

# VI Reunión de la triple hélice en farmacia



**SEOUL 2017**  
**FIP WORLD CONGRESS**  
10 - 14 September

**THE SOUL OF PHARMACY**

**REFUGEE PRESSURE**  
Crunch time for Lebanon

**FIP CONGRESS 2017**  
**SEOUL REPORTS**



## Reporte FIP 2017

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# VI Reunión de la triple hélice en farmacia

77 del Congreso Mundial de Farmacia y Ciencias Farmacéuticas

Asistencia: 2600 personas

Procedencia: 94 países

Datos FIP 2017

## VI Reunión de la triple hélice en farmacia

“Invertir en servicios farmacéuticos puede conducir a la salud universal”

“El sector farmacéutico puede generar trabajos decentes, sustentables e inclusivos que pueden llevar a una mejor protección social... a través de la expansión de servicios farmacéuticos, otorgando a la gente lo que espera y necesita”

Carmen Peña *(Extracto del discurso inaugural)*

A photograph of a modern building facade with large murals and the Olympic rings logo. A blue banner is overlaid at the bottom.

**Ceremonia inaugural FIP 2017**

## VI Reunión de la triple hélice en farmacia

1. Nutriendo el alma de la farmacia
2. Farmacia inteligente
3. Farmacoterapia de precisión
4. Intereses especiales
5. Servicios farmacéuticos

**Programa FIP 2017**

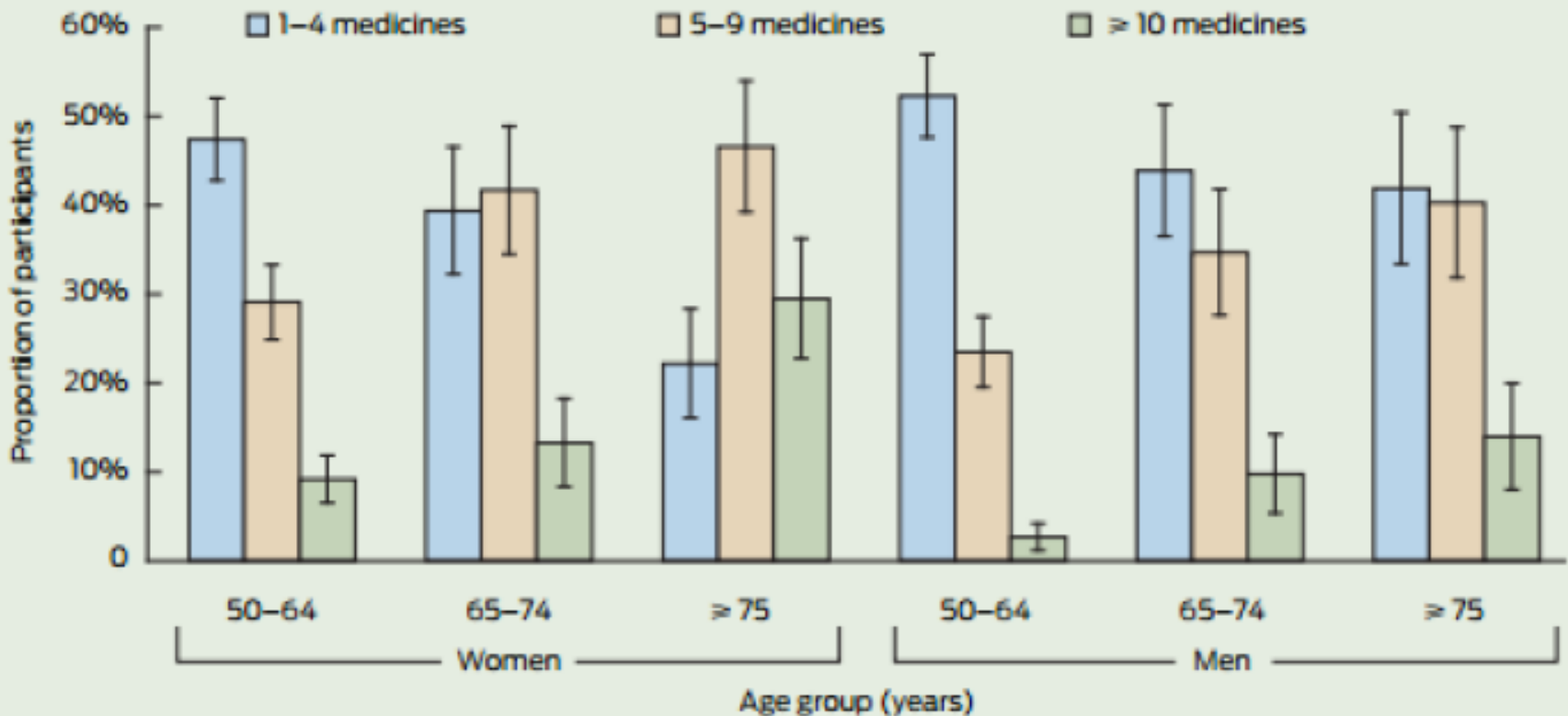
# Planteamiento general: ¿cómo nos encontramos?

## Ageing population & increased use of medicines

[https://www.mja.com.au/system/files/issues/196\\_01\\_160112/mor10698\\_fm.pdf](https://www.mja.com.au/system/files/issues/196_01_160112/mor10698_fm.pdf)

Morgan et al., MJA 2012; 196: 50–53 doi: 10.5694/mja11.10698

3 Number of medicines used in the previous 24 hours, by age group and sex — National Census of Medicines Use (June 2009 – February 2010)



## Emerging model of healthcare

Old model of care	New model of care
Focus on acute conditions, reactive management	Focus on <b>long term</b> conditions, <b>prevention</b> & continuing care
Hospital-centered, disjointed episodes	Integrated with people's lives in <b>homes &amp; communities</b>
Doctor dependent	<b>Team-based</b> , shared-record
Patient as passive recipient; self care infrequent	Patient as <b>partner</b> ; self care encouraged & supported
Use of ICT rare	<b>Dependent</b> on ICT & devices

# Tendencias de los servicios farmacéuticos

## *Implications*

*Polypharmacy & increased risk of drug related problems*

*Growing need for health care professionals with expertise in pharmacotherapy ...*

**Pharmaceutical Care Services**

**Medication Therapy Management**

**Medication Review**

**Home Medicines Review**

**Residential Medication Management Review**



## Healthcare in the digital age

- Information & communication technologies (ICT) has gained popularity among healthcare professionals
- **Healthcare professionals**
  - can access information on the internet to help them make decisions regarding patient care
- **Patients**
  - are becoming more well-informed about health-related issues through the internet



Eysenbach G. J Med Internet Res 2001;3:e20.

Tay R. Realising the iN2015 vision. Infocomm Development Authority of Singapore 2010.

# Tendencias de los servicios de salud: Tecnologías digitales

1. Social media & internet
2. Health Apps
3. Diagnostic technologies
4. Serious games & gamification
5. Robotics & AI



# Tendencias de los servicios de salud: Tecnologías digitales

## Diagnostic technologies



Original Investigation | Journal Club

August 2015

### Development and Validation of a Smartphone-Based Visual Acuity Test (Peek Acuity) for Clinical Practice and Community-Based Field-work

Andrew Bastawrous, MRCOphth<sup>1</sup>; Hillary K. Rono, MBBS<sup>2</sup>; Iain A. T. Livingstone, FRCOphth<sup>3</sup>

➤ Author Affiliations | Article Information

*JAMA Ophthalmol.* 2015;133(8):930-937. doi:10.1001/jamaophthalmol.2015.1468

The image shows the 'peek Acuity' logo at the top right. Below it is a table with the following information:

Peek Acuity - Tutorial	
Version	1.0
Last update	19.10.2016
Authors	Andrew Bastawrous, Martin Kemp

### Multiple vision tests

Measuring Vision is a vital indicator of eye health and general health. Measuring vision helps us decide who needs specialist review, who needs treatment and the success of the treatment given. There are multiple forms of vision including [acuity](#) (central vision), [contrast](#), [colour](#), and [visual fields](#) (peripheral vision). We also help understand the test score using [vision simulations](#).



studies have been conducted to validate Peek Acuity against clinical standards. One of the largest trials was published in *Lancet Global Health* in 2015 and is available to read [here](#). Peek Acuity has also been used to support important research including this study published in *Lancet Global Health*.

# Tendencias de los servicios de salud: Tecnologías digitales

## Serious games & gamification

- Gaming systems improve fitness & provide social & interactive experiences for patient players



Markins E. The 6 best Kinect fitness games. 2016 Oct 31.

# Tendencias de los servicios de salud: Tecnologías digitales

## Serious games & gamification



- 7 motives were identified through factor analyses based on survey data from 262 Pokémon Go players (45% females; Age = 30.7±7.8)  
→ Exercise, Fun, Escapism, Nostalgia, Friendship Maintenance, Relationship Initiation & Achievement [1]

### Psychiatry Research

New game software (Pokémon Go) may help youth with severe social withdrawal, hikikomori

[Masaru Tateno](#), [Norbert Skokauskas](#), [Takahiro A. Kato](#), [Alan B. Teo](#), [Anthony P.S. Guerrero](#)

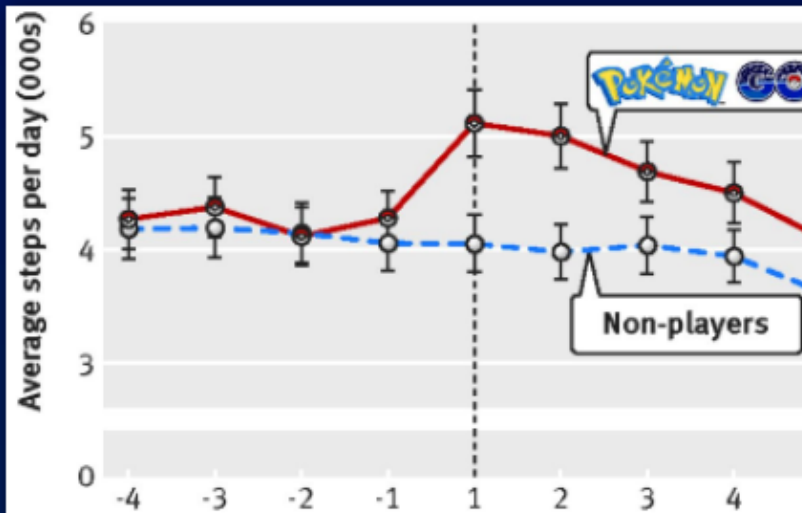
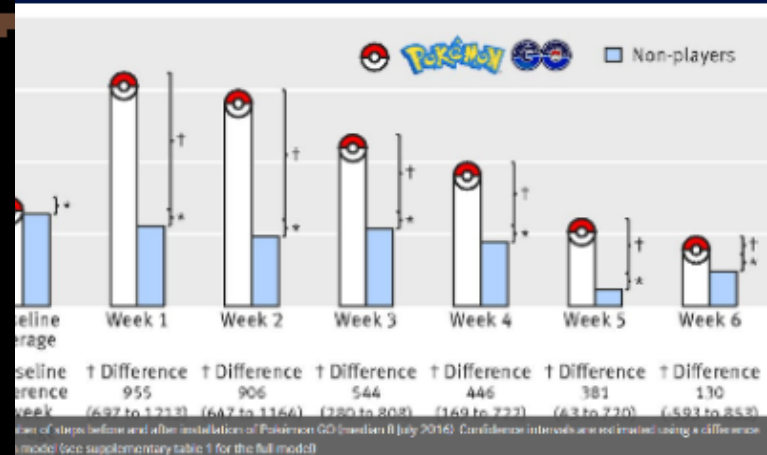


Fig 1. Average number of daily steps and 95% confidence intervals by week before and after installation of Pokémon GO (line)



1. Yang CC, Liu D. *Cyberpsychol Behav Soc Netw* 2017; 20(1)
2. Tateno M, et al. *Psychiatry Res* 2016; 246: 848-849.

## Examples of the application of technology in Pharmacy Education:

- ① Podcasts
- ① Web 2.0 tools (ie, blogging, wikis, social media)
- ① Online testing
- ① Simulation technologies

# Tecnologías para la educación: Qué considerar para mejorar la curricula (el caso del PharmD)

- Enhance active learning activities
- Facilitate practice and mastery of knowledge, skills, and attitudes across the curriculum
- Stimulate higher order thinking, problem-solving, and clinical-reasoning skills
- Foster self-directed lifelong learning skills and attitudes
- Address/accommodate diverse learning styles
- Incorporate meaningful interprofessional learning opportunities

# Tecnologías para la educación: Qué considerar para mejorar la curricula (el caso del PharmD)

Technology should not be used to facilitate information overload:



# Nuevas maneras de buscar el acceso a la salud



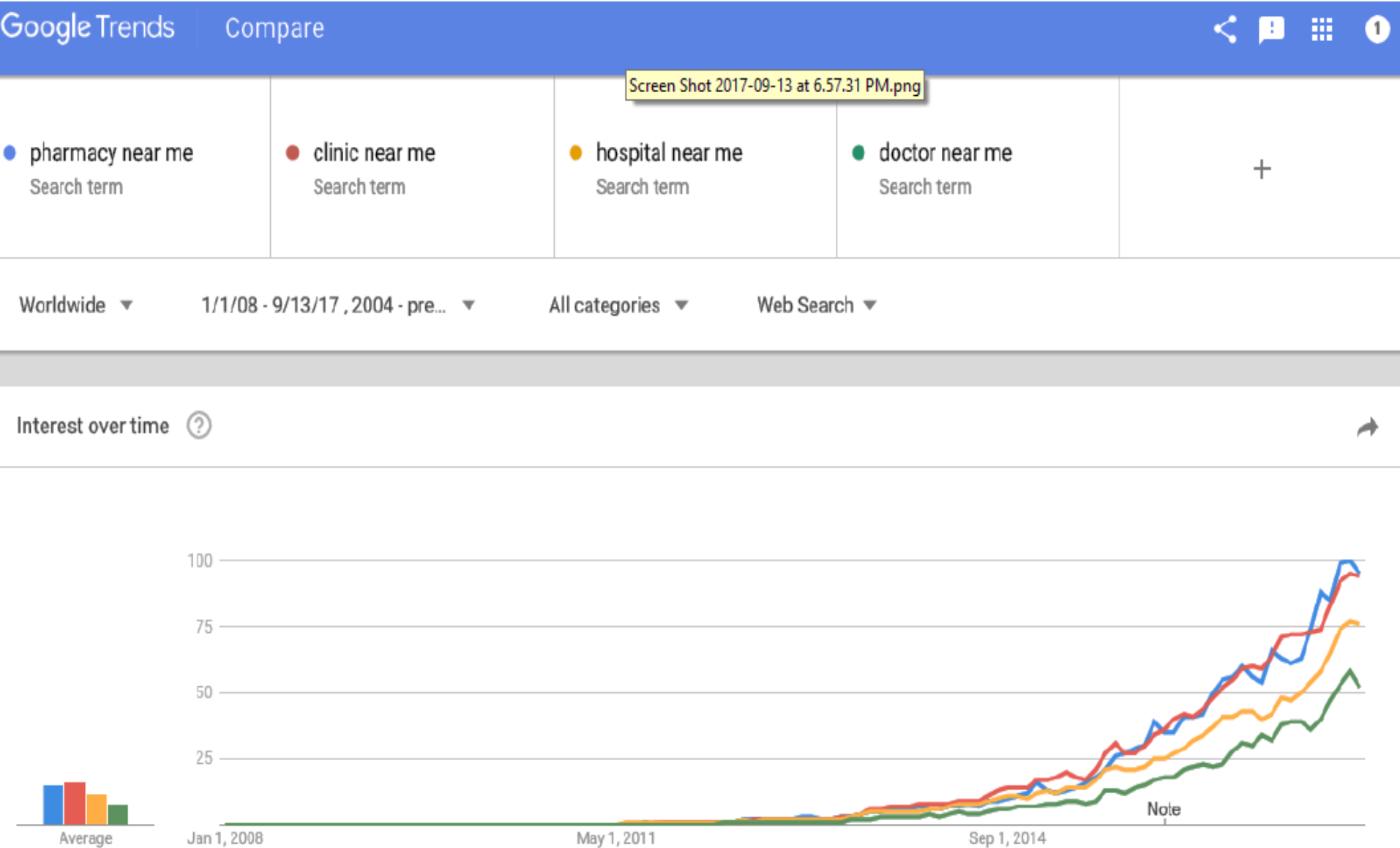
1 in 20 searches are healthcare related



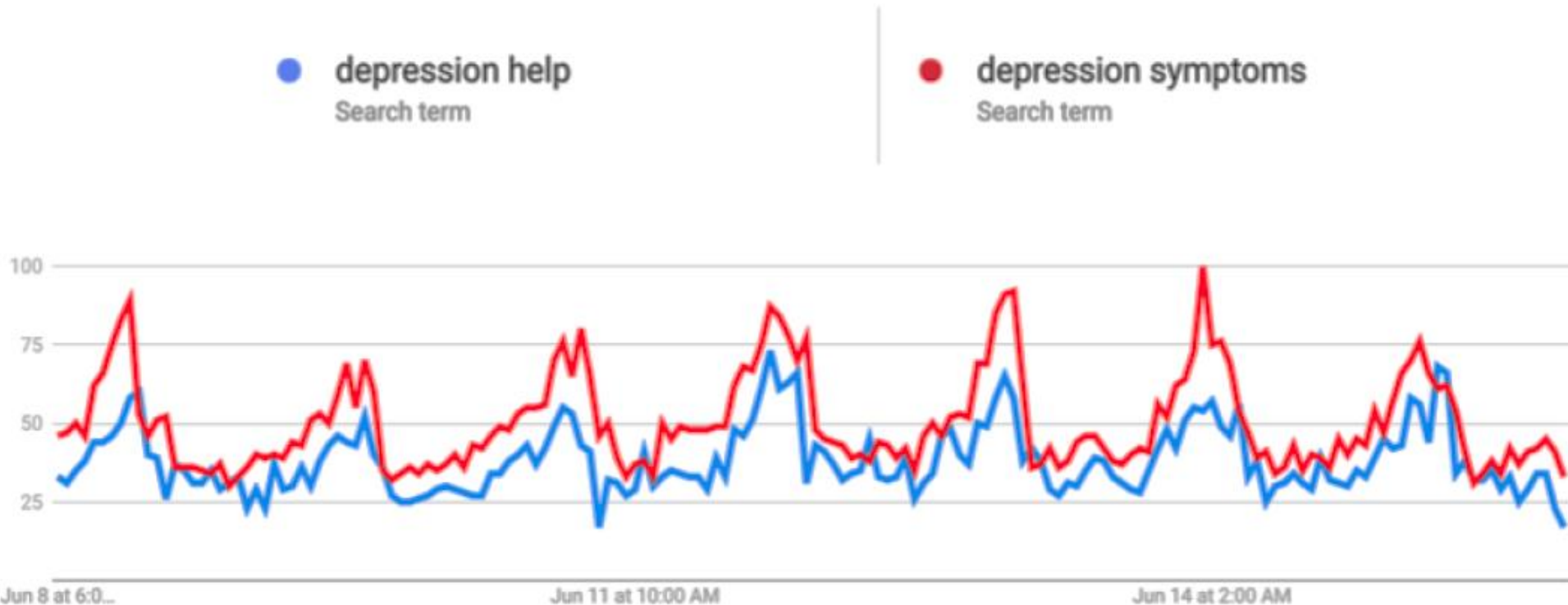
**Google Search**

**I'm Feeling Lucky**

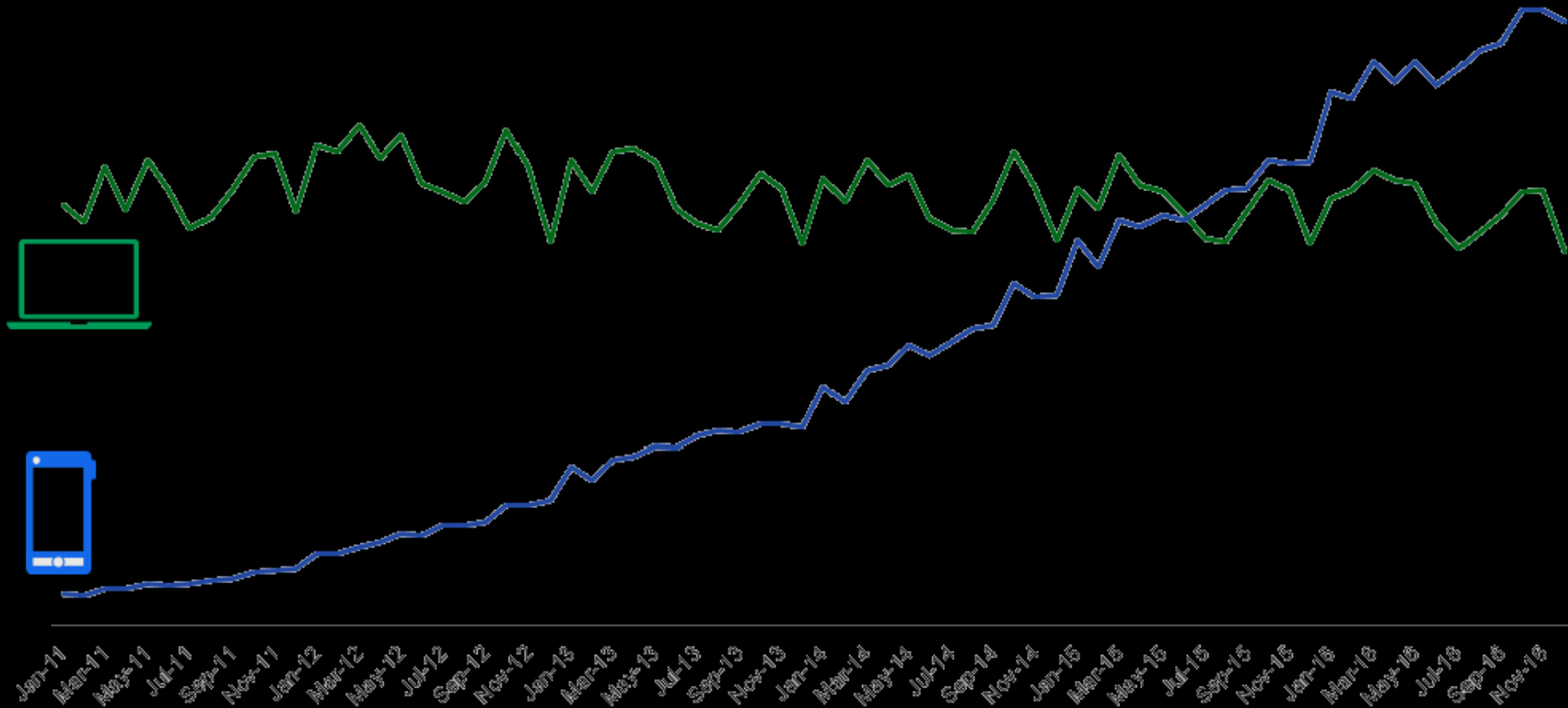
# Nuevas maneras de buscar el acceso a la salud



# Acceso a la salud desde internet

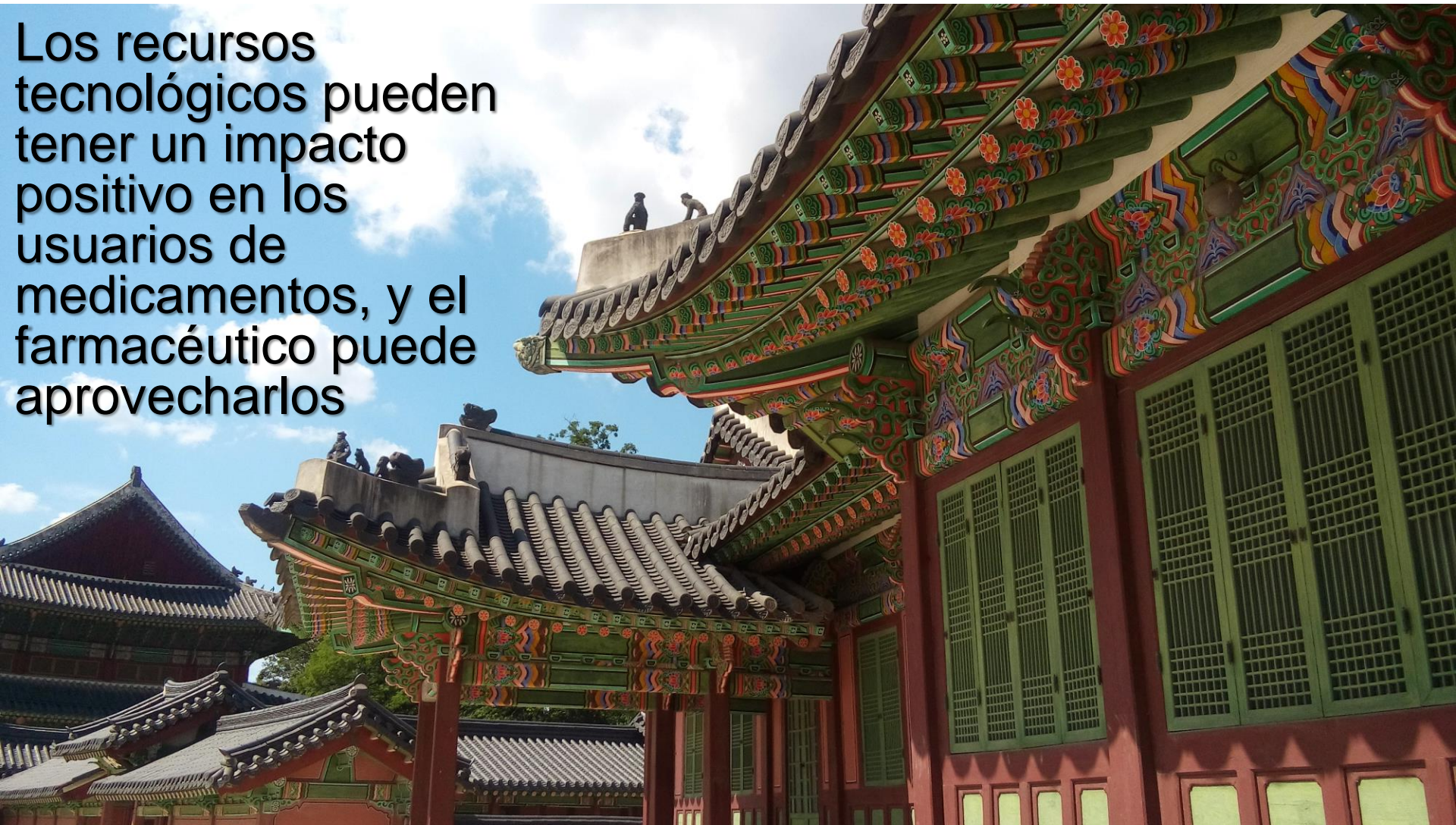


# Acceso a la salud desde internet



# Notas finales

Los recursos tecnológicos pueden tener un impacto positivo en los usuarios de medicamentos, y el farmacéutico puede aprovecharlos



# FIP World Congress of Pharmacy and Pharmaceutical Sciences 2017

Medicines and beyond! The soul of pharmacy



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**Gracias**

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