

Innovación Farmacéutica:

¿ EQUILIBRIO ENTRE BENEFICIO ? SOCIAL Y RETORNO COMERCIAL ?

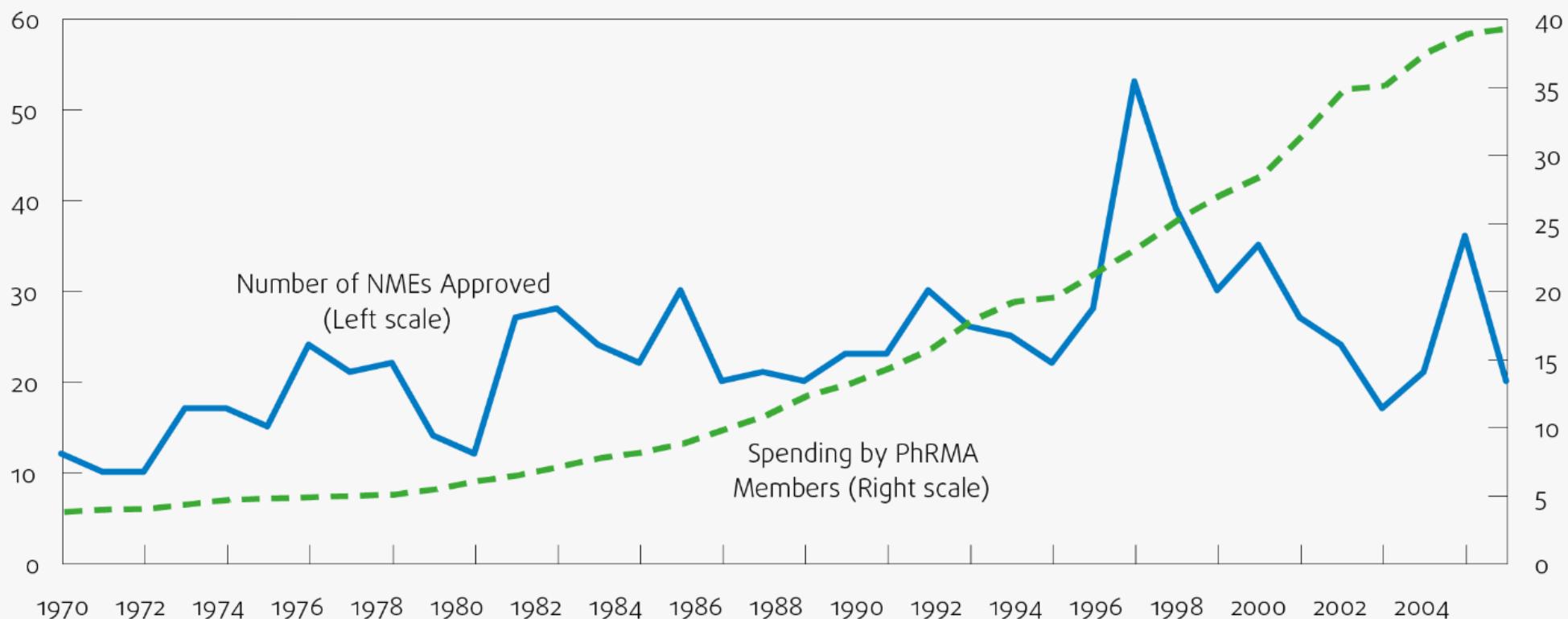
Rodrigo López M. QF. PhD.



Facultad de Medicina
Universidad de Chile

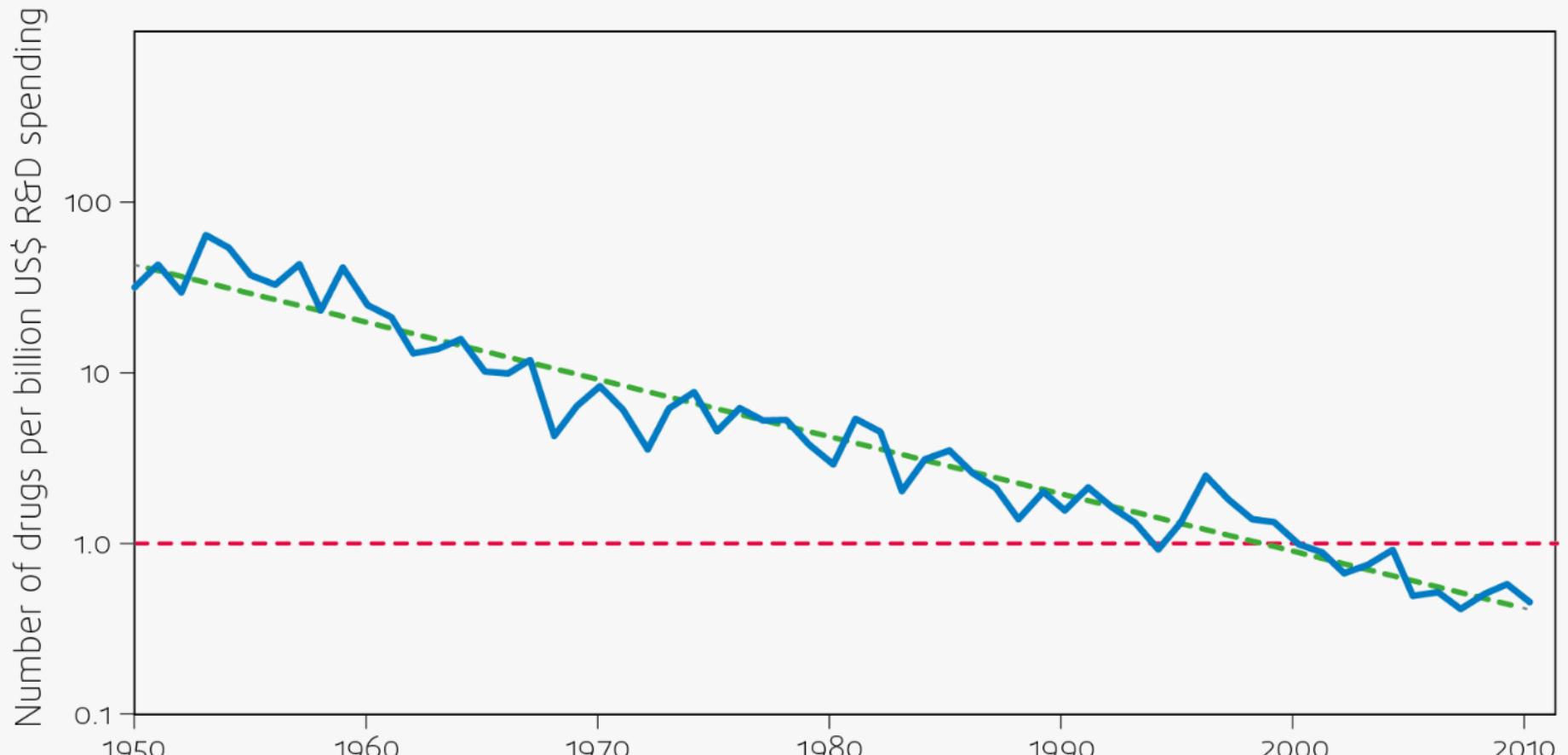


NME Approvals and Drug Companies' Spending on Research and Development (Billions of 2005 dollars)



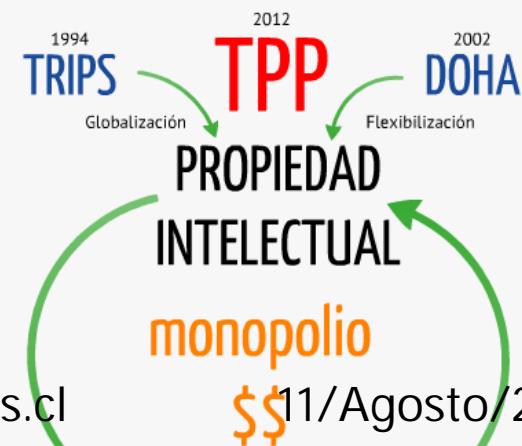
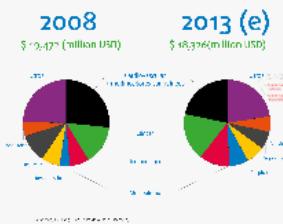
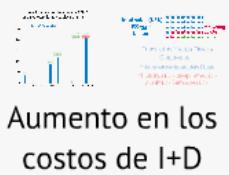
Source: Congressional Budget Office (USA, 2006)
based on Pharmaceutical Research and Manufacturers of America, and FDA data

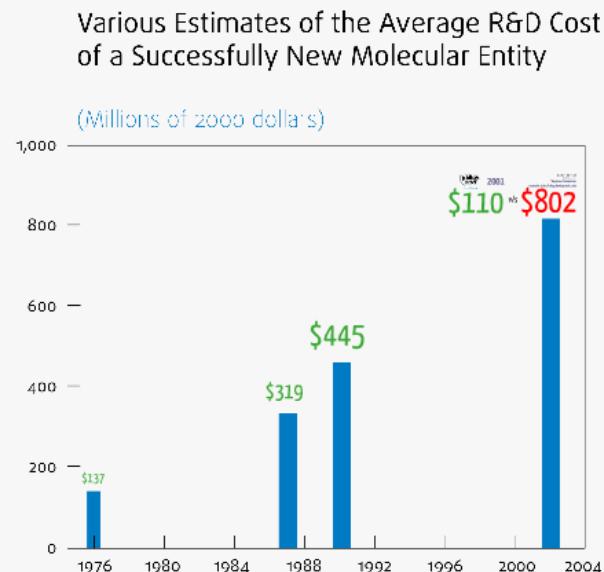
Overall trend in R&D efficiency (inflation-adjusted)



Scanell, J. 2012. Nature Reviews Drug Discovery

¿A QUE SE DEBE LA CRISIS DE INNOVACIÓN FARMACÉUTICA?





total sales (USA)
US\$235.4 billion



Promoción Médica Directa

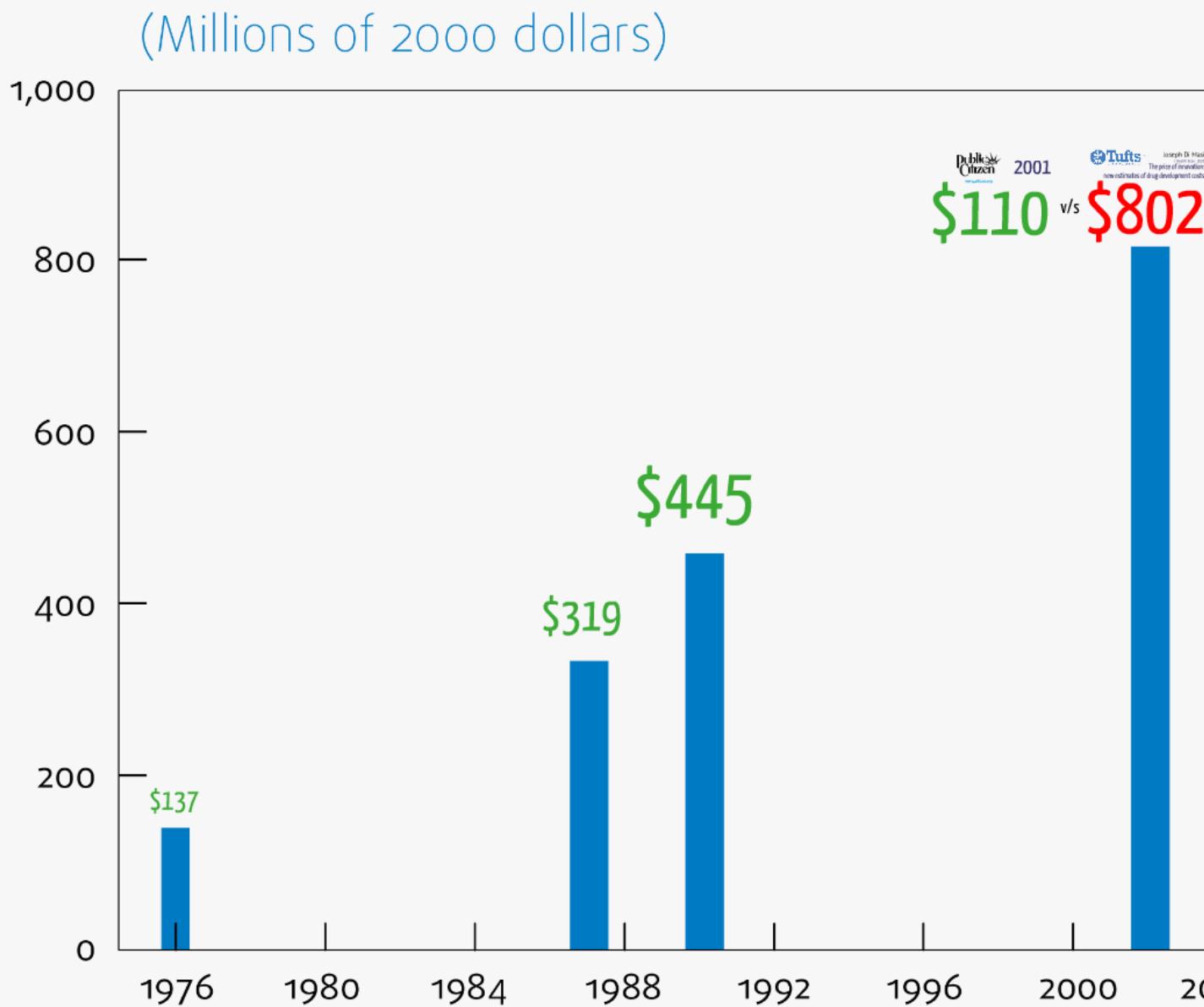
Congresos

Avisos en revistas científicas

"Al distinguido cuerpo médico
y químico farmacéutico"

Aumento en los costos de I+D

Various Estimates of the Average R&D Cost of a Successfully New Molecular Entity





Joseph Di Masi

J Health Econ. 2003

The price of innovation: new estimates of drug development costs

\$802

TUFTS Center for the study of drug development

40%

de financiamiento
por farmacéuticas y
biotecnológicas



www.citizen.org

2001

\$110

v/s

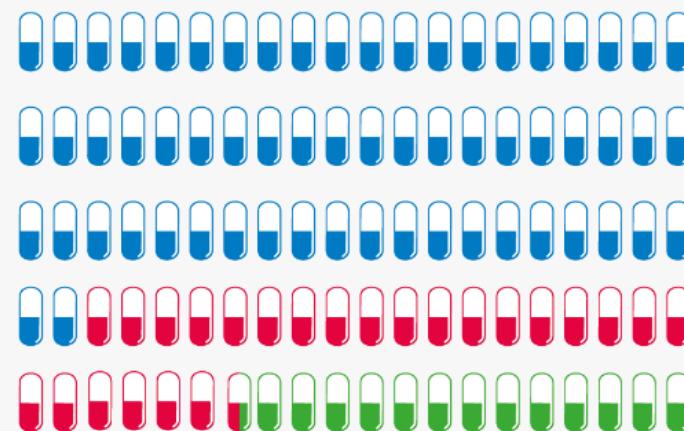
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Joseph Di Masi
J Health Econ. 2003

The price of innovation:
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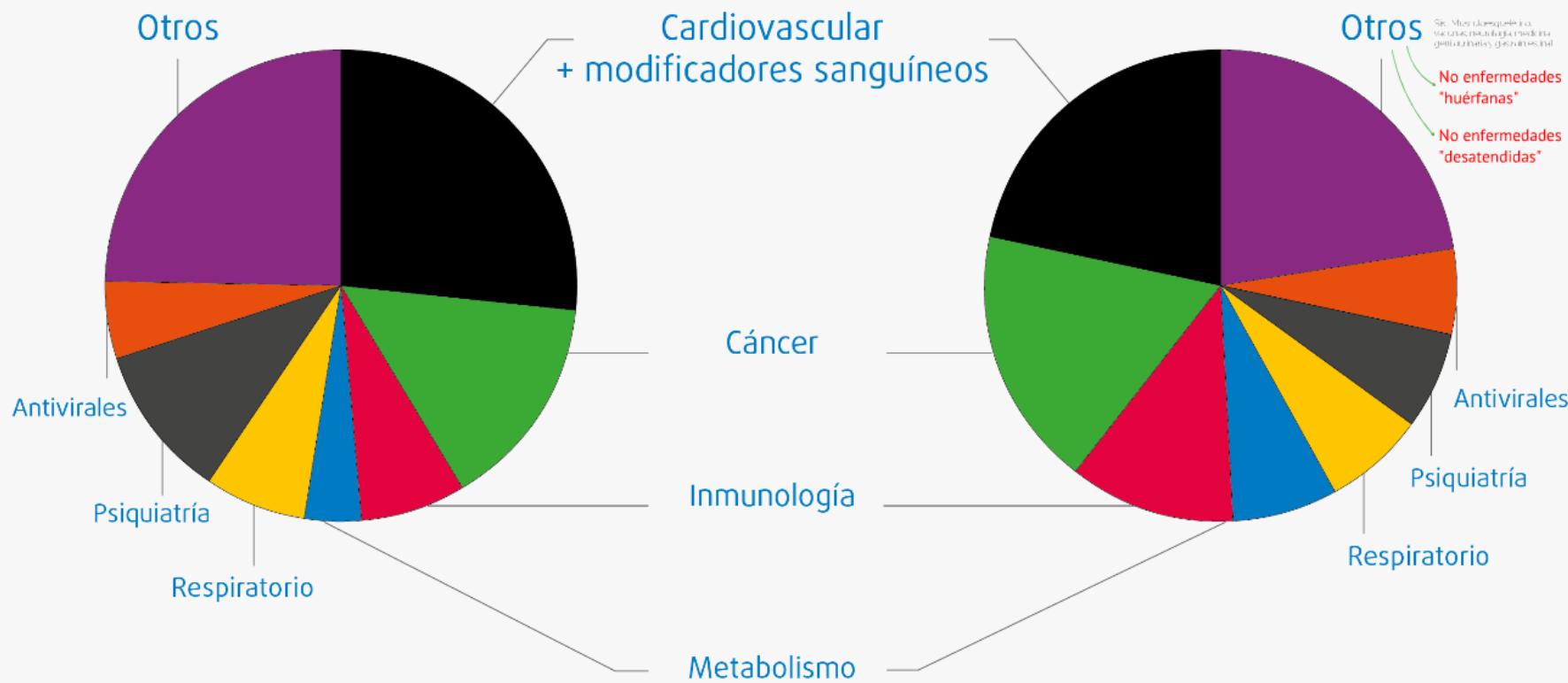
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"Al distinguido cuerpo médico
y químico farmacéutico"

2008

\$ 19,472 (million USD)

2013 (e)

\$ 18,326(million USD)



Goodman, M. 2009. Nature Review Drug Discovery

Otros

Sist. Musculoesquelético,
vacunas, neurología, medicina
genitourinaria y gastrointestinal.

**No enfermedades
"huérfanas"**

**No enfermedades
"desatendidas"**

"blockbuster" drugs

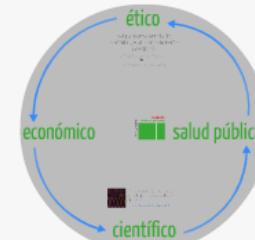
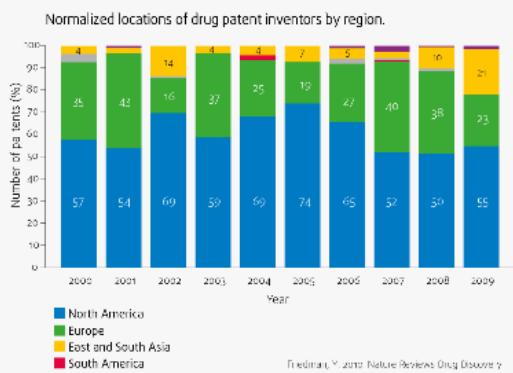
| LABORATORIO | PRODUCTO | PATENTE EXP. (USA) | VENTAS 2010 (USD bill.) |
|------------------|--|--------------------|-------------------------|
| Pfizer | Lipitor (atorvastatina) | 2011 | 11.4 |
| Bristol-Myers | Plavix (clopidogrel) | 2012 | 9.6 |
| Astra-Zeneca | Seroquel (quetiapina) | 2012 | 6.8 |
| Glaxo-Smithkline | Adavir / Seretide (fluticasona/salmeterol) | 2013 | 7.8 |
| Merck | Singulair (montelukast) | 2012 | 5.5 |
| Eli Lilly | Zyprexa (olanzapina) | 2011 | 5.1 |
| Sanofi-Aventis | Lovenox / Clexane (enoxaparina) | 2012 | 4.3 |
| Tekeda | Actos (pioglitazona) | 2012 | 4.3 |
| Novatis | Diovan / Tareg (valsartan) | 2012 | 4.1 |
| Teva | Provigil / Zalux (modafinilo) | 2012 | 1.1 |
| Roche | Xeloda (capecitabina) | 2013 | 0.6 |

propiedad intelectual

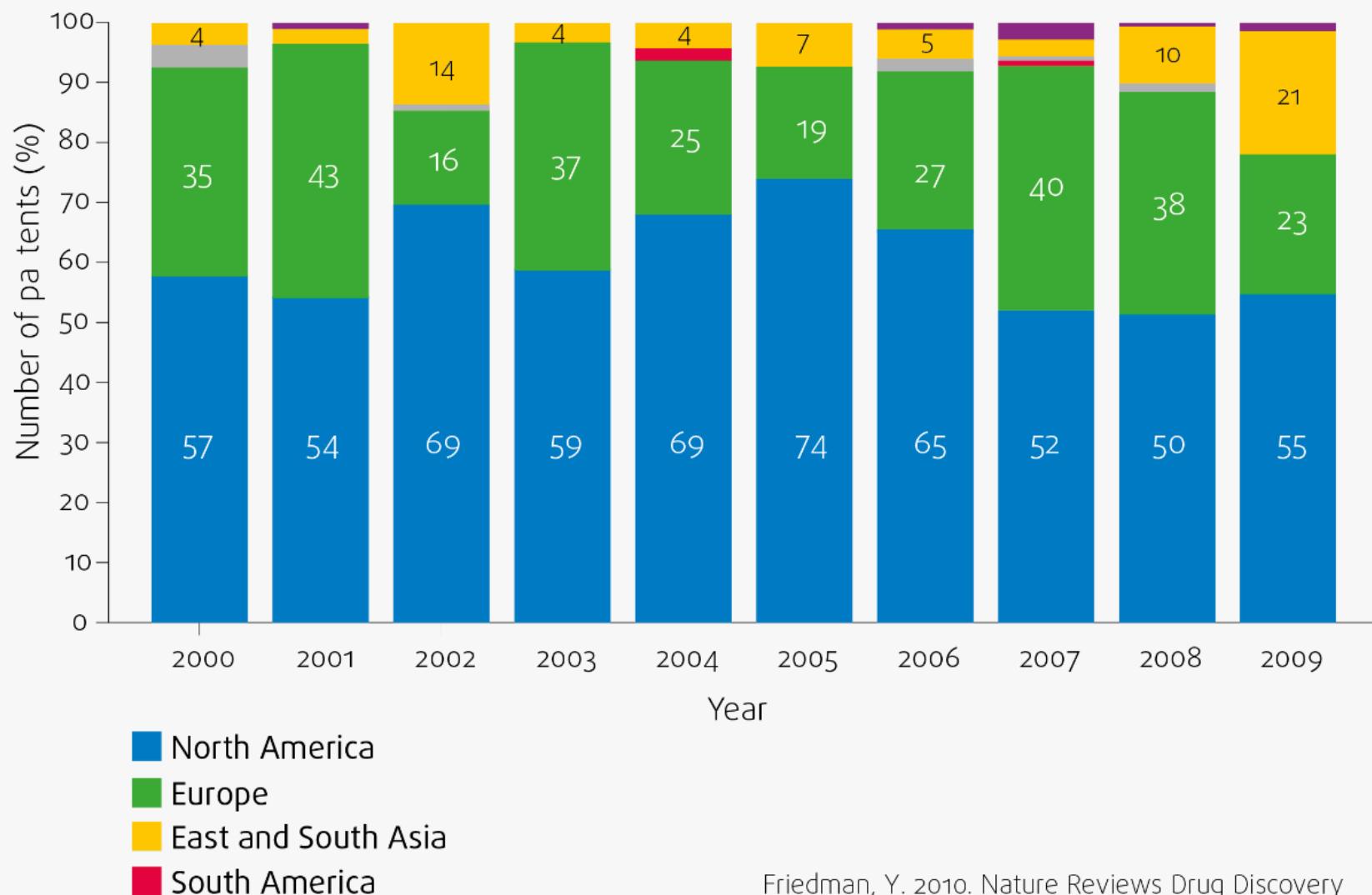
propiedad intelectual

patentes

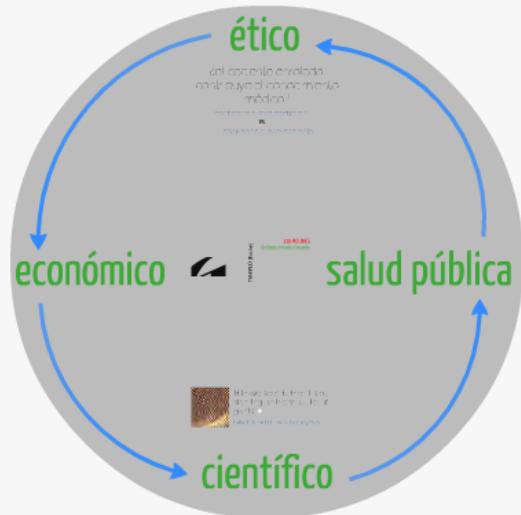
protección
de datos

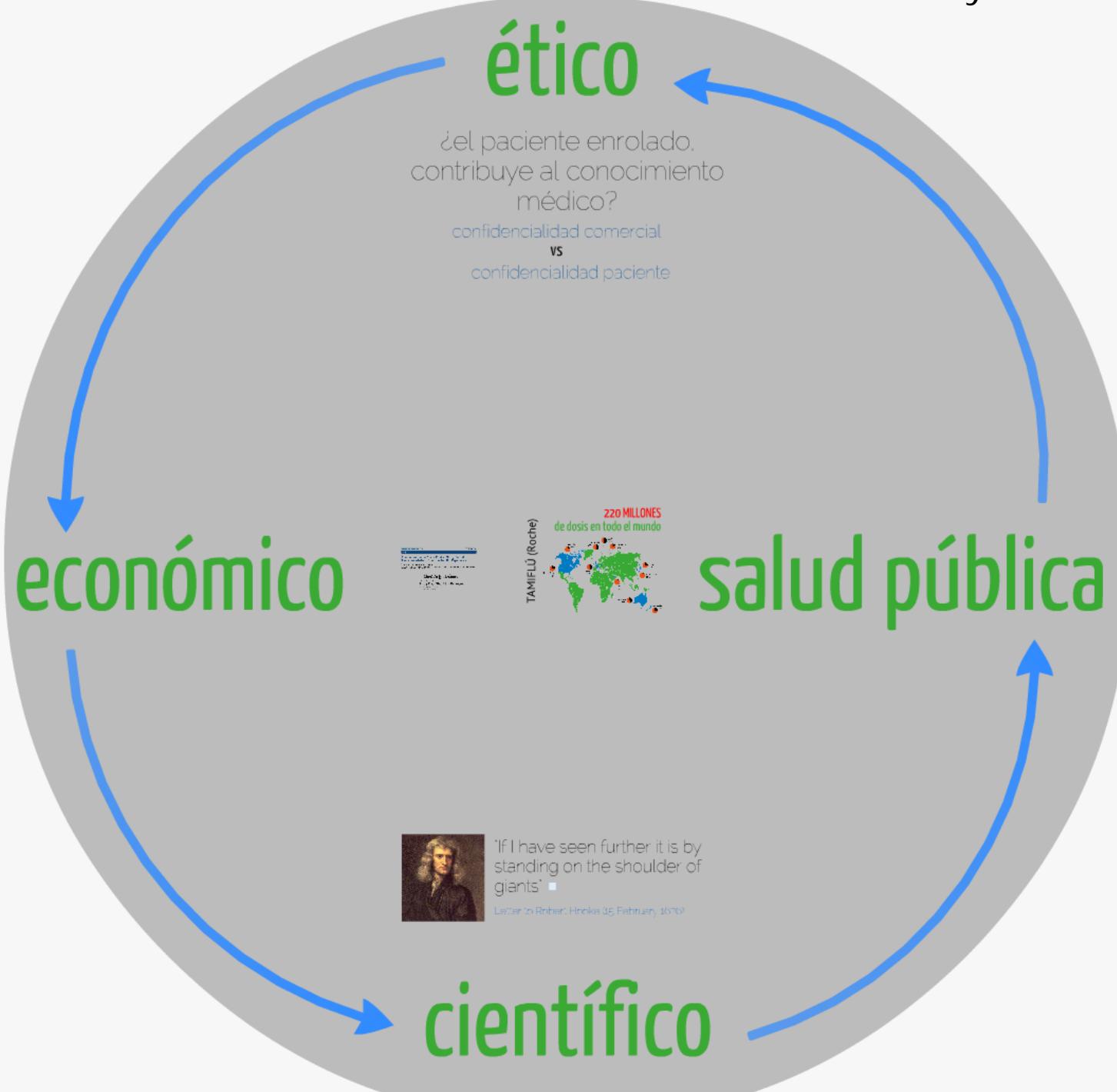


Normalized locations of drug patent inventors by region.



protección de datos





ético

¿el paciente enrolado,
contribuye al conocimiento
médico?

confidencialidad comercial

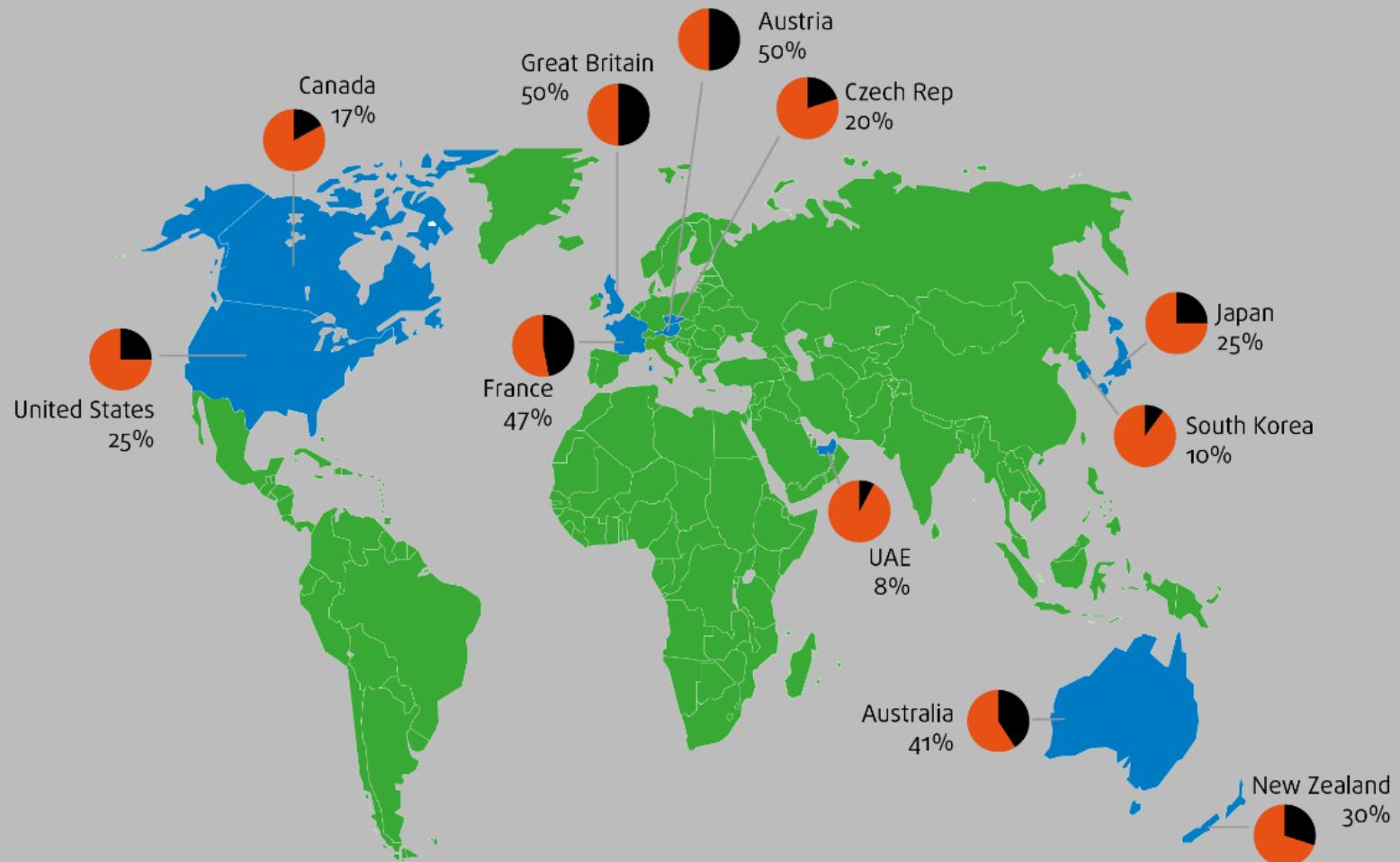
VS

confidencialidad paciente

TAMIFLÚ (Roche)

220 MILLONES

de dosis en todo el mundo



OPEN  ACCESS Freely available online

PLOS MEDICINE

Policy Forum

The Imperative to Share Clinical Study Reports: Recommendations from the Tamiflu Experience

Peter Doshi ^{1*}, Tom Jefferson ², Chris Del Mar ³

¹ Johns Hopkins University School of Medicine, Baltimore, Maryland, United States of America, ² The Cochrane Collaboration, Roma, Italy, ³ Centre for Research in Evidence-Based Practice, Bond University, Gold Coast, Australia

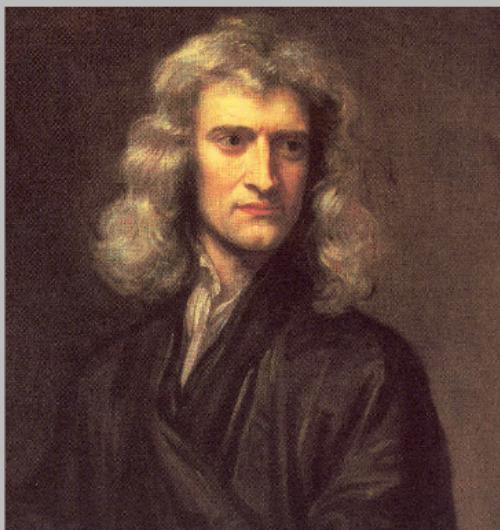
The New York Times

OP-ED CONTRIBUTORS

Drug Data Shouldn't Be Secret

By PETER DOSHI and TOM JEFFERSON

Published: April 10, 2012

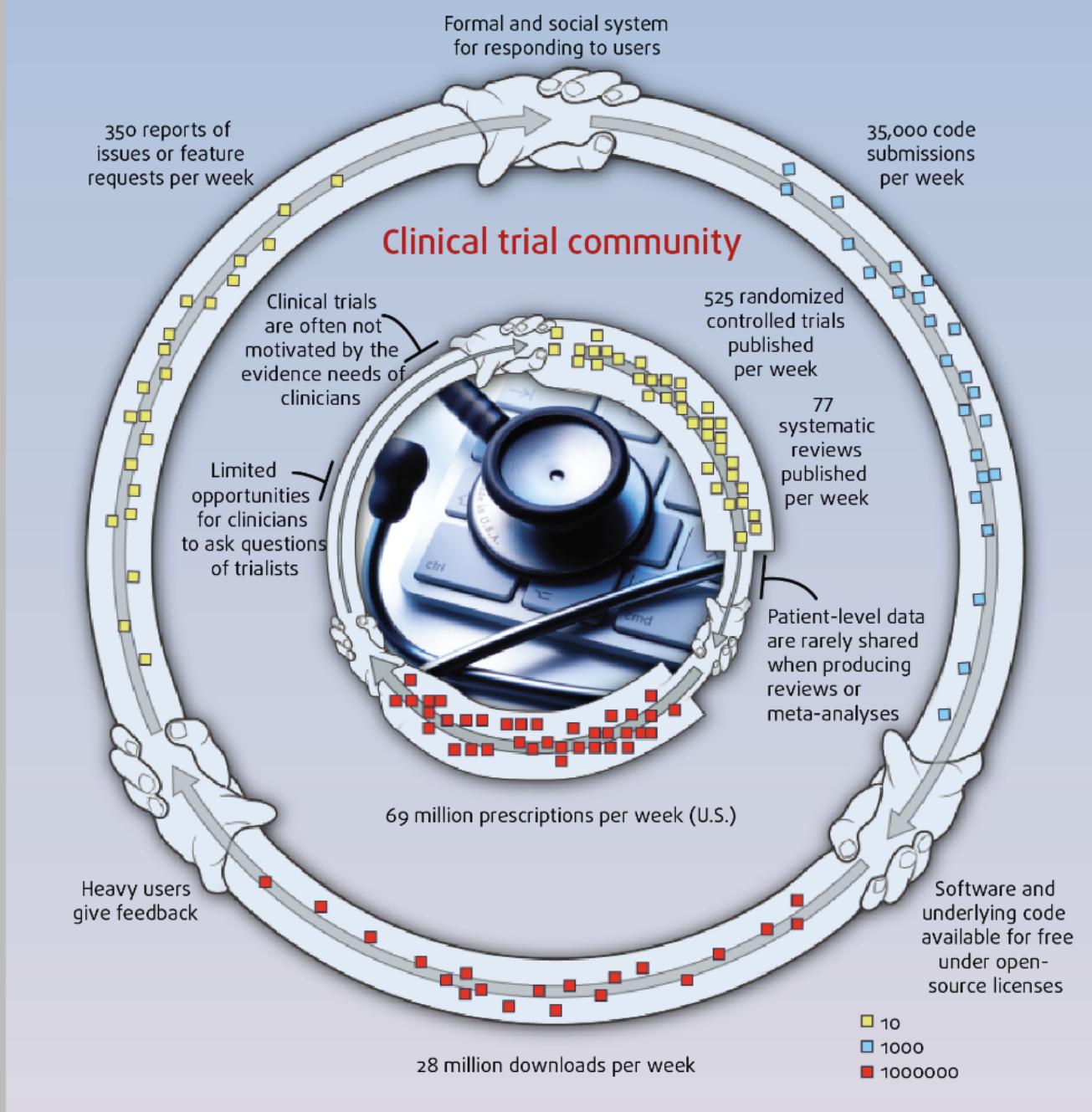


"If I have seen further it is by standing on the shoulder of giants" ■

Letter to Robert Hooke (15 February 1676)

científico

Open-source software community



PROPIEDAD INTELECTUAL

monopolio

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INVENCIÓN

2012

1994

TRIPS

Globalización

TPP

2002

DOHA

Flexibilización

PROPIEDAD INTELECTUAL

monopolio

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