# mHealth App Evaluation

by David Sainati, PharmD CEO at Medappcare







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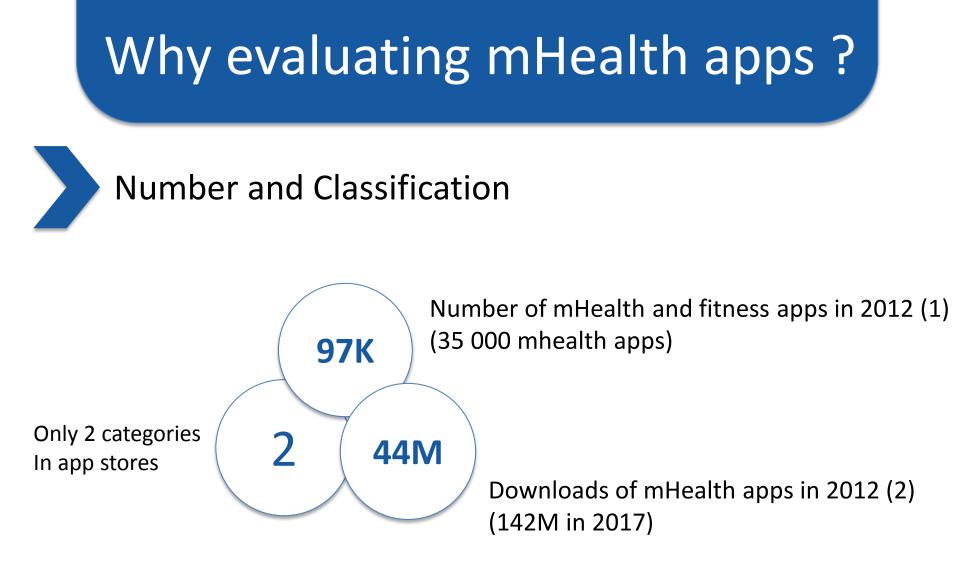
Consultant in eHealth and Social Media since 2010





### Users want quality mHealth apps

## The evaluation : Who ? How ?



#### mHealth apps are numerous and misclassified

- (1) ResearchToGuidance, Global Mobile Health Market Report 2013-2017, Mar 13
- (2) Juniper Research, Mobile Healthcare oppotunities, Dec 11



### Quality of existing apps

#### Not conform to clinical practice guidelines

A study analyzed 47 apps for quitting smoking found that none followed the majority of the US Public Health Service's best-practices guidelines for curbing tobacco addiction. (1)

#### **Based on medical myths**

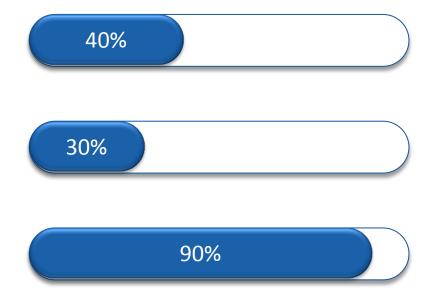
For example :

- App claims women can get larger breasts by listening to the sounds of a crying baby
- Apps claim they can help buyers choose the sex of their future babies
- Apps claim they cure acne with light therapy ...

### No medical validation needed for mHealth apps

(1) Lorien C. Abroms, Nalini Padmanabhan et al ., iPhone Apps for Smoking Cessation, American Journal of Preventive Medicine, Volume 40, Issue 3, Pages 279-285, Mar 2011

#### Data Protection and Security



40 of the paid apps had no privacy policy at all. (1)

30% of the paid apps sent data to someone not disclosed by the developer either in the app or in any privacy policy we found. (1)

90% of the paid apps don't encrypt all of their communications with SSL. (1)

### **Obvious lack of protection of personal health data**

(1) Mobile Health and Fitness Applications and Information Privacy - California Consumer Protection Foundation – July 13



Fake comments and ratings are widely used to be at the top of the rankings

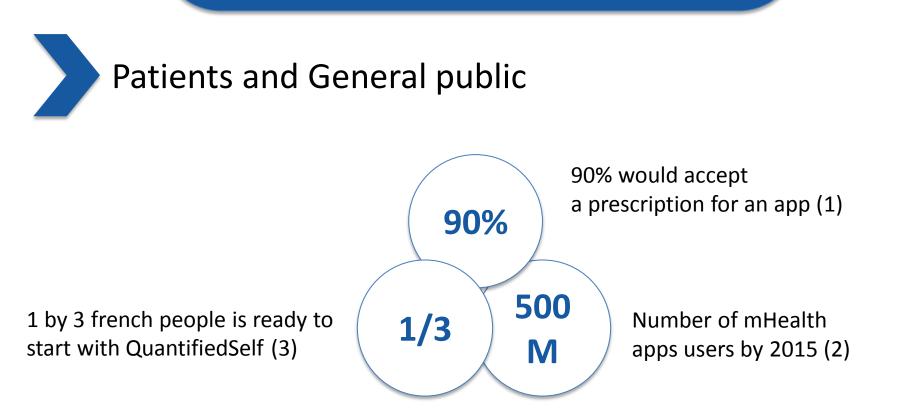
#### **Customer Ratings**



#### The users evaluation in app stores is not reliable

# Users want quality mHealth apps

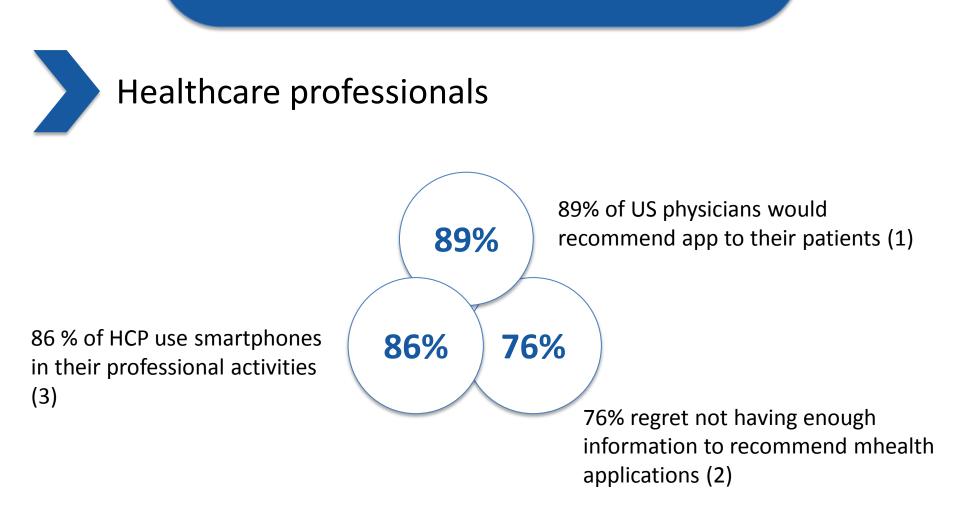
### They want quality apps



#### They look for mhealth apps

(1) Digitas Health Jun 13, (2) Research2guidance, Mobile Health Market Report 2011, Jan 2012, (3) TerraFemina-Orange 2012

### They want quality apps



#### They look for quality mhealth apps

(1) eClinicalWorks. eClinicalWorks invests \$25 million in patient engagement. February 6, 2013., (2) MediQual Research, Quelle place pour les nouvelles technologies dans la relation Medecins-Patients, Jun 2013, (3) Epocrates Mobile Trends Survey 2013

### They want quality apps



#### Institutionals, Associations, Industrials

#### Institutions, industrials and patients associations could recommend apps

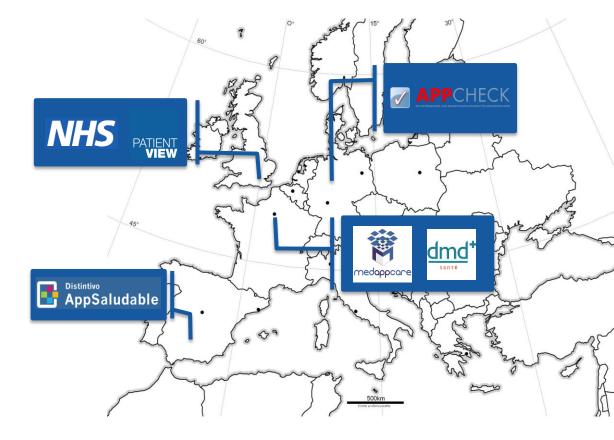
<b>NHS</b> choices health apps library				Share • S	Search for apps	Search
☆ Conditions -	Healthy living 🗸	Health information $\star$	Social care	Developers	About	
Safe and trusted apps to help you manage your health		<ul> <li>Welcome to the Health Apps Library</li> <li>Discover apps to help you manage your health</li> <li>Reviewed by the NHS to ensure they are clinically safe</li> <li>Rated by you and the health care community</li> </ul>				
Figure : Screenshot of th NHS Health Apps Library						

### They look for quality mhealth apps

# The Evaluation Who ? How ?

### Initiatives





Medappcare has the more complete and independent evaluation method

### Medappcare



We have created the first independant industrial method to evaluate technical and medical content of mHealth apps in Europe.



We propose to our users the best mhealth apps that suit to their needs

For healthcare professionals For patients and caregivers For general public

Develop a place for mHealth apps in traditional health distribution channels

Develop partnerships with actors interested in mHealth App Quality

### **Evaluation Method**



#### Some criterias of assessment

#### Technical

- Security
- Protection of data
- General
   Operation

#### Content

- Legitimacy
- Reliability

#### Service

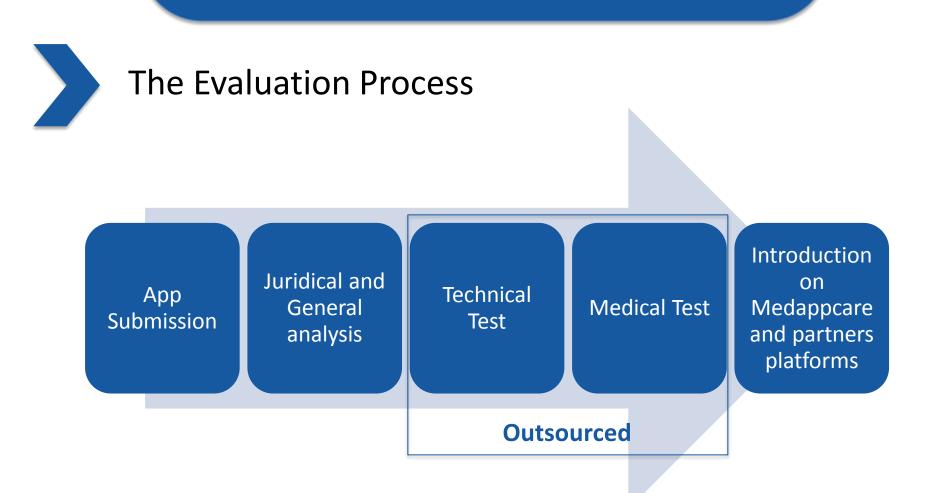
- Terms of service
- Funding
- Ads

#### Usage

- Ergonomics
- Design
- Usability

# More than 50 criterias of evaluation under the control of an independant scientifical board

### **Evaluation Method**



# Evaluation outsourced and made by healthcare professionals and a technical partner

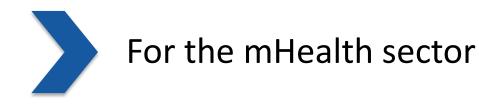
### Main issues

For Medappcare

Looking for partners in Europe / World (industrials, institutionals, associations...)

Convince app developers of the benefits of being evaluated

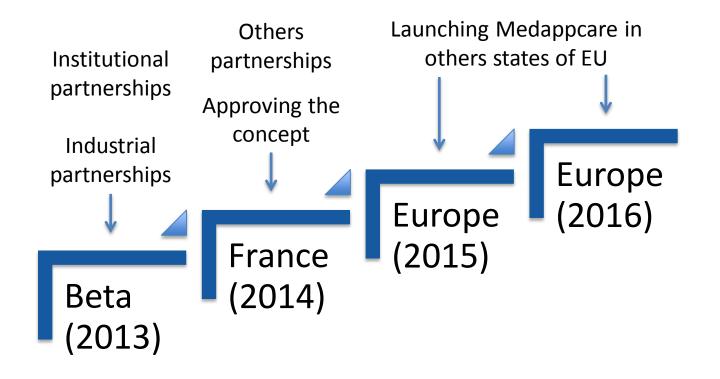
Actualize the Evaluation Method in particular the evaluation criterias



Missing Regulations in states and at the European scale

- Which type of apps is qualified as a medical device or not ?
- What is the real scope of health private data ? (barrier between Health and Wellness)

### Next steps



Be a reference in mHealth Quality in Europe by 2016

# Keep in touch

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