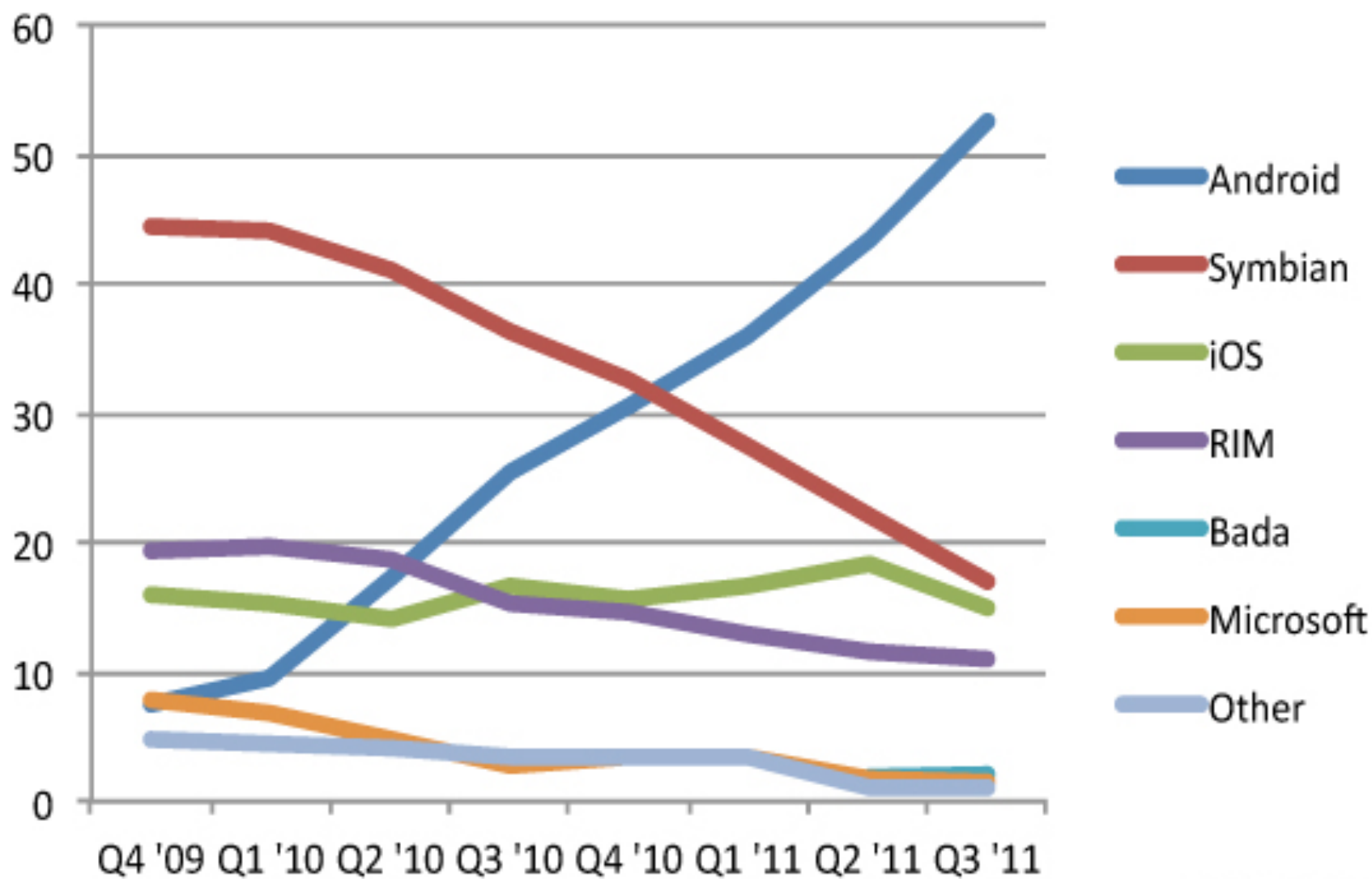


Read as: During Q3 2012, 52% of smartphone owners had a handset that runs on the Android operating system.

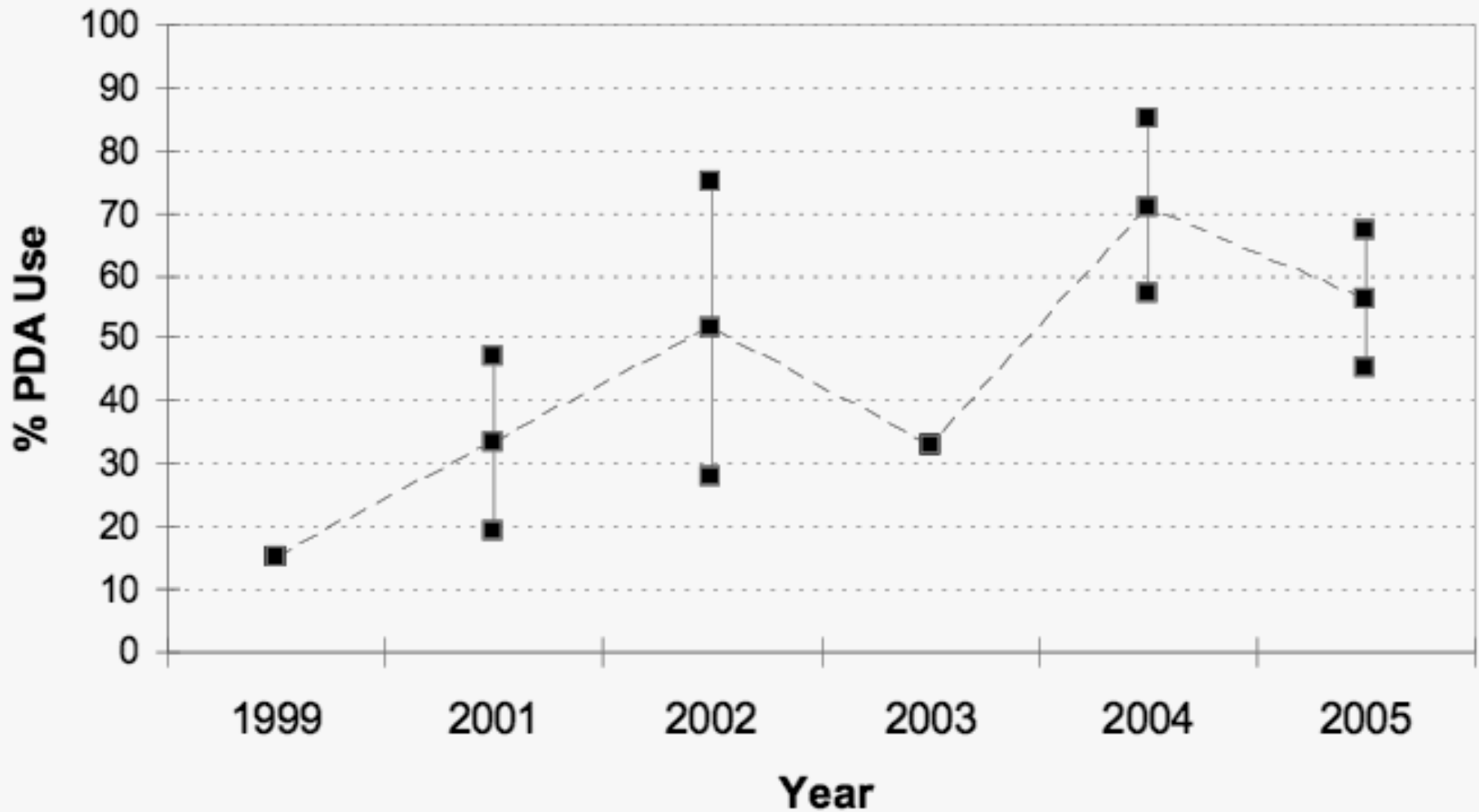
Source: Nielsen



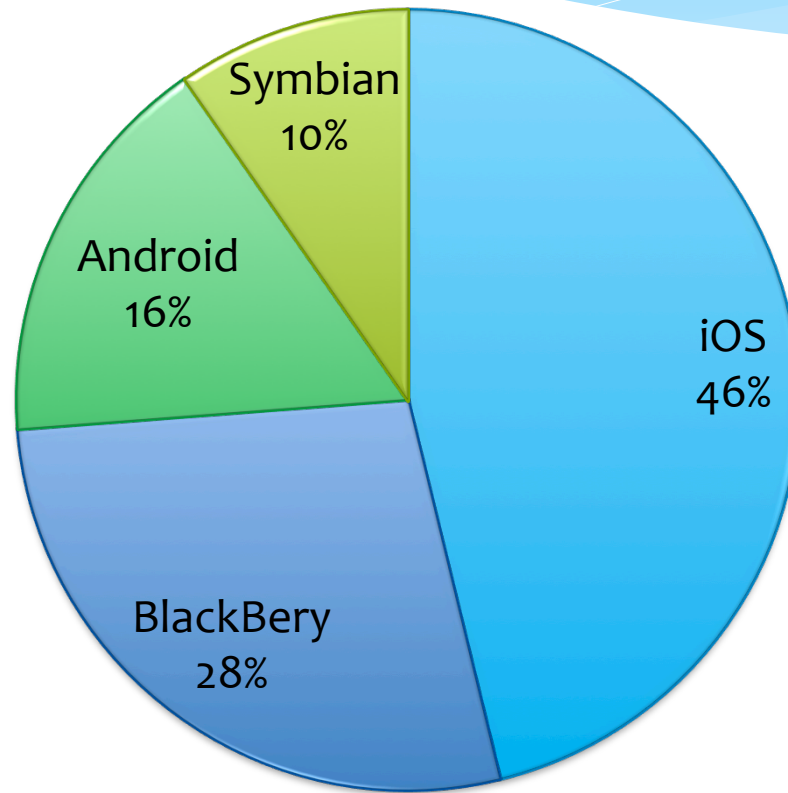
Market Share For Smartphone Operating Systems



Range Plots of PDA Usage by Health Care Providers (n=17 surveys)



Mobile platforms among medical students



Mobile Platforms distribution among 3rd year medical students, KSU; N=145

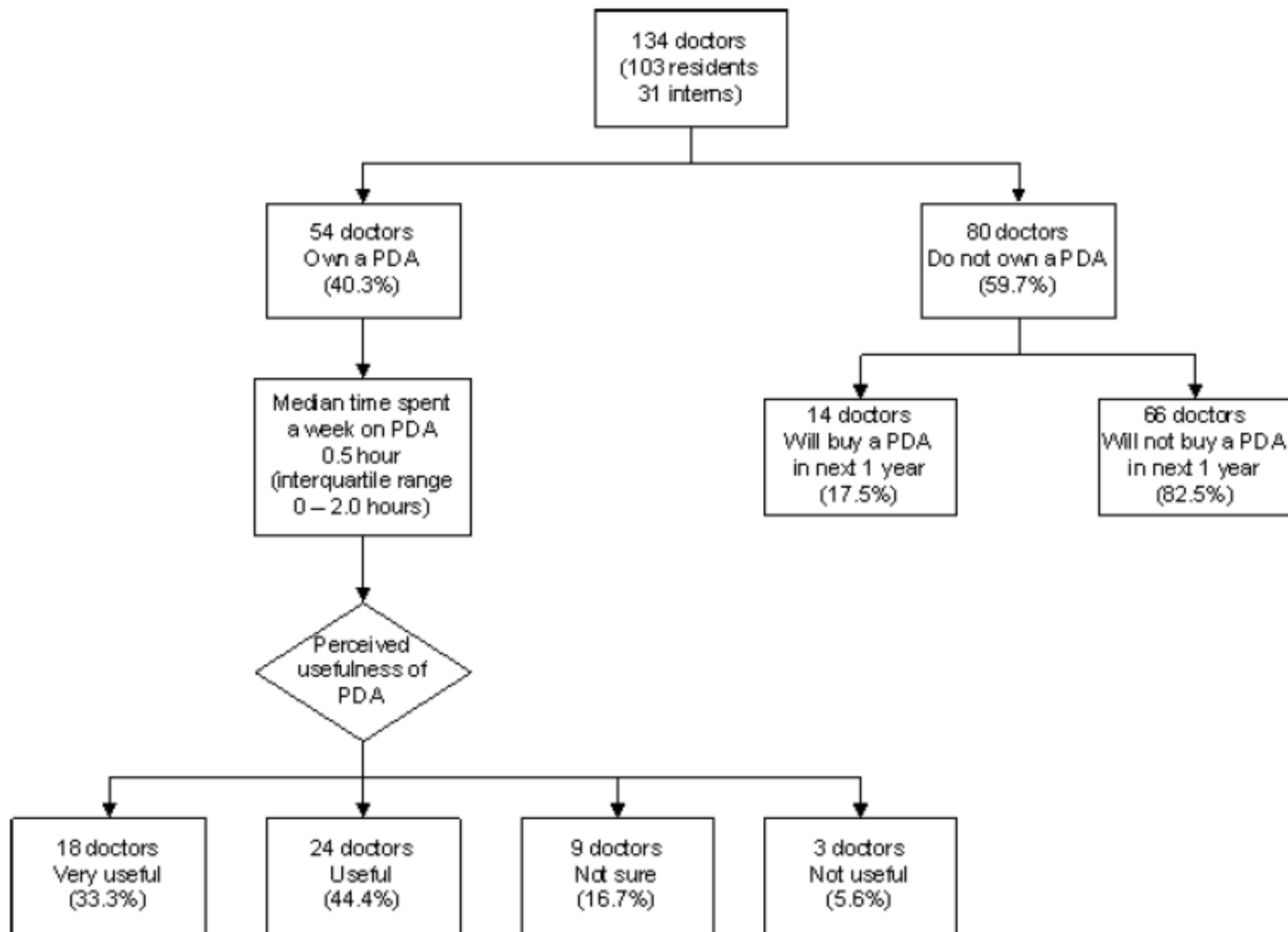


Figure 1
Doctors' use and perception of the personal digital assistant (PDA).



Windows Phone 7

iOS (iPhone)

Android

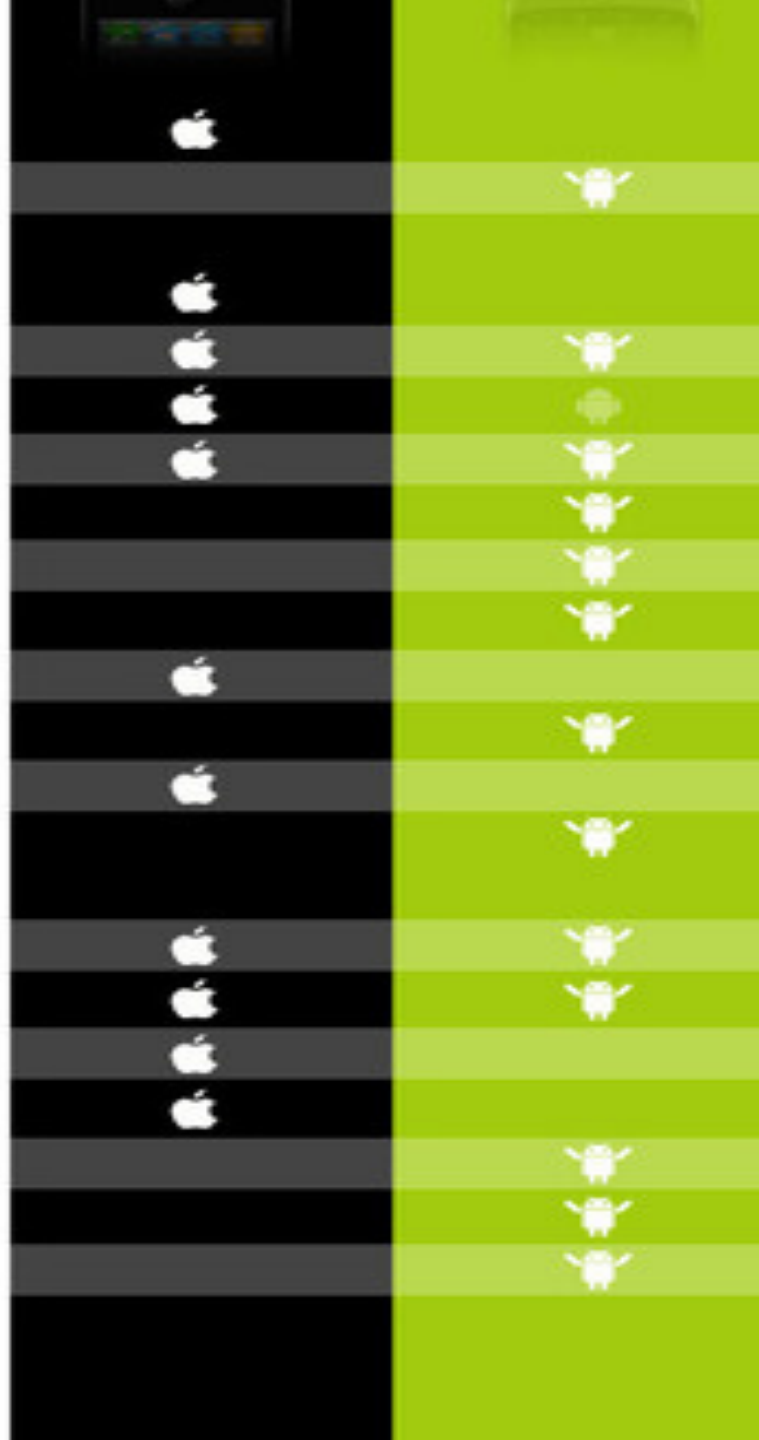
Developer	Microsoft	Apple	Google
Copy/Paste	✗	✓	✓
Multitasking	✗	✓	✓
Flash Support	✗	✗	✓
Silverlight Support	✗	✗	✗
HTML5 Support	✗	✓	✓
Unified Inbox	✗	✓	✓
Exchange Support	✓	✓	✓
Threaded Email	✗	✓	✓
Visual Voicemail	✗	✓	✓
Video Calling	✗	✓	✓ Third Party App
Universal Search	✗	✓	✓
Internet Tethering	✗	✓	✓
Removable Storage	✗	✗	✓
Facebook Integration	✓	✗ (Third Party App)	✓ (Third Party Integration)
Twitter Integration	✗	✗ (Third Party App)	✓ (Third Party Integration)
Folders	Hubs	✓	✓
Apps Organization	Alphabetical	Customizable	Customizable
App Store	1,000+ Apps	300,000+ Apps	90,000+ Apps
Microsoft Office Support	Built-In	Third Party App	Third Party App
Widgets	Tiles on Home Screen	✗	✓
Media Sync	Zune Software Mac & PC	iTunes Mac & PC	Direct File Transfer + Third Party Software
X-Box Live Integration	Built-In	Via Third Party App	Via Third Party App

Ease of Use
Openness

Battery Life
Multitasking
Software Keyboard
System-Wide Search
Notification System
Voice-to-Text
Syncing
Non-Google Syncing
Tethering
Release/Update Consistency
Customizable

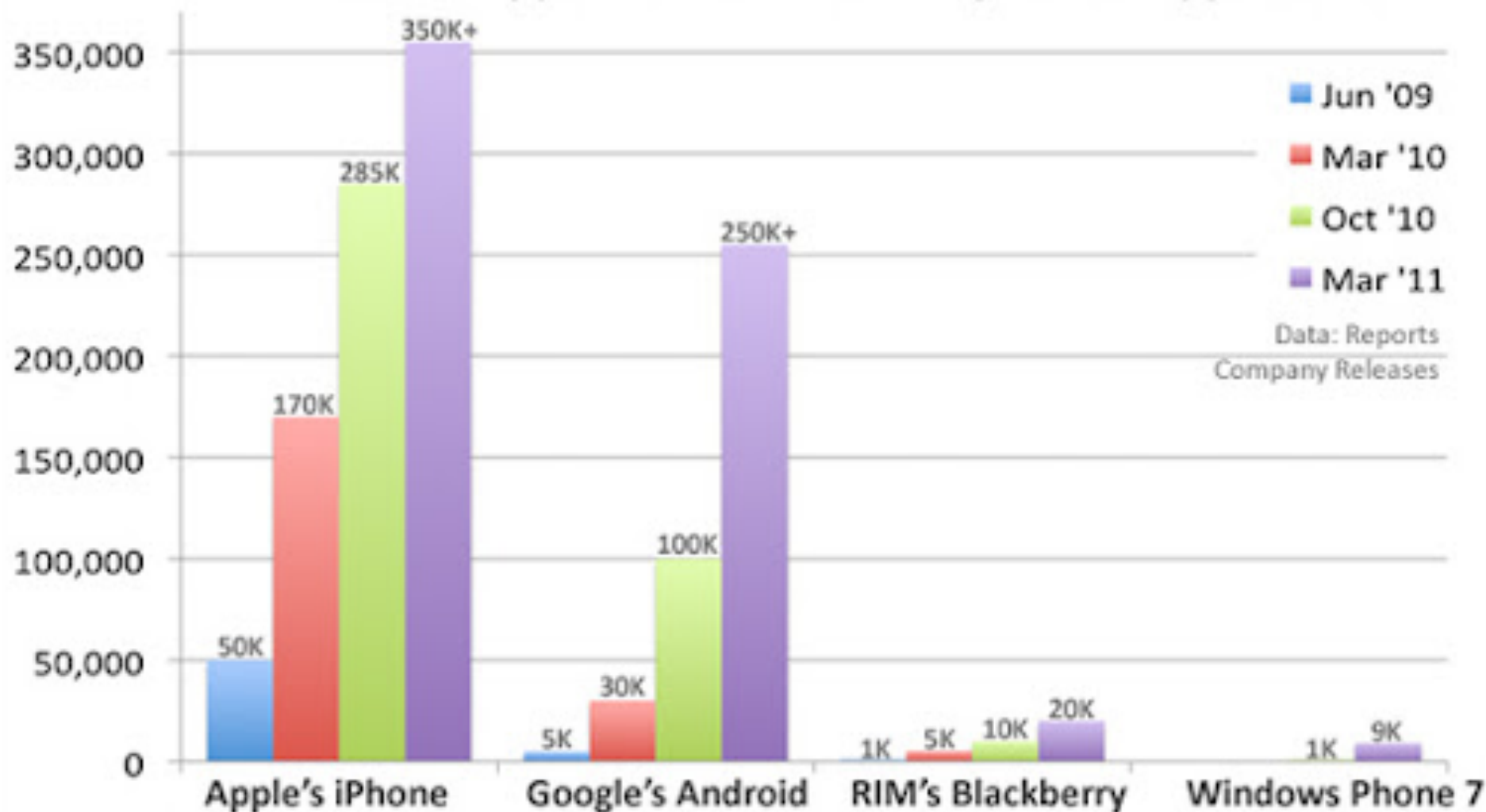
Apps
Web Browsing
Gaming
Music Player
Free Turn-by-Turn Navigation
Google Apps Integration
Google Voice

lifehacker

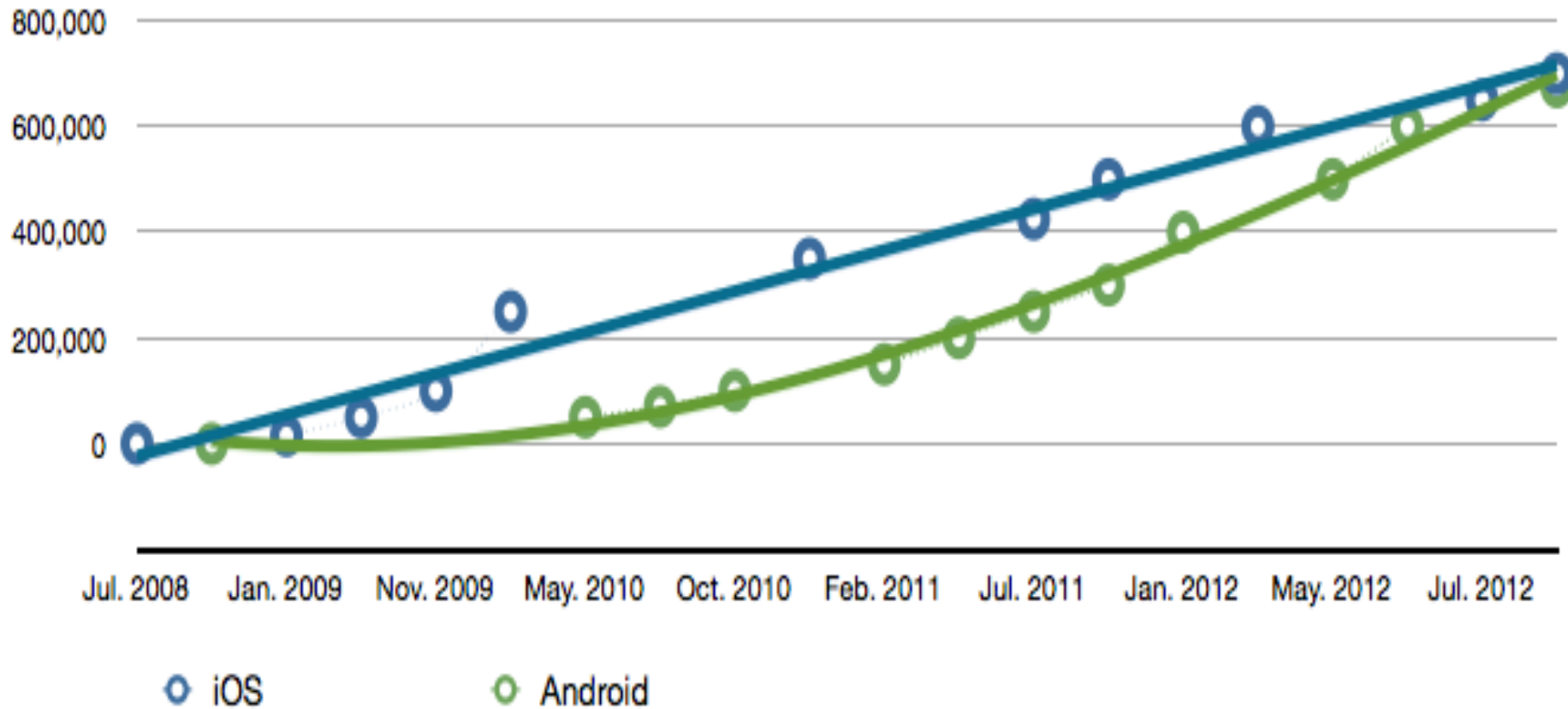




Number Of Apps Available At Smartphones' Apps Stores

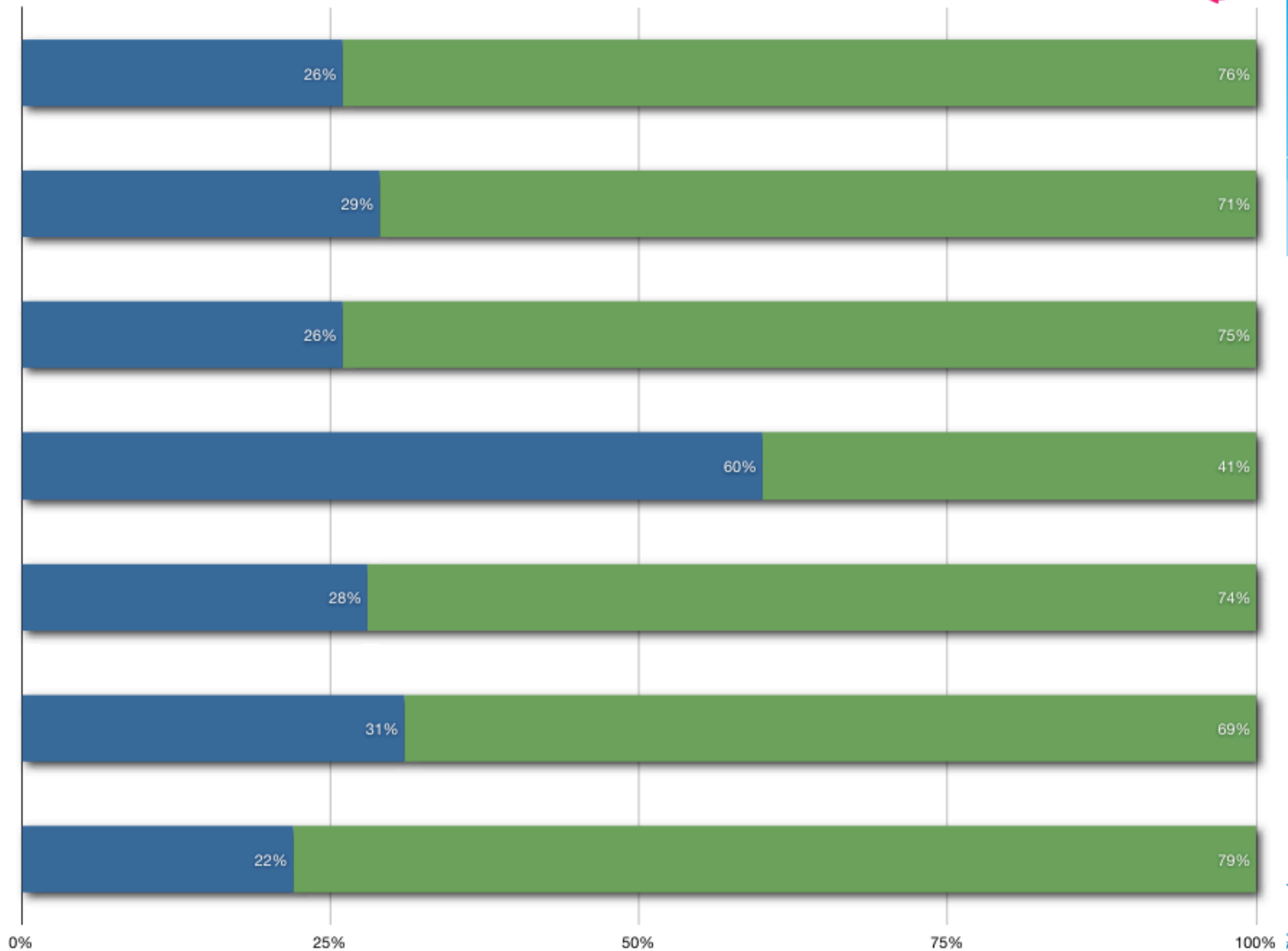


No. of apps: iTunes App Store vs Google Play



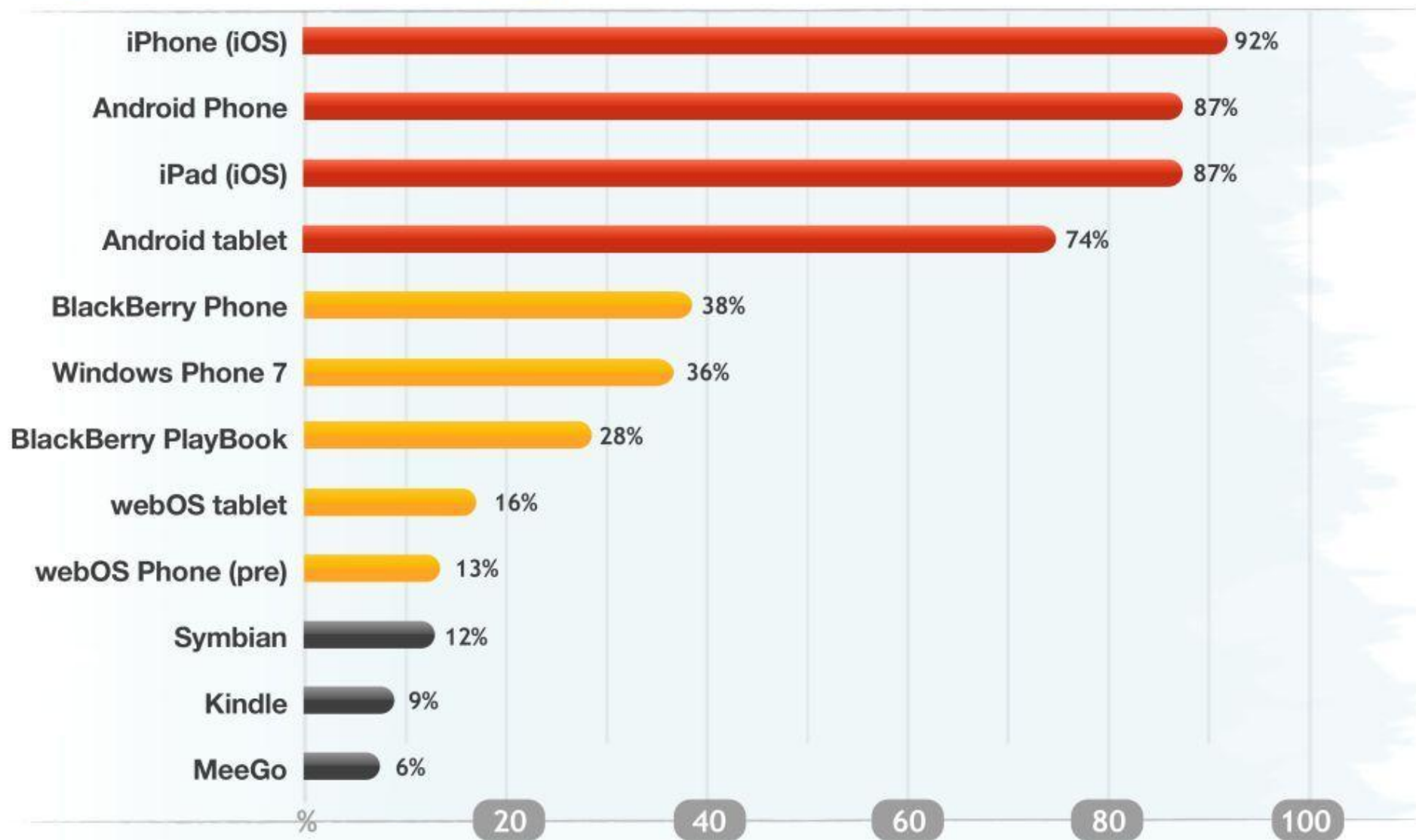
<http://www.insidemobileapps.com/2012/09/26/tracking-growth-the-itunes-app-store-vs-google-play/>

Proportion Free vs. Paid (US, July 2010)



■ Proportion Of Free Applications
■ Proportion Of Paid Applications

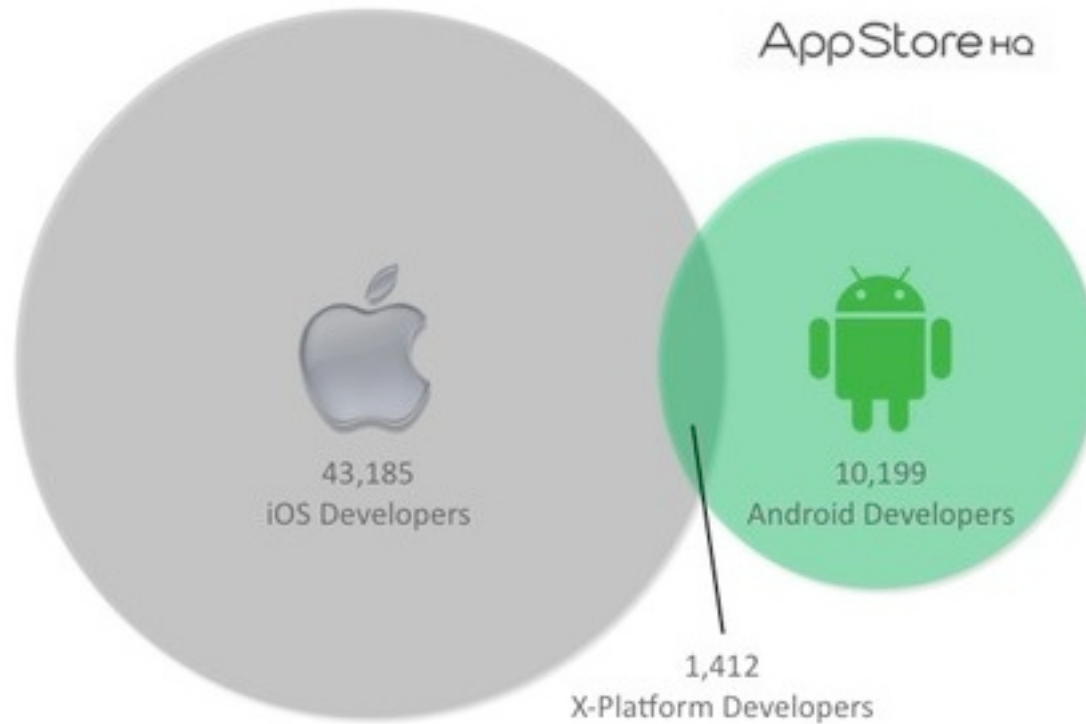
'Very Interested' In Developing For Each Platform



N = 1,971 responses

Source: Appcelerator / IDC - 01/2011





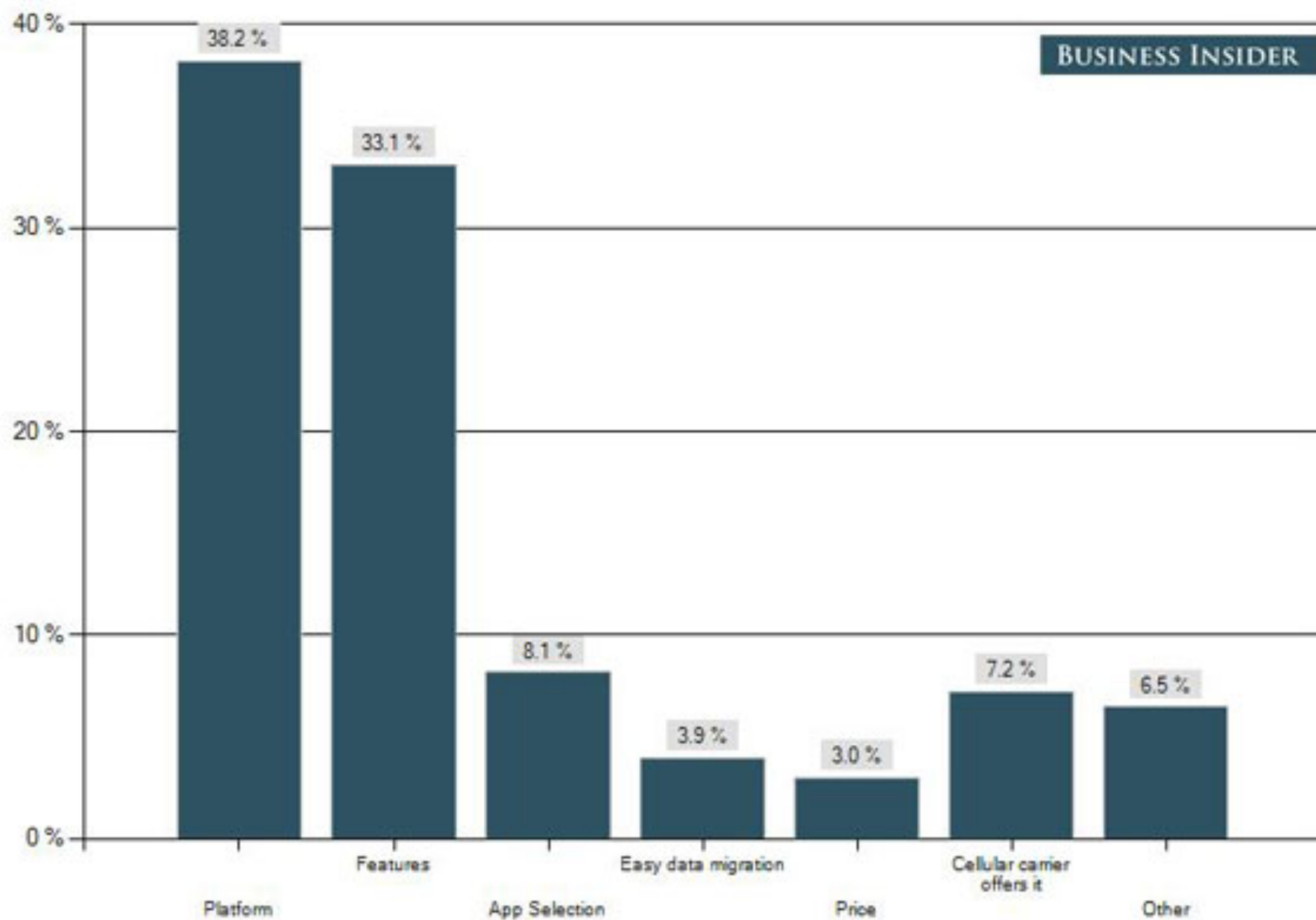
<http://www.androidauthority.com/google-play-vs-apple-app-store-2012-76566/>

What is the top reason for selecting your current phone?

1. Applications built for device
2. Internet/email access
3. Touchscreen
4. Synchronization
5. Brand / Reliability
6. multimedia capability
7. Keyboard
8. Large screen, easy to read
9. Battery life
10. Small size/weight
11. Price

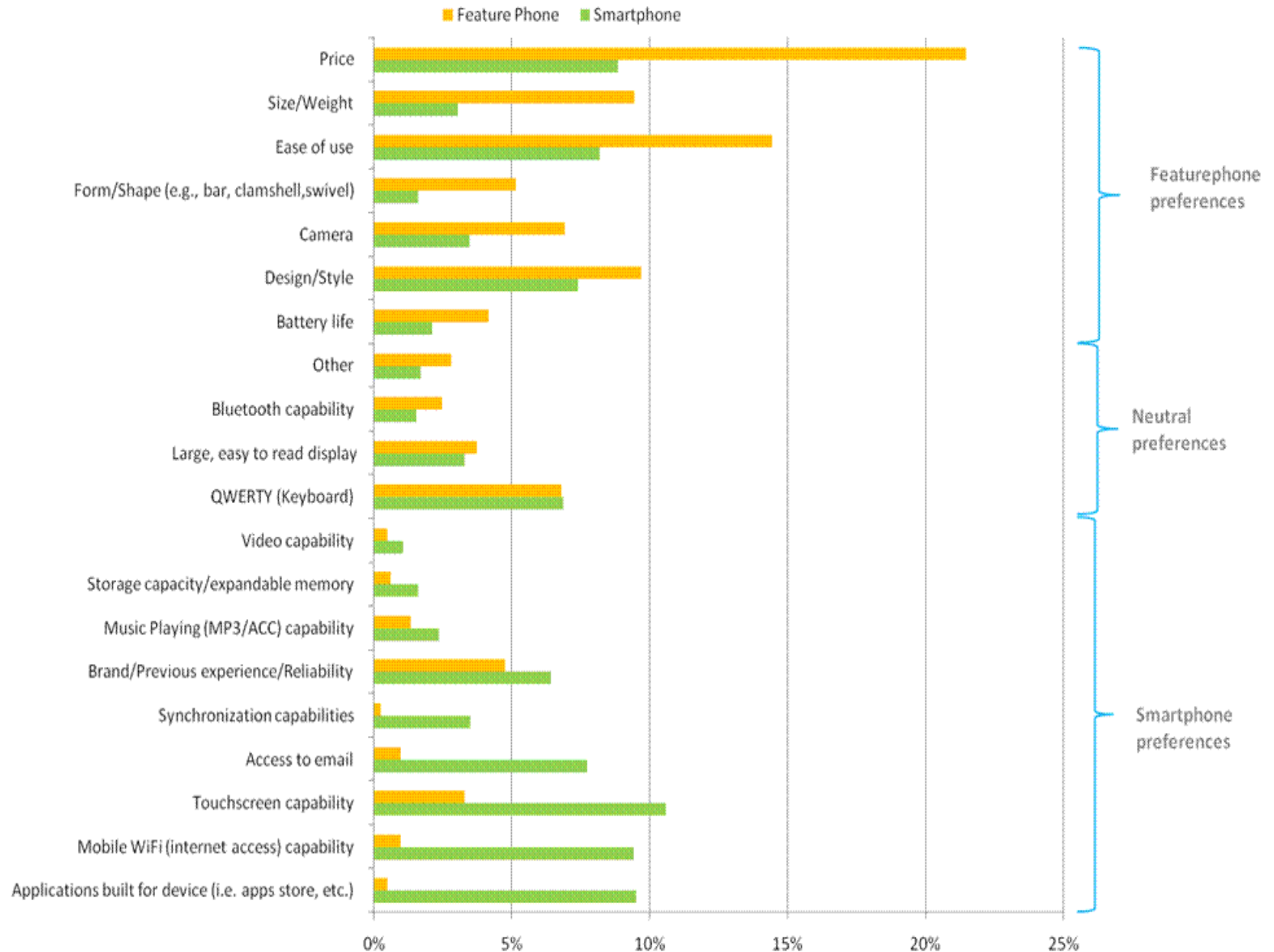


What is the MOST IMPORTANT factor to you in choosing a particular smartphone?



Top Reasons for Choosing Device -Smartphone vs Feature Phone

Selected as first, second or third reason for choosing, Nielsen Mobile Insights



What were the top 3 reasons for selecting your current cell phone?

Medical professionals values of using smartphone

- * The fastest approach to the right updated information at the right time in the point-of-care based on the best available evidence to support the best decision for care

Which Device is better?

- * Determine which applications you will need first
- * Use different devices if possible before purchasing
- * Prominence of a particular device in your environment
- * Memory
- * Wireless / 3G access availability
- * Your keyboard style
- * Size & weight

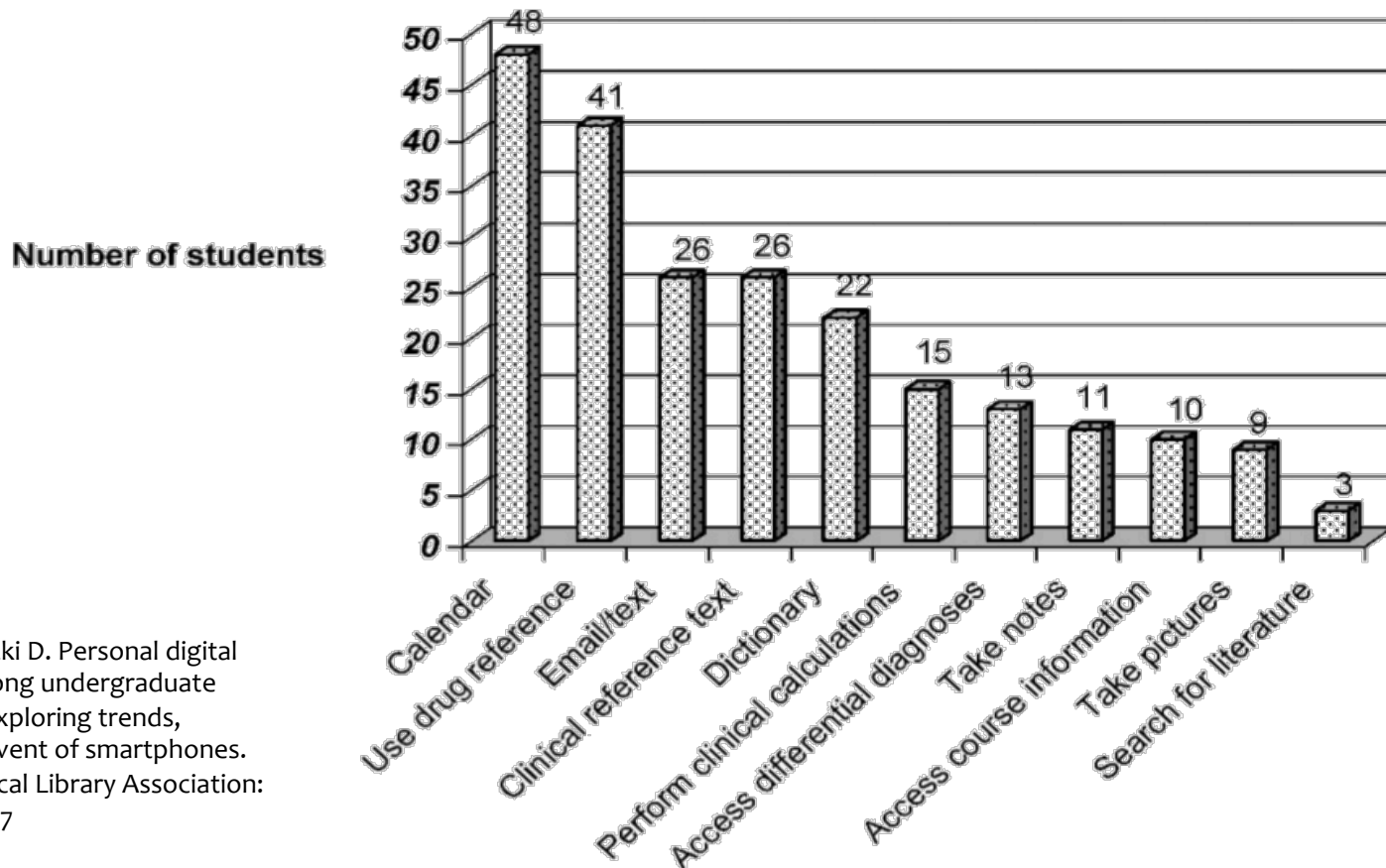
What do you use your smartphone for in your medical practice?

1. Clinical drug references
2. Medical dictionaries
3. Electronic prescription tools
4. Clinical textbooks
5. Patient tracking
6. Medical Calculators
7. Evidence based references
8. Search for literature

What do use your smartphone for?

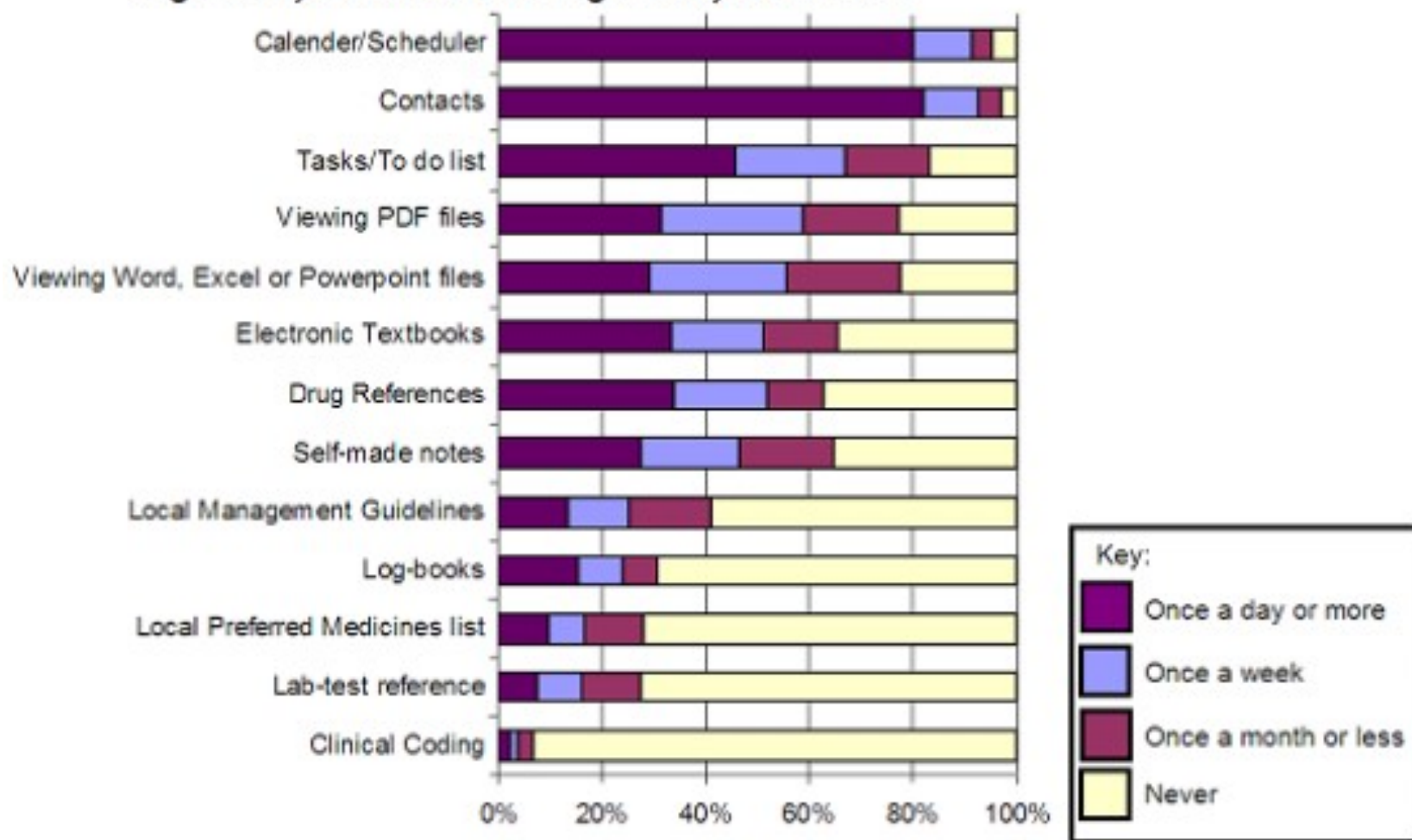
Figure 1

Common uses of personal digital assistants (PDAs) among medical students (n=53)

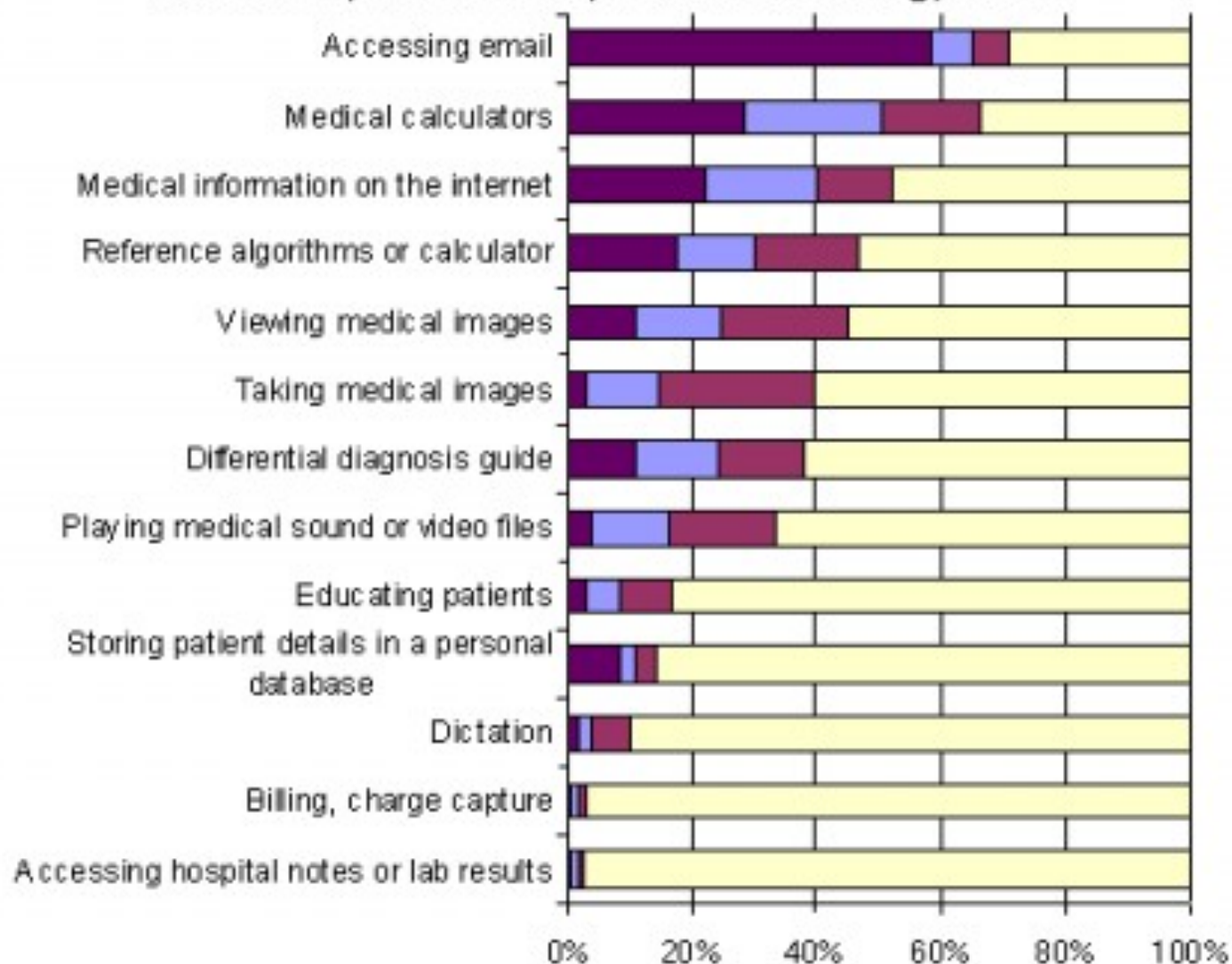


Chatterley T, Chojecki D. Personal digital assistant usage among undergraduate medical students: exploring trends, barriers, and the advent of smartphones. *Journal of the Medical Library Association*: JMLA. 2010;98(2):157

Organiser, Document Management, Reference



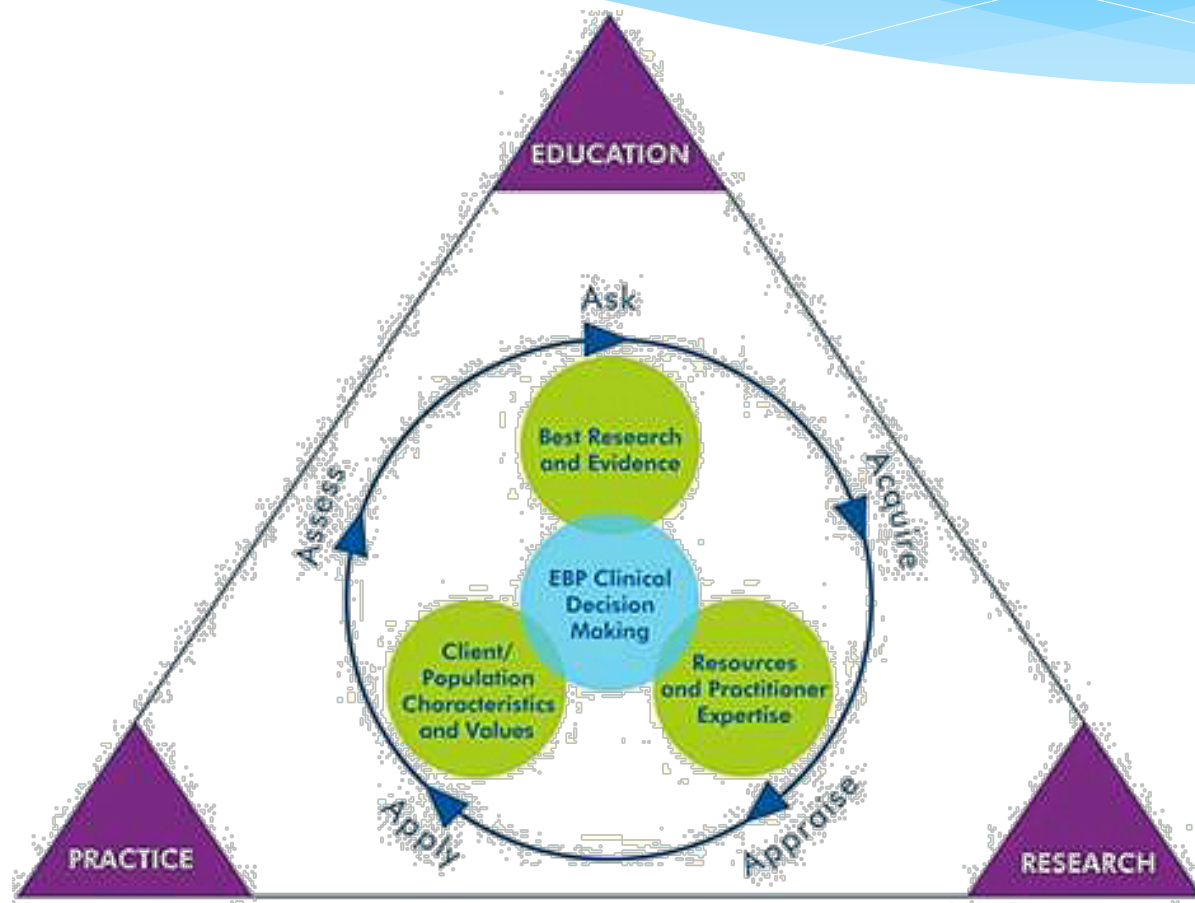
Education, Multimedia, Patient tracking, Other



What is the first step in the evidence based practice process?

- A. Applying research to practice
- B. Acquiring available research and evidence
- C. Assessing the impact of change
- D. Asking a clinical question
- E. Appraising the research quality

5-step EBM process



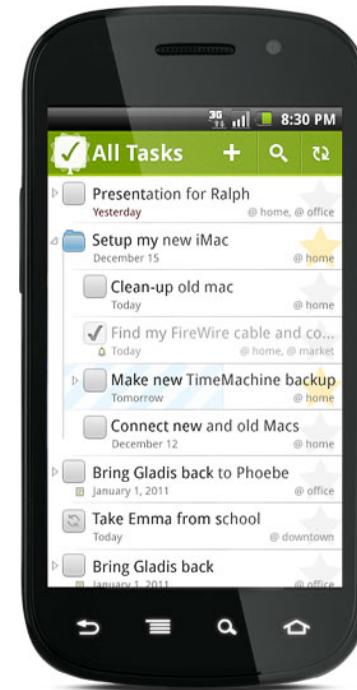
PICO Maker

- * free Palm OS-based application
- * create and store queries in the PICO format for later reference.
- * <http://www.library.ualberta.ca/pdazone/pico/>

PICO	PICTWO
Background	Citation
.....
Population	Additional Info
.....
Intervention	
.....	
Comparison	
.....	
Outcome	
.....	
Prev PICO Next PICO More...	SavePICO Previous Screen
	Delete this PICO Beam PICO
	GoTo First Record
	GoTo Last Record
	Exit PICO

Use of task apps to control your EMB questions

- * Cross platforms Sync
- * Reminders
- * GTD contexts
- * Geotagged reminders
- * Speech recognition



Cancel

Details

Done

Read about: use of BB after CABG

Remind Me Never >

Due Tue, 2/14/12 12:00 AM >

Repeat Never >

Priority Medium >

List Tasks >

Notes

Folders

TaskTask

Edit

Search for tasks

► Category: @Anywhere (1)

► Category: @Calls (8)

► Category: @Computer (42)

► Category: @Email (8)

► Category: @Errands (2)

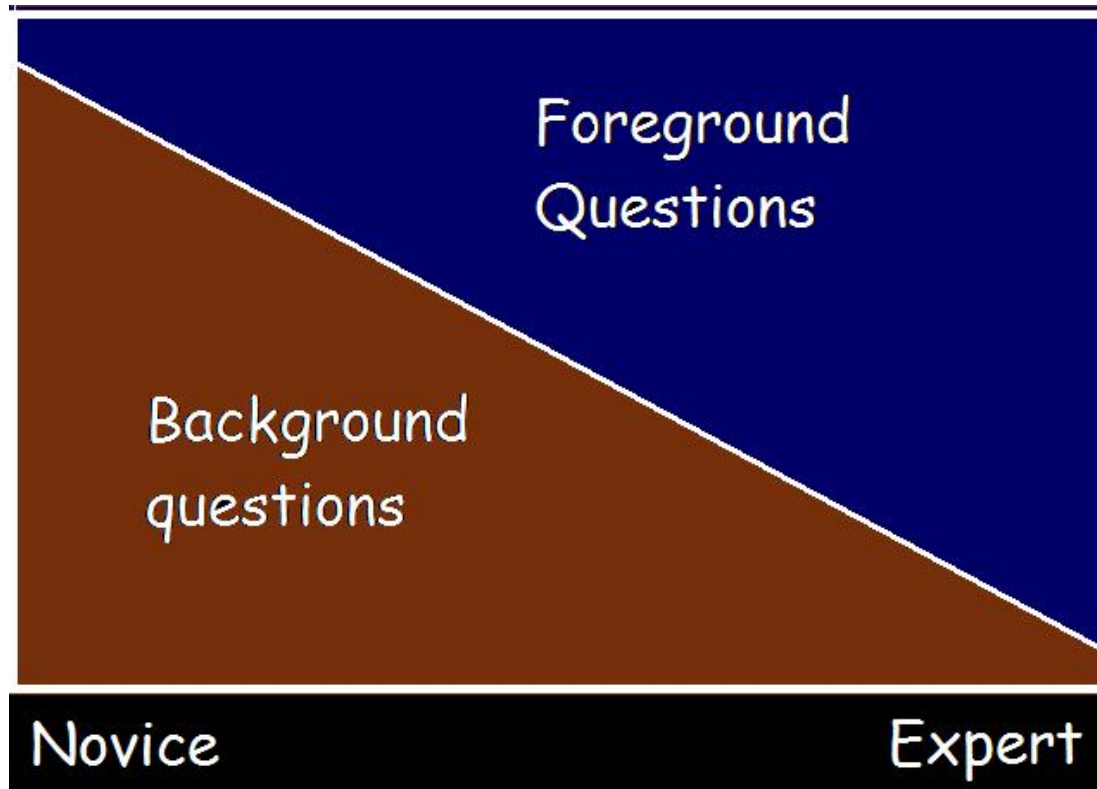
► Category: @KKUH (2)

► Category: @Read (37)

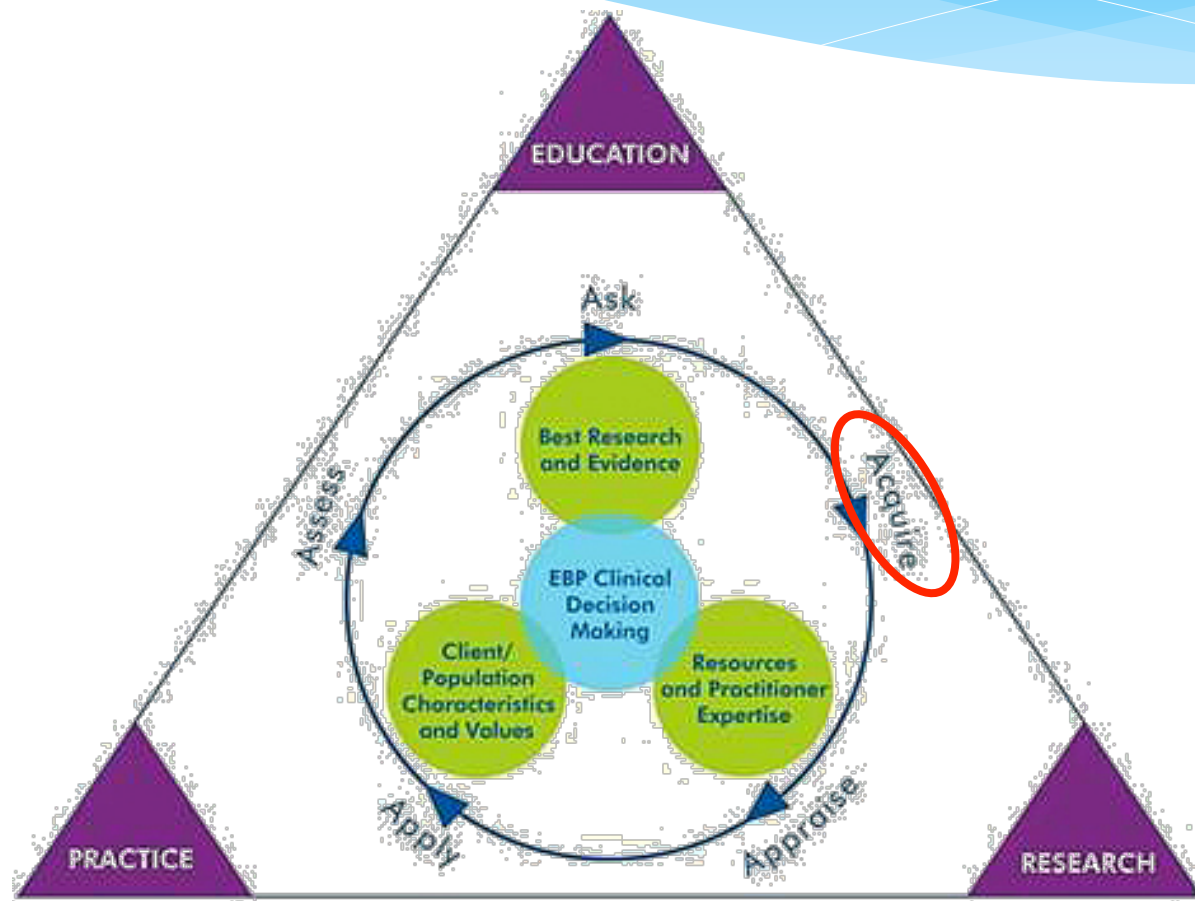
► Category: @Waiting For (11)



Foreground Vs. Background EBM questions



2nd step: Acquire



Where do you search for evidence using your smartphone/tablet?

1. BMJ Best Practice/ Clinical Evidence
2. StatRef
3. DynaMed
4. Essential Evidence Plus
5. Medline mobile
6. UpToDate
7. MedScape
8. Skyscape
9. WebMD
10. Unbound Medicine

Haynes' 5S pyramid of EBM resources

Clinical decision support systems (CDS)

Systems

HER built-in CDSs
Diagnosis One
AHRQ ePSS

Evidence based CPG
Evidence based textbooks

Summaries

BMJ Best Practice
StatRef

Evidence based journal
abstracts

Synopses

DynaMed
PIER
EE+

Systematic reviews

Syntheses

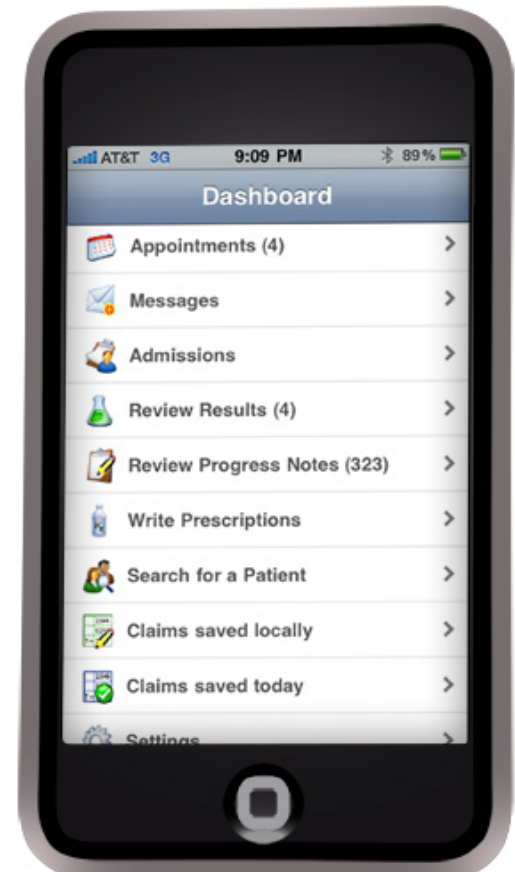
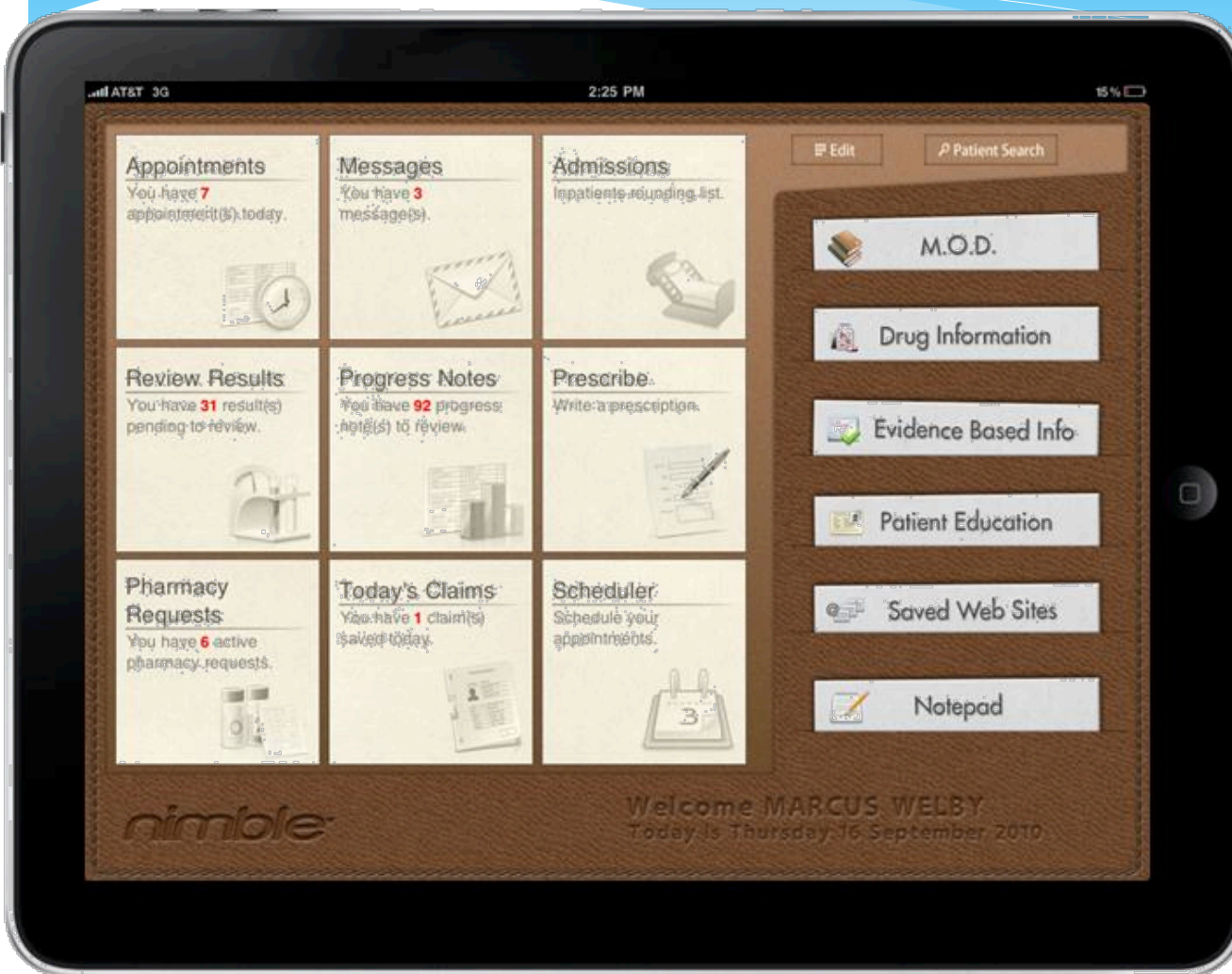
Cochrane library
Trip Database

Original journals

Studies

Medline mobile

CDSS on mobile platforms



AHRQ ePSS

- * Designed by the US Department of Health and Human Services to assist primary care clinicians in identifying what screening, counseling, and preventive services are appropriate for their patients.
- * AHRQ ePSS allows the input of a patient's age and other demographic variables, generating the USPSTF-appropriate screening and counseling guidelines for the patient.

AHRQ ePSS

Reset **Search** **Start >**

Enter the following information to retrieve recommendations from the USPSTF Preventive Services Database.

Age: Years

Sex: ☐ Both ☒ Female ☐ Male

Pregnant: ☒ No ☐ Yes


Tobacco User: ☐ N/A ☒ No ☐ Yes


Sexually Active: ☐ N/A ☒ No ☐ Yes

Search **Browse** **Tools** **Update** **More**

Back

Aspirin to Prevent CVD: Preventive Medication -- Adults, Increased Risk

Recommendation 

Risk Factor Information 

Search **Browse** **Tools** **Update** **More**

Where do you search for guidelines?

1. TRIP database
2. DynaMed
3. Medline
4. EMBASE
5. BMJ Best Practice
6. National guideline Clearinghouse
7. Cochrane
8. Essential Evidence Plus
9. CMA Infobase

Skyscape

- * Many titles are free through the SDL library
- * Can purchase Harrison's Manual of Medicine, 5-minute Clinical Consult, Merck Manual, Journal Watch and Pocket Medicine
- * Free version includes: Outlines in Clinical Medicine (OCM), RxDrugs, Archimedes.
- * OCM provides disease monographs with ~800 entries
- * Cumbersome user interface, iTunes and Android





skyscape



Q Smart Search



Archimedes...



DrDrugs®



Ferri's Clinic...



Harriet Lane



Labs 360°



Medical Epo...



Netter's Atla...



Outlines in...



RxDrugs™



Home



Store



MedAlert



History

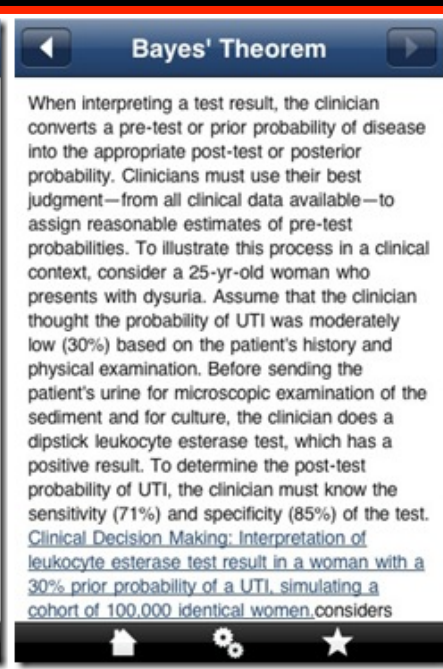
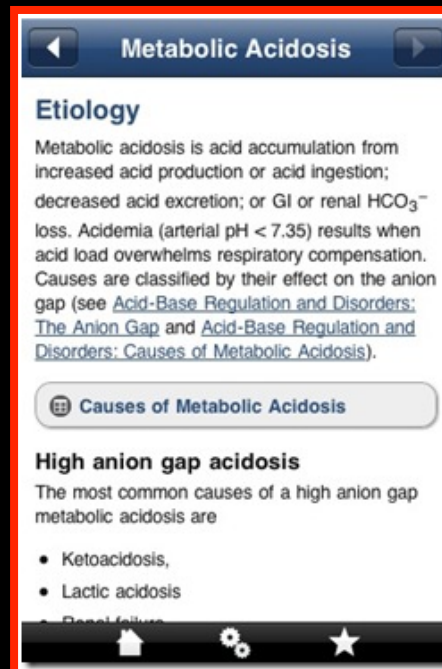
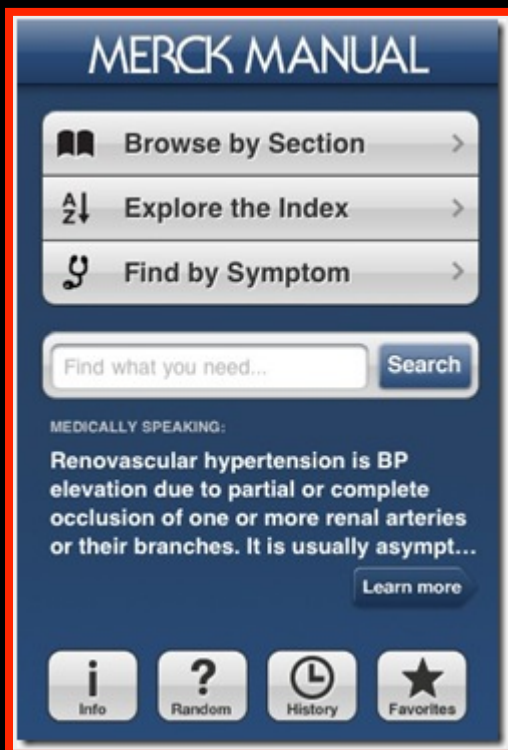


Tools

Merck Manual Professional Edition

- * 3,000 page version
- * The Medical Encyclopedia
- * \$34.99, itunes





UpToDate-The Gold Standard?

- * Pricing \$195/year (.53 cents per day) for trainee and \$495/year (\$1.36 per day)
- * Free throw SDL
- * Peer-reviewed, comprehensive, #1 most used resource
- * 8,500 medical topics, 385,000 total references
- * Good search function
- * **Slow to load topics**



www.unboundmedicine.com



Evidence Central

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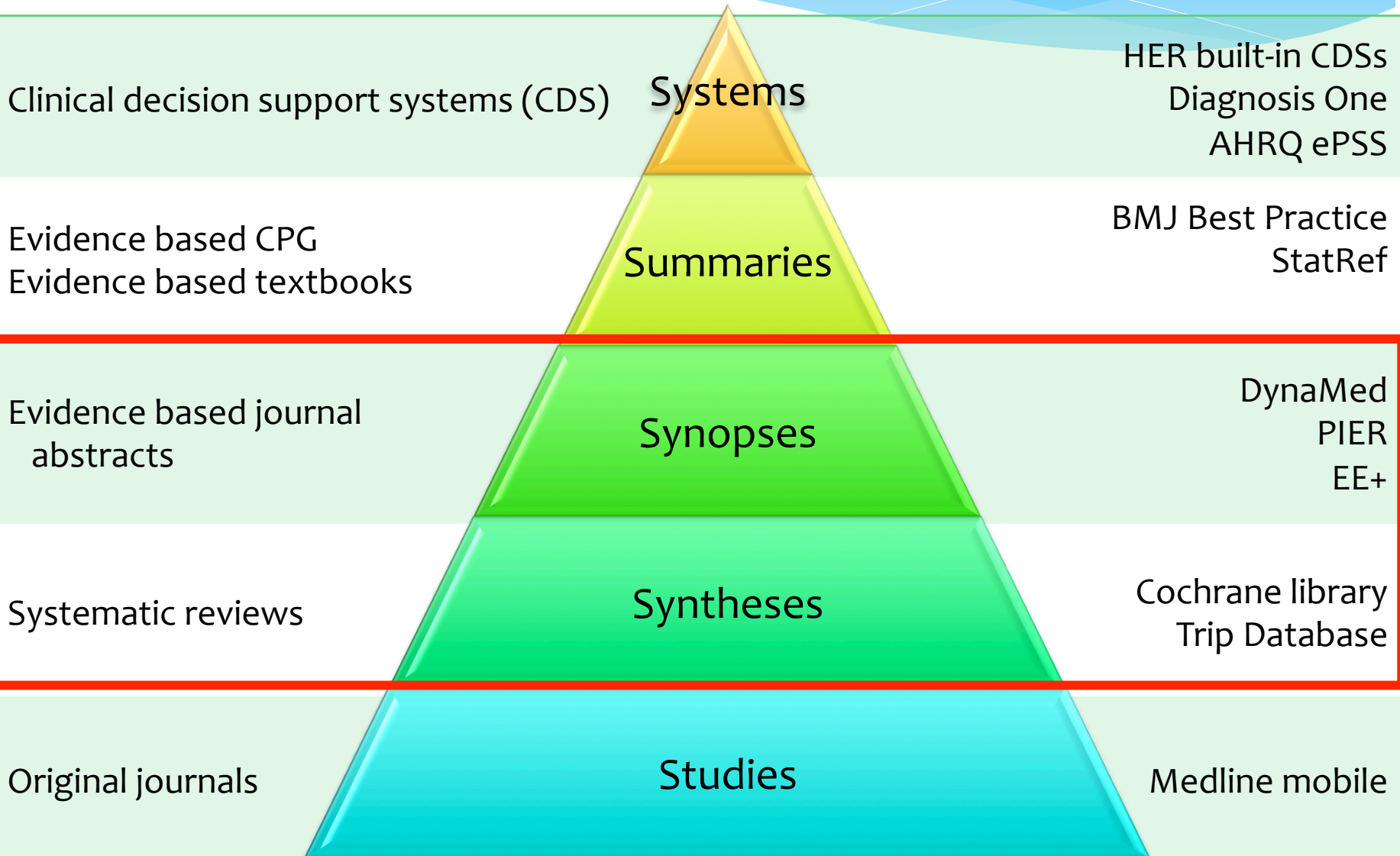
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Haynes' 5S pyramid of EBM resources



A	A
Abdominal injury	B
	C
	D
Abdominal pain in children	E
	F
	G
Abdominal pain in pregnancy	H
	I
	J
Abdominal pain, chronic	K
	L
	M
Abdominal trauma	N
	O
	P
Abnormal LFTs	R
	S
	T
	U
Abnormal liver function tests	V



Back

Mastitis and breast abscess



Summary

Breast infection (including infectious mastitis and breast abscess) typically affects women 15 to 45 years of age, especially those who are lactating. Neonates and adolescent girls may also be affected.

Staphylococcus aureus is the most frequent pathogen isolated.

**Diagnosis****Treatment****Prevention****Follow Up****Basics****Overview**

[Back](#)

Mastitis and breast abscess

Treatment

[Step-by-step](#)[Details](#)[Guidelines](#)[Emerging](#)



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- * [Skin cancer \(updated\)](#)
- * [Colorectal cancer treatment \(updated\)](#)
- * [Chlamydia \(uncomplicated, genital\) \(updated\)](#)
- * [Stroke management \(updated\)](#)
- * [Dementia \(updated\)](#)
- * [Impacted wisdom teeth \(updated\)](#)
- * [Acute anterior uveitis \(updated\)](#)
- * [Constipation in children \(updated\)](#)
- * [Basal cell carcinoma \(updated\)](#)
- * [Summary of all updates](#)

Guest editorial

At *Clinical Evidence*, we present an overview of the best available evidence, with a view to answering clinical questions of interest. Frequently, the evidence we identify includes systematic reviews that have meta-analysed data from RCTs. Synthesising data from multiple small RCTs can improve confidence in the effects, or confirm the believed lack of effect, of a particular intervention, thereby accelerating acceptance or rejection of that treatment. However, as Carl Heneghan and Rafael Perera outline in their Editorial, producing a reliable meta-analysis may not always be as simple as combining all the RCTs for the treatment



May 7, 2010

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-- refine by type of result -- ▾

-- refine by type of resource -- ▾

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-  Chronic obstructive lung disease (chronic mgmt)
-  Action plans for chronic obstructive pulmonary disease (LOE = 1a or 2a)
- ES** Action plans for chronic obstructive pulmonary disease (LOE = N/A)
-  Ambulatory oxygen for COPD (LOE = 1a) ▾

Page: << **1** 2 3 4 5 6 7 8 >>

EE+

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Chronic obstructive lung disease {chronic mgr ...

Overall Bottom Line

- Consider chronic obstructive lung {pulmonary} disease {COPD} in patients with chronic and progressive dyspnea, cough, and sputum production, [7] and obtain spirometry. SORT C
- Consider arterial blood gas (ABG) measurement for patients with forced expiratory volume in 1 second (FEV1) less than 50% or clinical signs of respiratory

↑AA ↓AA

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[Articles & Reviews](#)

[Subscription Information](#)

[Integrating DynaMed with EHRs](#)

Superior evidence-based results

DynaMed is a medical information database with nearly 3,000 clinical topic summaries. Designed for use at the point-of-care, providing best available evidence and **updated daily.**

⌵ Login to DynaMed

⌵ Subscribe Now

⌵ Free Trial



The American Academy of Family Physicians (AAFP) has determined that DynaMed may be of assistance to family physicians in answering clinical questions with high-quality evidence.

Hospitals

Medical Schools

Residency Programs

Additional Users

American College of Physicians

✓ Health Information Technology

- Electronic Health Records
- e-Prescribing
- Informatics
- PDA & Mobile Computing
 - Bioterrorism
 - Clinical References
 - Uniform Requirements for MS
 - Teaching in Your Office
 - Ethics Manual
 - Audio
 - PIER PDA

- * **Calorie Savings Food List**
- * **Normal Lab Values from MKSAP 15**
- * **Vaccine Specific Information**
- * **USPSTF Preventive Services Guidelines**
- * **NCEP ATP III Guidelines**
- * **ADA Guidelines**
- * **Drugs Used in the Treatment of HIV Infection**
- * **Table of Normal Physiological Changes During Pregnancy**
- * **Pharmacotherapies for Acute Major Depression**
- * **Differential Diagnosis Between Allergic and Nonallergic Rhinitis**

ACP AMERICAN COLLEGE OF PHYSICIANS
INTERNAL MEDICINE | *Doctors for Adults*SM



Welcome

PIER: The Physicians' Information and Education Resource.
Find authoritative, evidence-based guidance to improve clinical care.
[Register for access](#) (ACP members only)

Browse a Topic Type:

[Diseases](#)[Screening and Prevention](#)[Complementary/Alternative
Medicine](#)[Ethical and Legal Issues](#)[Procedures](#)[Quality Measures](#)[Drug Resource](#)

The information included herein should never be used as a substitute for clinical judgment and does not constitute an endorsement of any product or service.

Enter a Keyword to Search:

Find: within

Entire site

For more options try [Structured Search](#).

What's New

QUALITY MEASURES: The PIER Quality Measures [page](#) has been updated to include the 179 2010 Physician Quality Reporting Initiative (PQRI) measures. The PQRI administrative criteria for each measure is given, and, where applicable, links are provided to PIER modules to help physicians fulfill the PQRI.

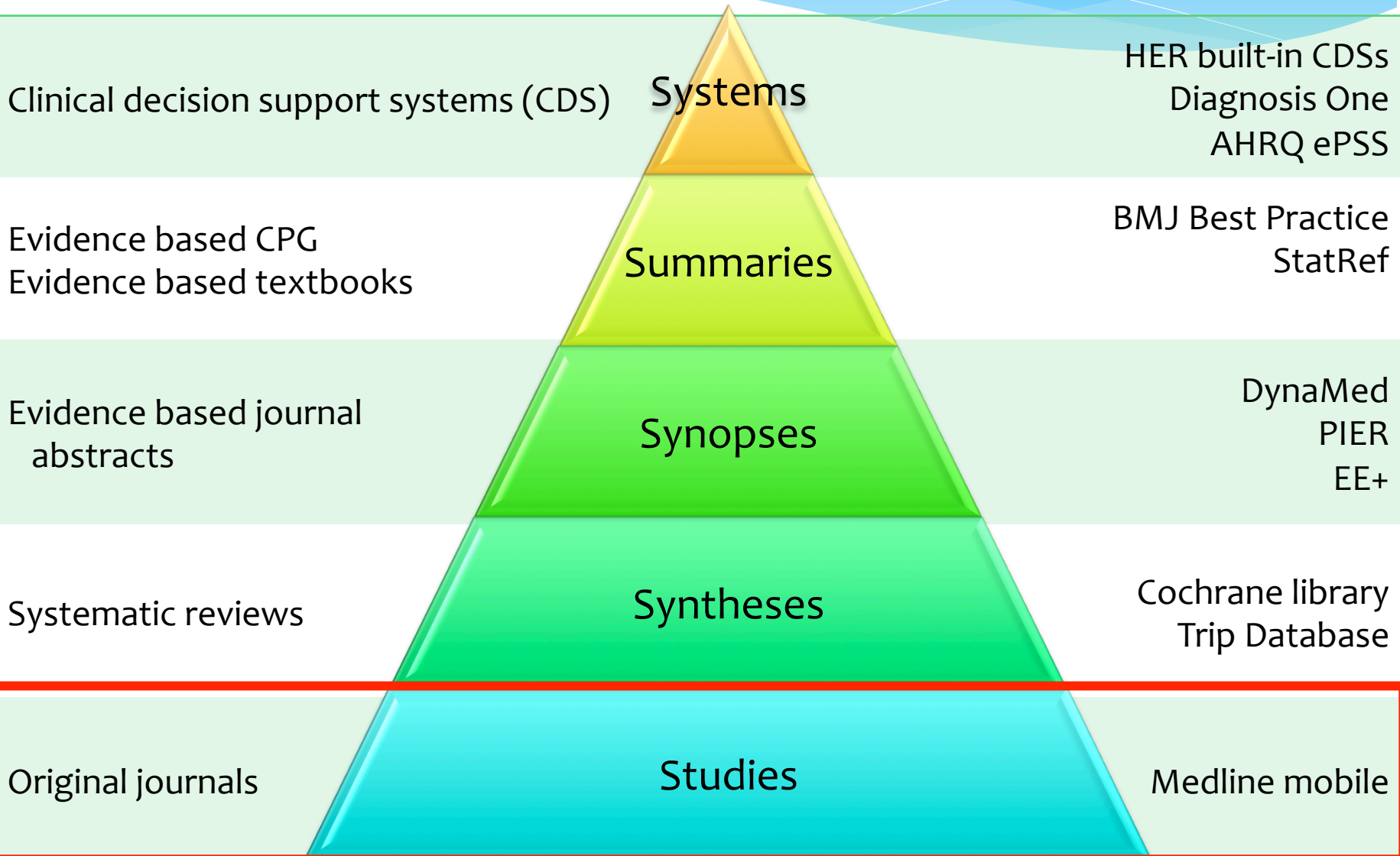
UPDATED MODULES: The following modules were updated the week ending April 30:

[Cirrhosis](#)[Gonorrhea](#)[Group A Streptococcal Pharyngitis](#)[Hip Fracture](#)[HIV in Pregnancy](#)

National Guideline Clearinghouse

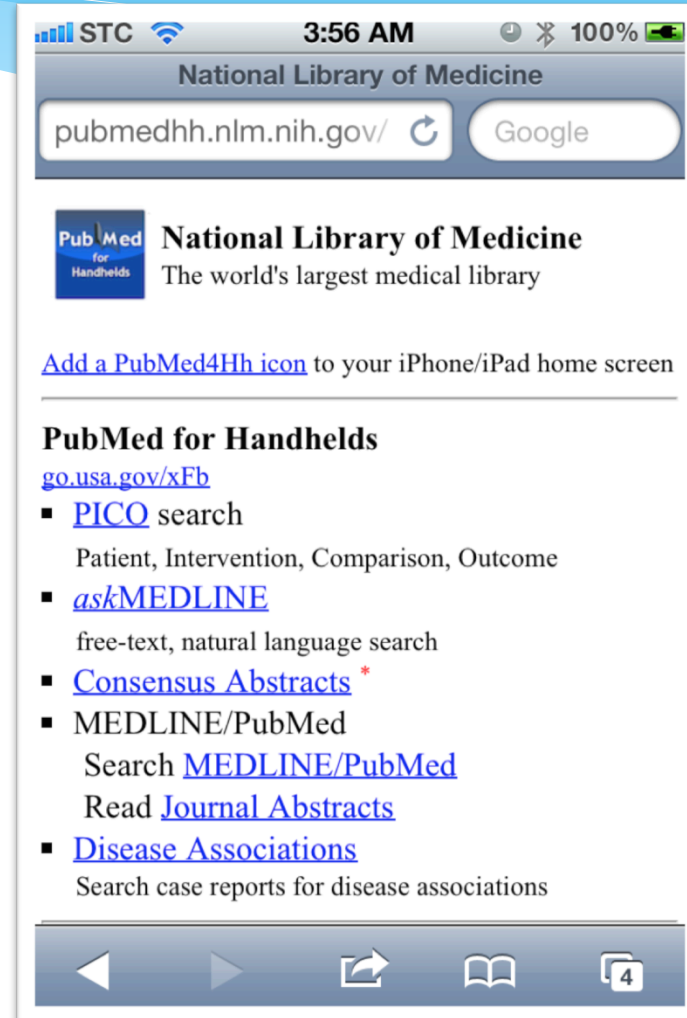
- * <http://www.guideline.gov/>
- * directly access the entire site using PDA browser
- * download all NGC guideline summaries as PDF or MS Word documents

Haynes' 5S pyramid of EBM resources



Primary Evidence Resources mobile websites

- * [CINAHL](#)
- * [PubMed](#)
- * [MedlinePlus](#)



PubMed searching apps

PubMed Clip ✓

PubMed on Tap ✓

PubGet

PubMed Mobile

PubMed Mobile

- * Basic searches
- * Limit to free articles
- * Locate primary literature on your handheld
- * Free
- * itunes and Android
- * <http://www.ncbi.nlm.nih.gov/m/pubmed/>



PubMed® for handhelds Web site

* <http://pubmedhh.nlm.nih.gov/nlm/pubmed/index.html>

Search MEDLINE/PubMed

♦ Search with no filters

Enter term(s):

Or Use Filters:

♦ Systematic Reviews

Enter term(s):

OR

♦ Clinical Queries

Indicate Category and Emphasis below
(for Clinical Queries only):

Category:

- ☒ therapy ☐ diagnosis
☐ etiology ☐ prognosis
☐ clinical prediction guides

Emphasis:

- ☒ specific search (narrow) ☐ sensitive search (broad)

Enter term(s):

PICO search

* <http://pubmedhh.nlm.nih.gov/nlm/pico/piconew.html>

Search PubMed/MEDLINE via PICO

Patient, Intervention, Comparison, Outcome

Patient/Problem:

Age Group:

Not specified

Gender:

Not specified

Medical condition:

Intervention:

(therapy, diagnostic test, etc.)

Compare to:

(same as above, optional):

Outcome:

(optional)

Select Publication type:

Not specified

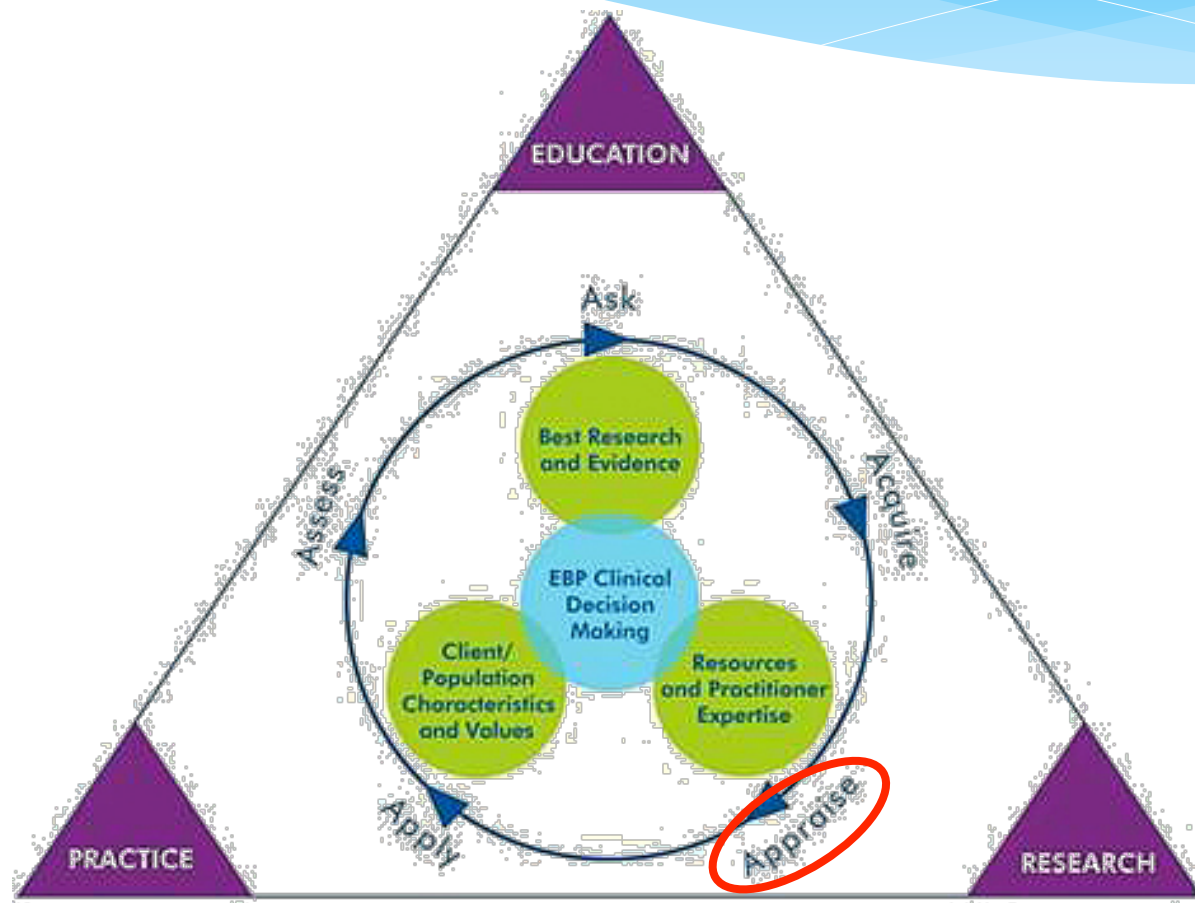
Submit

Clear

[\[Home\]](#) [\[MEDLINE/PubMed\]](#) [\[Feedback\]](#)

(with GSpell spelling checker: click [here](#))

3rd step: Appraise



The EBM Process	PDA Resources
Ask	PICO-maker from the University of Alberta http://www.library.ualberta.ca/pdazone/pico/
Acquire	Background questions Textbook-type materials (e.g., <u>5-Minute Clinical Consult series</u>) http://skyscape.com , et.al. Drug resources (e.g., <u>Epocrates</u> ; <u>CPOnHand</u>) Foreground questions National Guideline Clearinghouse www.ngc.gov Clinical Evidence http://www.clinicalevidence.com/ceweb/products/PDA.jsp NLM Mobile http://www.nlm.nih.gov/mobile/
Appraise	EBM Calculator from the University of Toronto's Centre for Evidence-Based Medicine http://www.cebm.utoronto.ca/palm/eb

What Medical Calculator do you use?

1. Skyscape Archimedes/ Archimedes 360
2. [Doctorcalc](#)
3. [Thompson Clinical Xpert \(formerly MobileMicromedex\)](#)
4. [ABG Pro](#)
5. [AgileMedCalc](#)
6. [EBM Calculator](#)
7. [National Heart and Lung Institute](#)
8. Other
9. None



skyscape



Smart Search



Archimedes...



DrDrugs®



Ferri's Clinic...



Harriet Lane



Labs 360°



Medical Epon...



Netter's Atla...



Outlines in...



RxDrugs™



Home



Store



MedAlert



History



Tools



[Back](#)

Archimedes 360°

No. Needed to Treat

Ctrl.Gr. (Total)

Ctrl.Gr. (w/
Cond)Act.Tx Grp.
(Total)Act.Tx Grp. (w/
Cond)[clear](#)**Precision**

No. Needed to Treat =

The number of patients you need to treat in order to
prevent condition



Home



Index



Link



History



More



Archimedes 360°

Probability from Odds

Probability that a particular event will occur is the ratio of the number of ways the event can occur to the total number of possible outcomes.

Odds are the number of ways an event can occur divided by the number of ways an event cannot occur.

An illustrative example is given below:

Q. Find the probability of randomly selecting the letter *p* in the word "Mississippi."



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History



More



Archimedes 360°
Main Index

look for

*	*
6 H's - 6 T's	A
A	B
A-a gradient	C
Aa gradient (Alveolar gas equation)	D
ABCD stroke score	E
ABG analyzer	F
ABI (Periph vasc dz)	G
	H
	I
	J
	K
	L
	M
	N
	O
	P
	Q
	R
	S
	T
	U
	V
	W
	X



Archimedes 360°
Back Arterial Blood Gas (Abg) Analyzer

pH (nl 7.36-7.44)

pCO(2) (nl 36-44
mmHg)

HCO(3) (nl 22-26
mEq-mmol/L)

Po(2) (mmHg)

Fio(2) (0.21-
1.00)

Anion-Gap Analysis Data (Optional)

Na+ (nl 135-145
mEq-mmol/L)

0

Cl- (nl 96-108
mEq-mmol/L)

0

clear

ABG Analyzer



Which mobile drug reference app should I use?



- A. ePocrates
- B. Micromedex
- C. Medscape
- D. Lexi drugs
- E. Skyscape DrDrugs
- F. Skyscape AHFS Drug Information
- G. Medical Letter
- H. Other

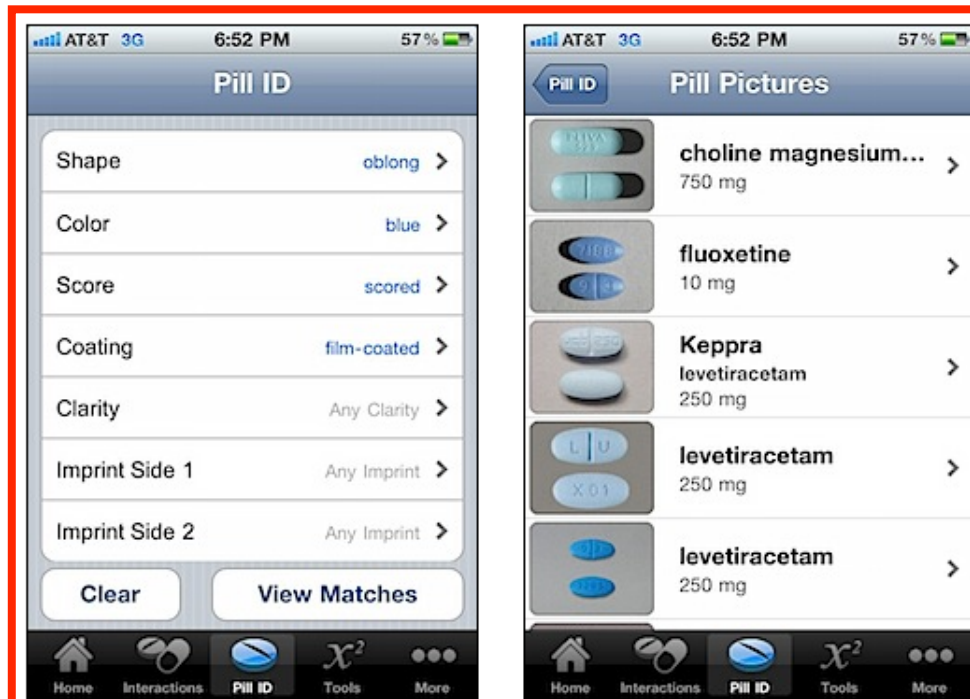
PDA vs Online Drug Information Databases

Medscape® www.medscape.com										
Question Category (no. of questions)	CP		EF		EP		LC		MM	
	PDA	Online	PDA	Online	PDA	Online	PDA	Online	PDA	Online
No. of Questions Answered Correctly										
Dosage, schedule (17)	15	16	12	12	12	13	13	13	14	15
Drug interactions (17)	14	14	12	12	13	13	13	13	13	15
Methods of administration (13)	12	12	10	10	10	12	12	12	11	13
Adverse drug reactions (13)	10	13	9	9	9	9	12	12	9	13
Over-the-counter products (13)	5	11	4	4	4	4	9	9	0	6
Indications, unlabeled uses (11)	11	11	6	6	6	6	10	10	7	10
Identification, content (10)	5	10	5	5	5	7	6	9	5	8
Pharmacokinetics (10)	2	8	3	3	5	5	7	8	5	9
Compatibility, stability (9)	4	8	1	1	4	4	9	9	4	8
Contraindications (9)	6	9	5	5	6	6	7	7	9	9
Dietary supplements (8)	7	8	0	0	7	7	1	6	7	8
Pharmacology, MOA (8)	4	8	7	7	7	7	8	8	5	7
Pregnancy and lactation (8)	5	7	6	6	6	6	8	8	7	8
Foreign drug identification (7)	0	1	0	0	0	0	0	3	0	3
Cost and economics (5)	0	1	4	4	4	4	4	4	0	0
Percentage of Total Questions										
Total questions (158)	63.3	86.7	53.2	53.2	62.0	65.2	75.3	82.9	60.8	83.5

CP = Clinical Pharmacology OnHand and online; EF = Epocrates Rx Free and Online Free; EP = Epocrates Rx Pro and Online Premium; LC = Lexi-Drugs and Lexi-Comp Online; MM = mobileMicromedex and Micromedex; PDA = personal digital assistant; MOA = mechanism of action.

Epocrates

- * Premium version runs \$99-199 yearly
- * iTunes and Android
- * Free version offer Pill ID feature



Epocrates

- * Also offers Medication interactions check, but MedScape is more inclusive



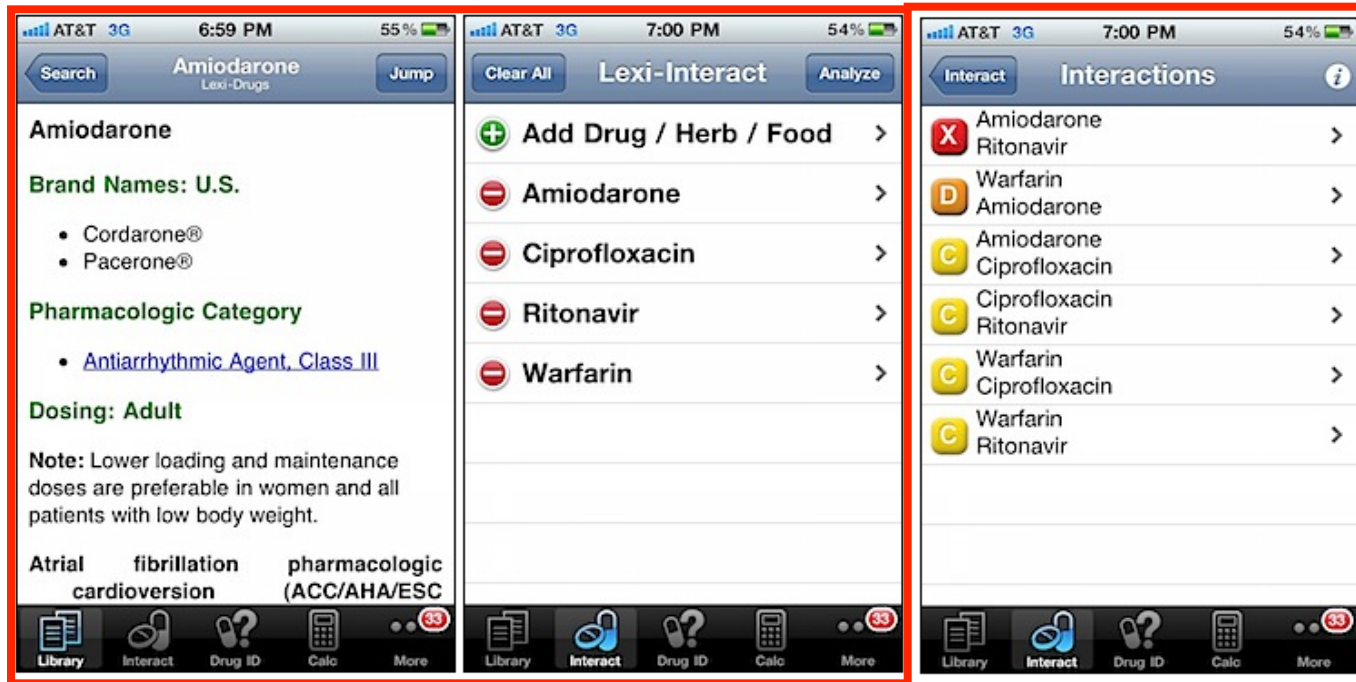
Downsides to Epocrates Free version

- * Medical Calculator lacks content compared to MedCalc
- * Paid version includes disease monographs with treatment options, infectious diseases and IV compatibility checker
- * Bottom line: Pill ID function is unique and useful



Lexi-Comp

- * Library subscribes to web version of Lexi-Comp (no mobile access)



ison's

UpToDate Inc.

www.uptodate.com/cont



Google

Log In

UpToDate

New Search



Search





Januvia

Search

السابق

التالي

التدوين الآلي

تم

Q

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P

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K

L



Z

X

C

V

B

N

M



123



space

Search

Search

Search Results

Search Results for "Januvia"

Sitagliptin: Drug
information



Sitagliptin: Patient drug
information



Glucagon-like peptide-1-
based therapies for the
treatment of type 2 diabetes
mellitus



Sitagliptin and metformin:
Drug information



Sitagliptin and metformin:



Previous

Outline

New Search

Sitagliptin: Patient drug information

Brand Names: U.S. >

Brand Names: Canada >

Mexican Brand Names >

Pharmacologic Category >

What key warnings do I need to know about before using this drug? >

When is it not safe to use >



Adverse Reactions Significant

As reported with monotherapy:

1% to 10%:

Cardiovascular: Peripheral edema (2%)

Endocrine & metabolic: Hypoglycemia (1%)

Gastrointestinal: Diarrhea (4%), constipation (3%), nausea (2%)

Neuromuscular & skeletal: Osteoarthritis (1%)

Respiratory: Nasopharyngitis (5%), pharyngitis (1%), upper respiratory tract infection (viral; 1%)

40% (limited to important only)

Pregnancy Risk Factor B ([show table](#))

Pregnancy Implications Adverse events have not been observed in animal reproduction studies; therefore, sitagliptan is classified as pregnancy category B. There are no adequate and well controlled studies in pregnant women. Maternal hyperglycemia can be associated with adverse effects in the fetus, including macrosomia, neonatal hyperglycemia, and hyperbilirubinemia; the risk of congenital malformations is increased when the Hb A_{1c} is above the normal range. Diabetes can also be associated with adverse effects in the mother. Poorly-treated diabetes may cause end-organ damage that may in turn negatively affect obstetric outcomes. Physiologic glucose levels should be

Pricing: U.S. (www.drugstore.com)

Tablets (Januvia)

25 mg (90): \$645.98

50 mg (30): \$220.99

100 mg (30): \$223.99

Monitoring Parameters Hb A_{1c},
serum glucose; renal function prior to
initiation and periodically during treatment

Reference Range Recommendations
for glycemic control in adults with diabetes:

Hb A_{1c}: <7%

Preprandial capillary plasma glucose: 70-



How does this drug work?

- Sitagliptin raises insulin secretion from the pancreas and lowers sugar.
- It lowers sugar.

How is this drug best taken?

- This drug may be used alone or with other high blood sugar (diabetes) drugs.
- Take as you have been told, even if you are feeling better.
- Take with or without food. Take with food if it causes an upset stomach.
- Follow the diet and workout plan that your doctor told you about.

What do I do if I miss a dose? (does not apply to patients in

Back Index

januv Cancel

- J
- Janumet 50/500
 - Januvia
 - Japanese Encephalitis Virus Vaccine
- *
D
I
M
Q
V
Z

Q W E R T Y U I O P

A S D F G H J K L

↑ Z X C V B N M ↵

123 space Search





DrDrugs®

Sitagliptin

Indications



[See Pronunciation](#)

- Adjunct to diet and exercise to improve glycemic control in patients with type 2 diabetes mellitus; may be used as monotherapy or combination therapy with metformin, a thiazolidinedione, a sulfonylurea, or insulin.

Contraind./Precautions



Contraindicated in:

- Type 1 diabetes mellitus.
- Diabetic ketoacidosis.
- Hypersensitivity.

Use Cautiously in:

- Renal impairment (dose ↓ required for CCr <50 ml/min)



Home



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Link



History



More




MedScape

- * Highly ranked mobile application
- * Best: medication reference (drug interactions), procedure guide, and clinical reference.
- * Over 7,000 medication and continuously updated
- * As clinical reference does lack detail for specific illnesses
- * A must have application! itunes and Android


Reference ▾ Search




News



Reference



Education



EMA Recommends New Warnings on Osteoporosis Drug
News Alert

● ● ● ● ●





Medscape REFERENCE

Search Reference



Drugs, OTCs & Herbals



Diseases & Conditions



Procedures



Interaction Checker



Health Directory



MEDLINE



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Education





Search Education

Featured CME

A Silent Epidemic: Why Chronic Hepatitis B Matters



Treatment Initiation



Family Medicine

ESA Therapy and Quality of Life: The Management of ESRD-Related Ane...



Fri, Mar 16, 2012

Population-Based Study Links Migraine and Restless Legs



Fri, Mar 16, 2012

Determinants for Autopsy After Unexplained Deaths Possibly Resulting From Infectious Causes,...



Fri, Mar 16, 2012



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Browse by Class

Herbals & Supplements >

Imaging Agents >

Immunologics >

Metabolic & Endocrine >

Neurologics >

Nutritionals >

Oncology >

Ophthalmics >

Otics >



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sitagliptin

Saved

sitagliptin (Rx)

- Januvia
- Class: Antidiabetics, Dipeptyl Peptid...

Adult Dosing & Uses

Pediatric Dosing & Uses

Drug Interactions

Adverse Effects

Contraindications & Warnings

Pregnancy & Lactation



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sitagliptin

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Drug Interactions



Adverse Effects



Contraindications &
Warnings



Pregnancy & Lactation



Pharmacology



Pricing & Images



Add to Interaction Checker



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sitagliptin

Adverse Effects

1-10%

Abdominal pain

Diarrhea

Headache

Nasopharyngitis

Nausea

URI

Generally comparable to placebo

Frequency Not Defined

Increased creatinine phosphokinase

Idiopathic thrombocytopenic purpura



Home



News

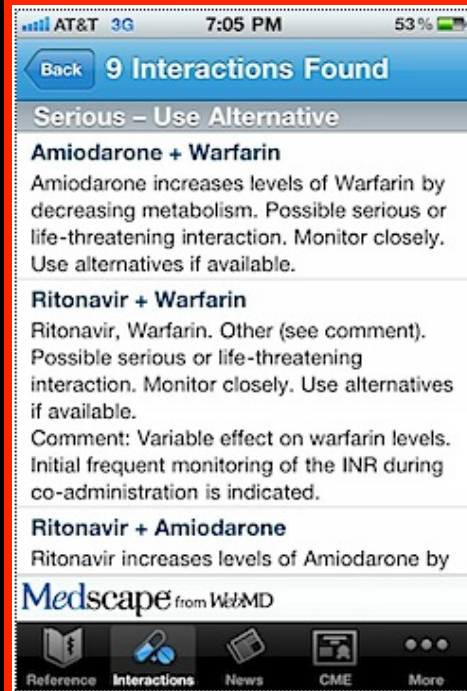
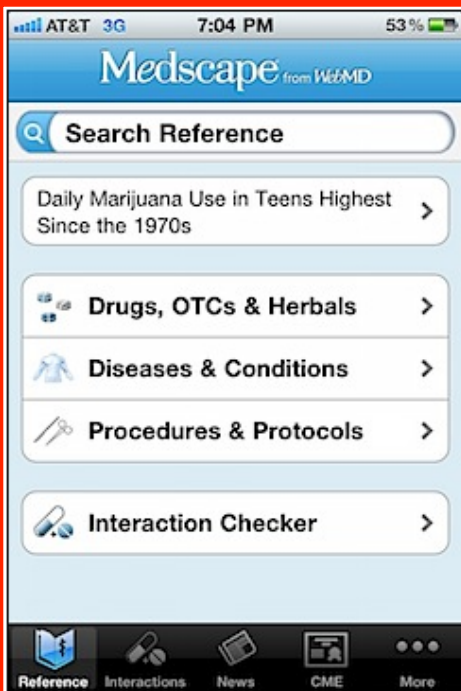


Reference



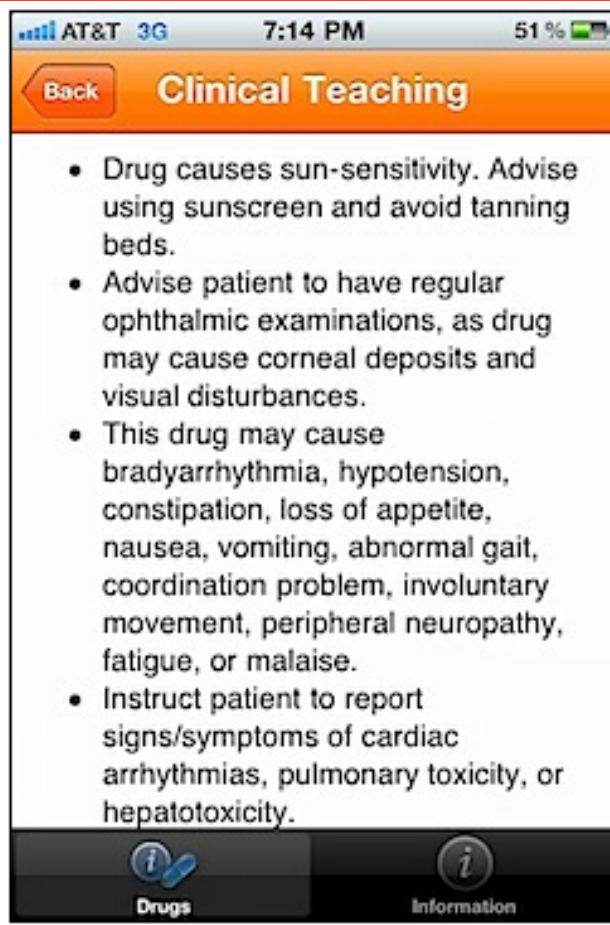
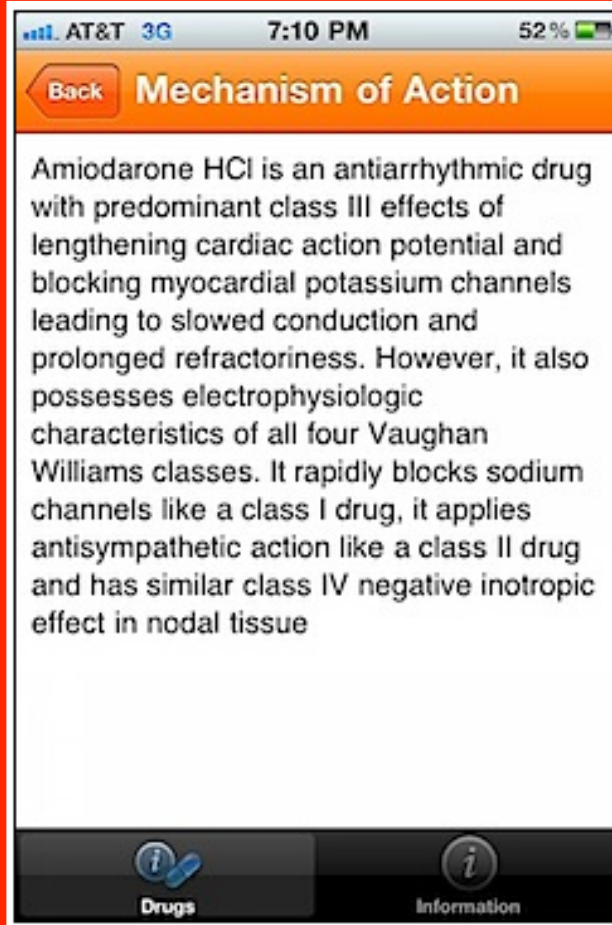
Education





Micromedex

- * Straightforward user interface, not include references from desktop version
- * Includes mechanism of action and clinical teaching section
- * Contains the Saudi national formulary
- * Explains how a given medication works, how to take medication, side effects or toxicity alerts
- * Lacks strong drug interaction, itunes and Android, free



How can I choose the best drug reference app for me?

- * Try the free version or the free trial
- * Ask your librarian about available paid resources
- * Do a few searches across all the apps
- * Get a feel for their interfaces, quality, organization
- * Keep multiple apps, different databases have different strong points

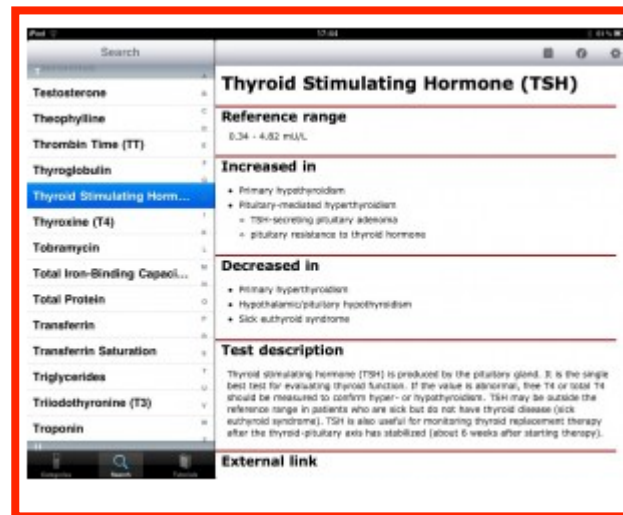


Labs

- * Lab 360 from Skyscape (free through SDL)
- * LabDx

LabDx

- * 27 categories with ~200 laboratory tests
- * Includes links to labtestsonline.org
- * Downside: No pediatric values
- * \$9.99, itunes



What social media do you use in your mobile device?

1. Facebook
2. Flickr
3. Google Plus
4. LinkedIn
5. Twitter
6. Word press
7. YouTube
8. Other



What social media do you use in your medical practice?

1. Facebook
2. Flickr
3. Google Plus
4. LinkedIn
5. Twitter
6. Word press
7. YouTube
8. Other



Web 2 Apps

Collaborating Tools:

- Social Networking tools (Facebook, Myspace , Orkut, LinkedIn,
- Wiki(Hawaiian language) meaning 'Quick'

Contributing to the Web Tools

- Blogging & Microblogging tools(Blogger, Wordpress Twitter)
- Video & Image Sharing tools: Youtube, Flickr

Aggregating and Marking Tools

- Feed Readers: (Google Reader, Bloglines, Netvibes
- Social Bookmarking : Delicious. Connotea (Design for Scientists to bookmark, tag and share)

Medical RSS feeds

- * [American Journal of Hypertension](#)
- * [CNN.com - Health News](#)
- * [eDrugSearch.com's Healthcare 100](#)
- * [JAMA](#)
- * [Medical News Today](#)
- * [Medscape News](#)
- * [Nature medicine - AOP](#)
- * [Nature Webfeeds](#)
- * [NewsIsFree: Sources in Category Health](#)
- * [NLM RSS Feeds for News, Podcasts, and Webcasts](#)
- * [Reuters: Health News](#)
- * [ScienceDaily: Health & Medicine News](#)



What is are podcasts?

- * Podcast = iPod + broadcast (audio file)
- * Podcast is a downloadable audio file
You can subscribe via RSS or iTunes
- * You can listen when you commute to work or exercise



Medical Podcasts examples

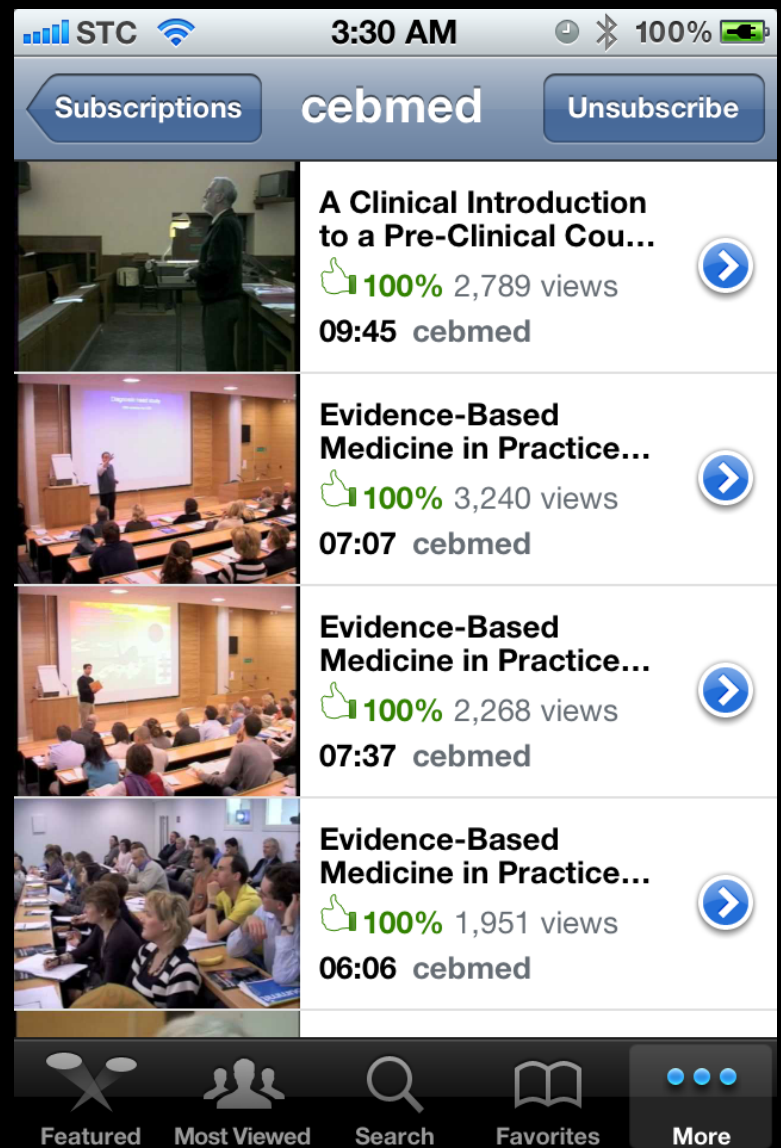
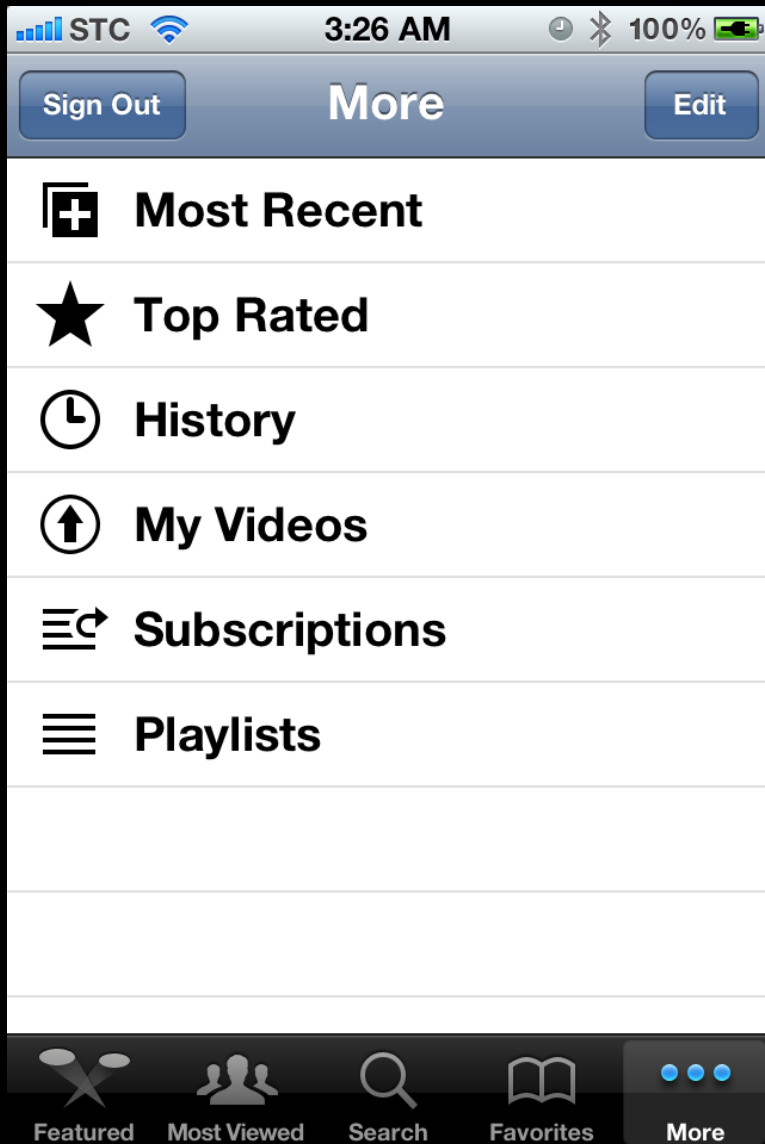


- * [Cochrane](#)
- * [Essential Evidence Plus, POEM of the Week](#)
- * [Centre for Evidence Based Medicine, Oxford University](#)
- * Most of the medical journals
- * [freemedicalpodcast.com](#)
- * [LearOutLoud.com](#)

YouTube medical channels



- * [CEBM Education Channel](#)
- * [KFSHHealthEdu](#) ي
- * [30 Youtube.com Medical Video Channels](#)








heart disease @heartdisease3 6h
Alternative Medicine bit.ly/zIEZbl



MedlinePlus.gov @medlineplus 6h
Impatience, irritability & aggression may be linked to high trans fat diets, according to researchers 1.usa.gov/FOb1g0



WebMD @WebMD 6h
Is your #pet as healthy as possible? See our pet health evaluator to help before you make a trip to the #vet. bit.ly/FPCr18



Medscape @Medscape 7h
#AAD2012: Vitamin D deficiency "epidemic" not from too little sun exposure; sun protection efforts should continue. bit.ly/xVehkt

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  Discover
  Me



iTunes U



- * Examples

- * [School of Medicine, Yale University](#)

- * [School of Medicine, Ohio State University](#)

Manage Your References

* RefWorks - RefMobile

RefWorks's mobile site allows you to view references in your account, search within RefWorks and add new references and notes.



EndNote for iPad



Reference / News applications

NEJM ✓

Harvard Public Health ✓

MedPage Today ✓

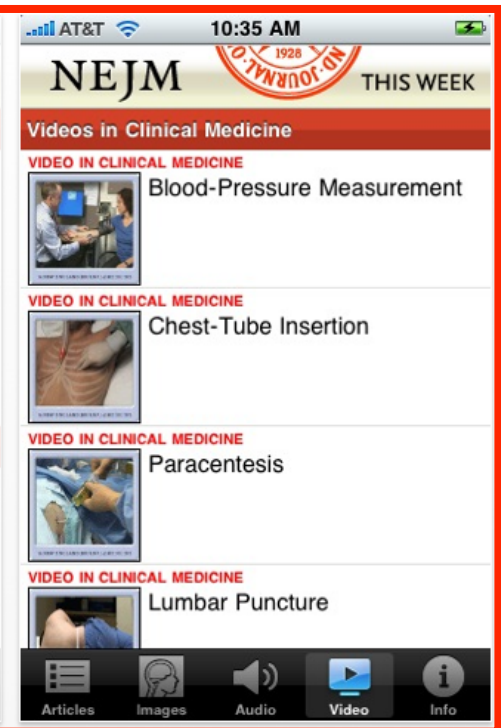
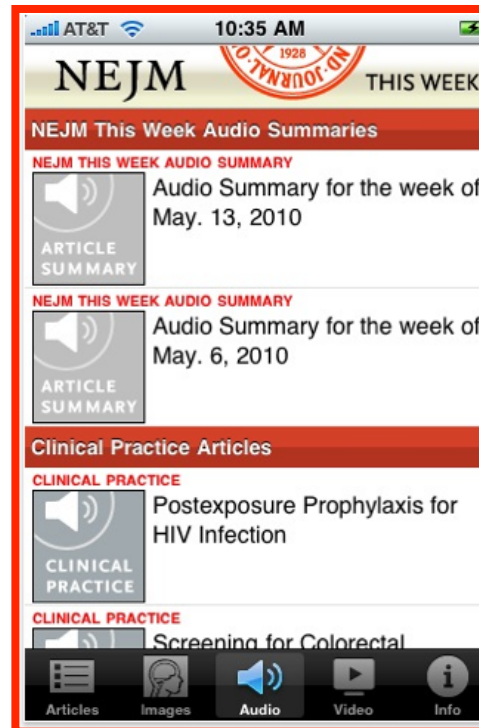
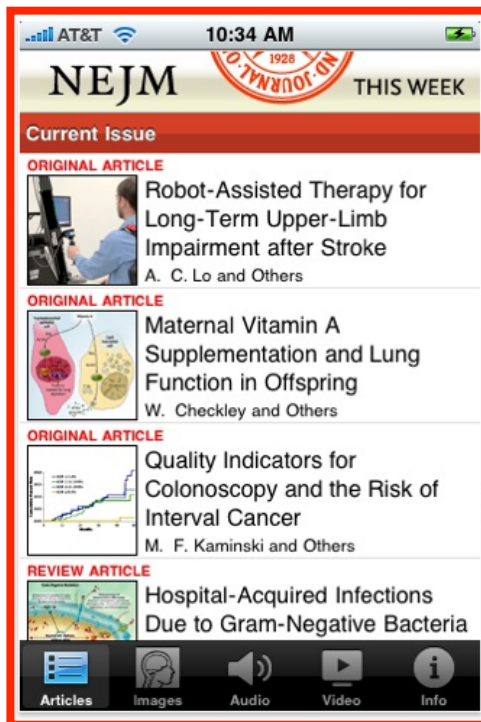
Medscape ✓

Internal Medicine News ✓



NEJM This Week

- * Weekly audio summaries, itunes
- * Videos of common procedures (paracentesis and lumbar puncture)
- * Free



Harvard Public Health

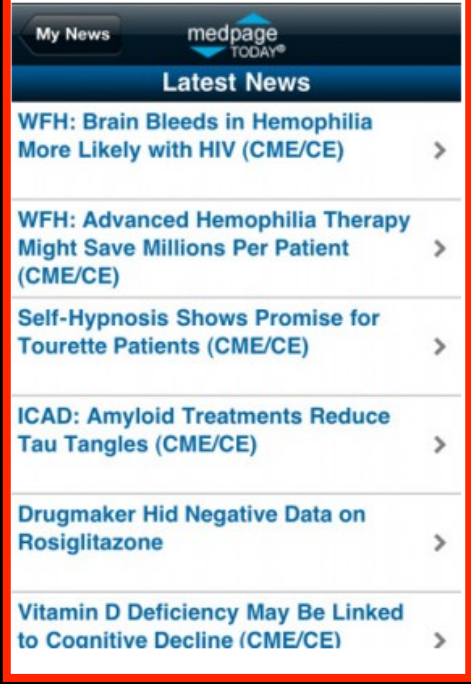
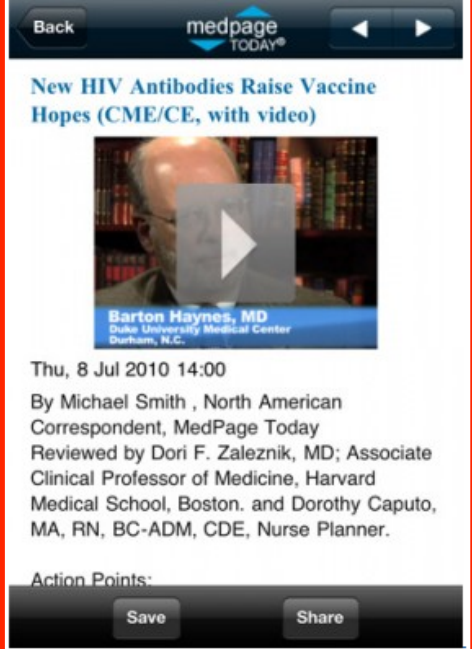
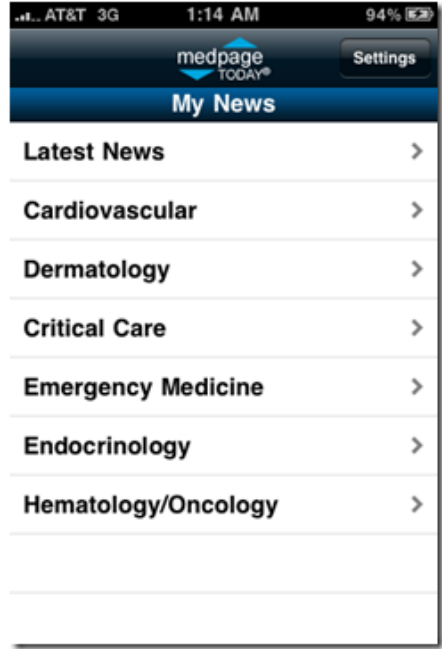
- * Videos
- * Podcasts
- * Breaking News
- * Free
- * itunes and Android



MedPage Today

- * Designed University of Pennsylvania School of Medicine
- * Access to up-to-date news sorted by field
- * Custom select favorite channels
- * Audio and video-education on the go!
- * Free
- * itunes and Android





Internal Medicine News

- * Independent bimonthly newspaper founded in 1968
- * Iphone and Itouch, No Android
- * Free
- * Options include: News, specialty focus, blogs, videos, Facebook
- * Include study citations for further reading
- * Stories can take time to load depending on connection
- * No “most popular” listing yet



Point of care applications

Wikipanion ✓

Calculate by QxMD ✓

OB (Pregnancy) Wheel by Quatertone ✓

Scutsheet-tracking patients

Eponyms ✓

Scutsheet-tracking patients

- * \$9.99, itunes
- * Android, beta, free
- * Track multiple patients
- * Add events for each patients
- * Calculate important parameters
- * Does not offer ranges
- * Does not screen for erroneous inputs
- * No print or email feature just yet

Pad 11:30 PM 80% BDO

Charcot, Jean-Marie · MRN: 991120 Results Timeline

February 3, 2011

HD 2 Enter Notes Here

Tu 39.5 °C

P 50 - 95 CVP (8 - 12)

BP 90 - 140 MAP (65)

55 - 85

RR 16 - 24/16 PEEP 5

SpO2 98 ON 100% PSV Vt 500

Na+ K+ Ca2+ Mg2+ PO4 Alb

Clear Done

1 2 3

4 5 6

7 8 9

0

Uncorrected

Neuts 10.1 x 10⁹ 72

Lymphs 1.4 x 10⁹ 10

Basos 0.3 x 10⁹ 2

Monos ---

Eos ---

Bands 0.7 x 10⁹ 5

Done

PT 28.0

1.1

Height 72 in

Weight 230.0 lbs

BMI: 31.2

BSA: 2.30 m²

Done

Studies

★ 23:24 Amylase 706

★ 23:24 Lipase 945

Eponyms

- * \$1.99 in itunes, 1,700, 28 categories, Android, free
- * Fully searchable from Andrew J. Yee
(www.eponyms.net)



iPad 23:38

fracture Done

Eponym

A

Antley-Bixler syndrome

B

Barton's fracture

Battle's sign

★ Bennett's fracture

Bjork-Shiley valve

boxer's fracture

C

clay shoveler's fracture

Colles's fracture

★ Collet-Sicard syndrome

Coopernail's sign

D

Destot's sign

Deutschlander's fracture

G

Galeazzi fracture

H

LeFort III fracture

Complete craniofacial separation; different from LeFort II in that it extends through the nasofrontal suture and frontozygomatic sutures.

ENT, ORTHO

Created: 28.02.00
Updated: 28.02.00

Random Eponym Random Title

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A S D F G H J K L Search

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iPad 23:33

Categories All Eponyms

Eponym

A

Abernethy malformation

Achenbach's syndrome

Adamkiewicz, artery of

Adamson's fringe

Addison's disease

Adie's pupil

Adler sign

Adson's sign

Ahumada-del Castillo syndrome

Aicardi syndrome

ainhum disease

Alagille syndrome

Albers-Schönberg disease

Albert's test

Albright's hereditary osteodysr...

Alder-Reilly anomaly

Alexander's disease

Alexander's law

Allen's sign

Allen's test

Allis sign

Abernethy malformation

Congenital anomaly of the splanchnic vasculature, arises from defects in vitelline vein formation; in type 1, portal vein completely diverted into IVC and complete absence of formation of intrahepatic portal vein; in type 2, portal venous system is formed, but there is an abnormal communication with systemic veins, usually IVC; associated with hepatic encephalopathy and hepatopulmonary syndrome; more common in dogs, particularly Yorkshire terriers.

ANAT, GI, PEDS

Created: 17.01.05
Updated: 22.06.09

Random Eponym Random Title



Productivity Applications

Feedly ✓

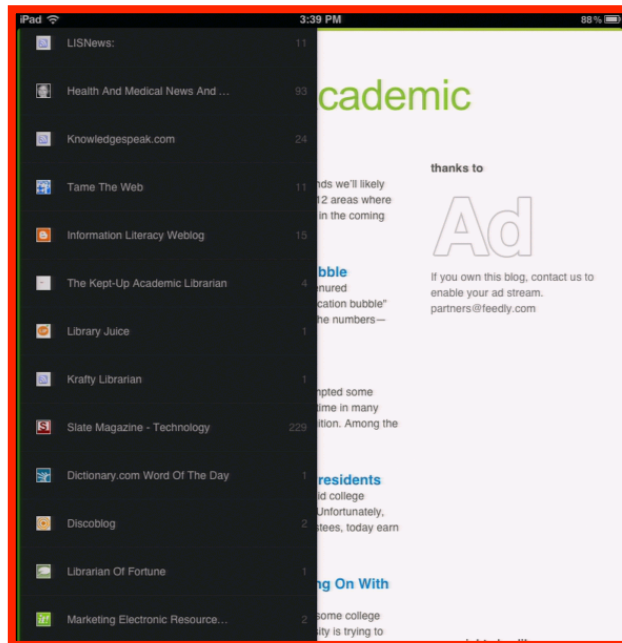
Dropbox ✓

Evernote ✓

Goodreader ✓

Feedly-RSS reader

- * Free, itunes and Android, highly rated
- * Read all your favorite blogs and web sites in one place

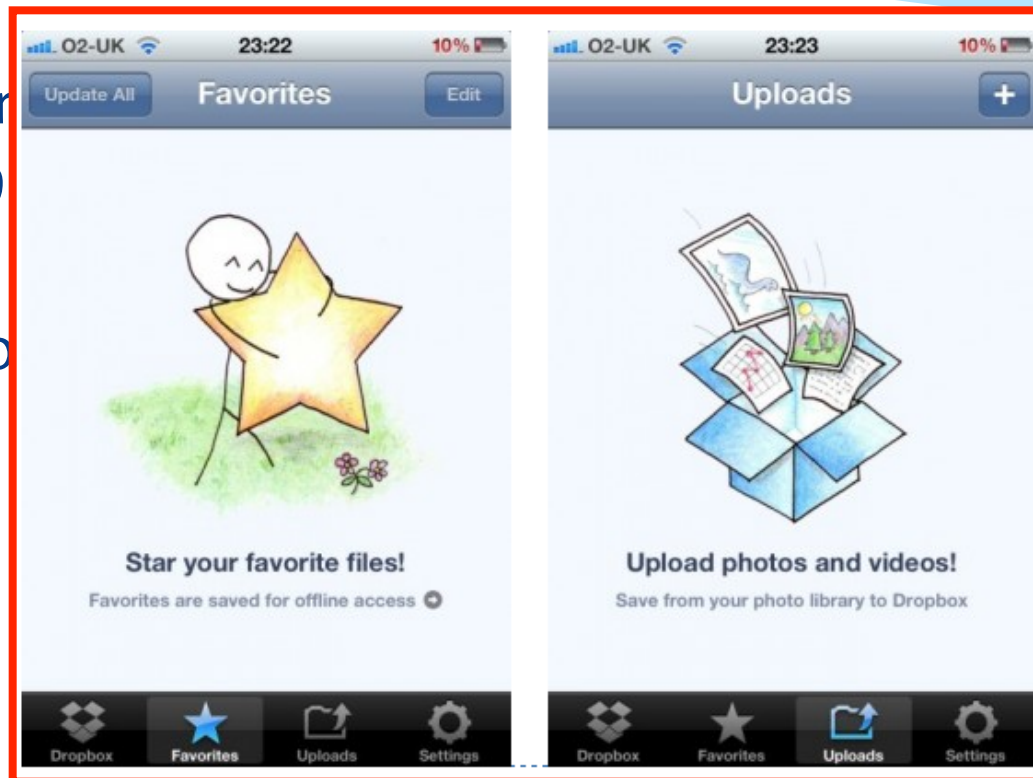


Dropbox

- * 2GB free or \$19
- * Store Andro

9.99/mn

d



Evernote

- * Premium \$5 per month or \$45 per year, Free monthly 60MB
- * Premium: Search within PDFs, Android and itunes
- * Premium: Monthly upload allowance increased to 1GB

Remember everything.



The advertisement is set against a green background with a red border. It features three main sections, each with an illustration and a heading. The first section on the left shows a laptop with a shopping list and a recipe, with a speech bubble icon above it. The middle section shows a tablet and a smartphone connected by a cloud icon. The third section on the right shows a search bar with the text 'salty ramen' and a recipe card above it.

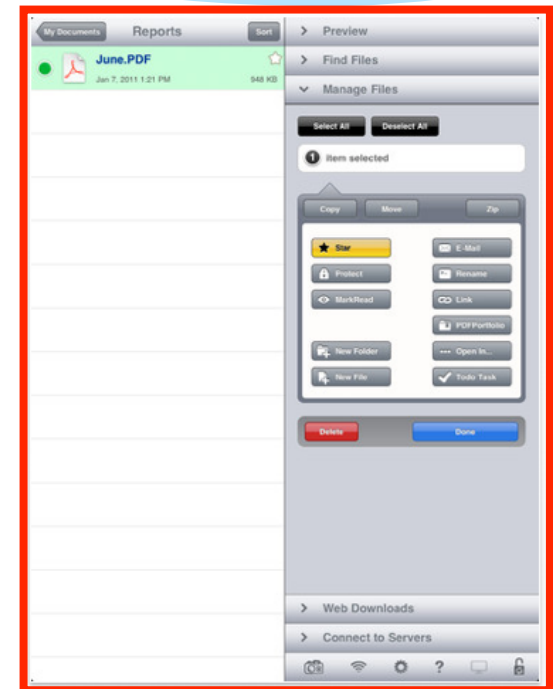
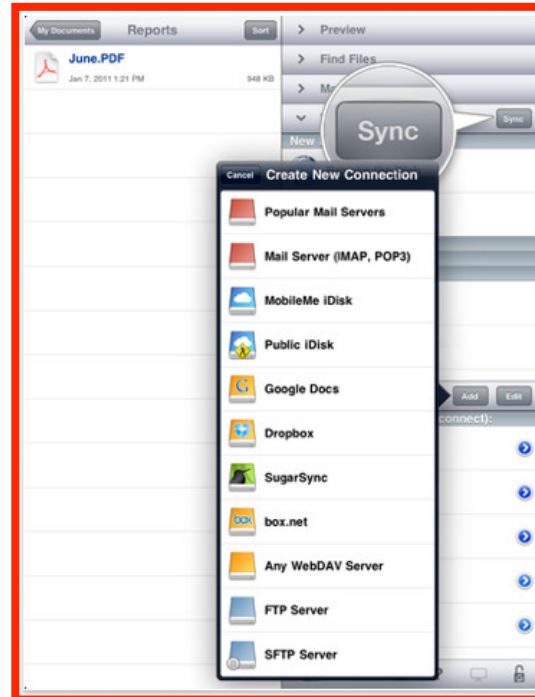
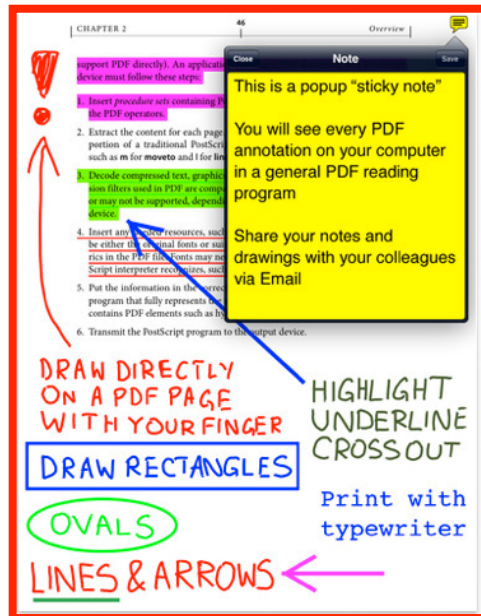
Capture anything.
Save your ideas, things you like, things you hear, and things you see.

Access anywhere.
Evernote works with nearly every computer, phone and mobile device out there.

Find things fast.
Search by keyword, tag or even printed and handwritten text inside images.

Goodreader

- * \$4.99, iTunes only
- * “a Swiss army knife of awesome”
- * PDF reader on androids



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Drugs.com
Pill Identifier by Dr... + \$0.99 >
★★★★★ 12 Ratings



Danike, Inc.
PocketPharmacist... + \$1.99 >
★★★★★ 232 Ratings



Red Hammer Software
Sleep + \$0.99 >
★★★★★ 92 Ratings



iAnesthesia LLC
Instant ECG: An Ele... \$0.99 >
★★★★★ 332 Ratings



Seacloud Software
Baby Connect: track... \$4.99 >



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Review Sites

iPhone Medicine Blog

- * Created and maintained by Dr. Salvatore Volpe. Not updated as often as other pages on this list, but Dr. Volpe does have a Twitter feed on related topics. iPhone only, but links to related sites.
- * <http://iphonemedicine.blogspot.com/>



Review Sites

iMedicalApps

- * The most widely read of all medical app review sites, receiving over 400,000 page views per month. Content is written by a team of doctors and medical students. iPhone, iPad, Android and Blackberry reviews.
- * <http://www.imedicalapps.com/>



Review Sites

MobiHealthNews

- * A newsletter that chronicles the healthcare sector's adoption of mobile technology
- * <http://mobihealthnews.com>

In summary,

- * What is the best App to use?
- * *It depends on the question you ask and information you need*

 It's question time 