

# Diaceutics

## Bridging the Gap



## DGi - The Diaceutics Google Index

We are pleased to bring you "The Diaceutics Google Index" or DGi for the first quarter of 2009.

\* \* \* \* \*

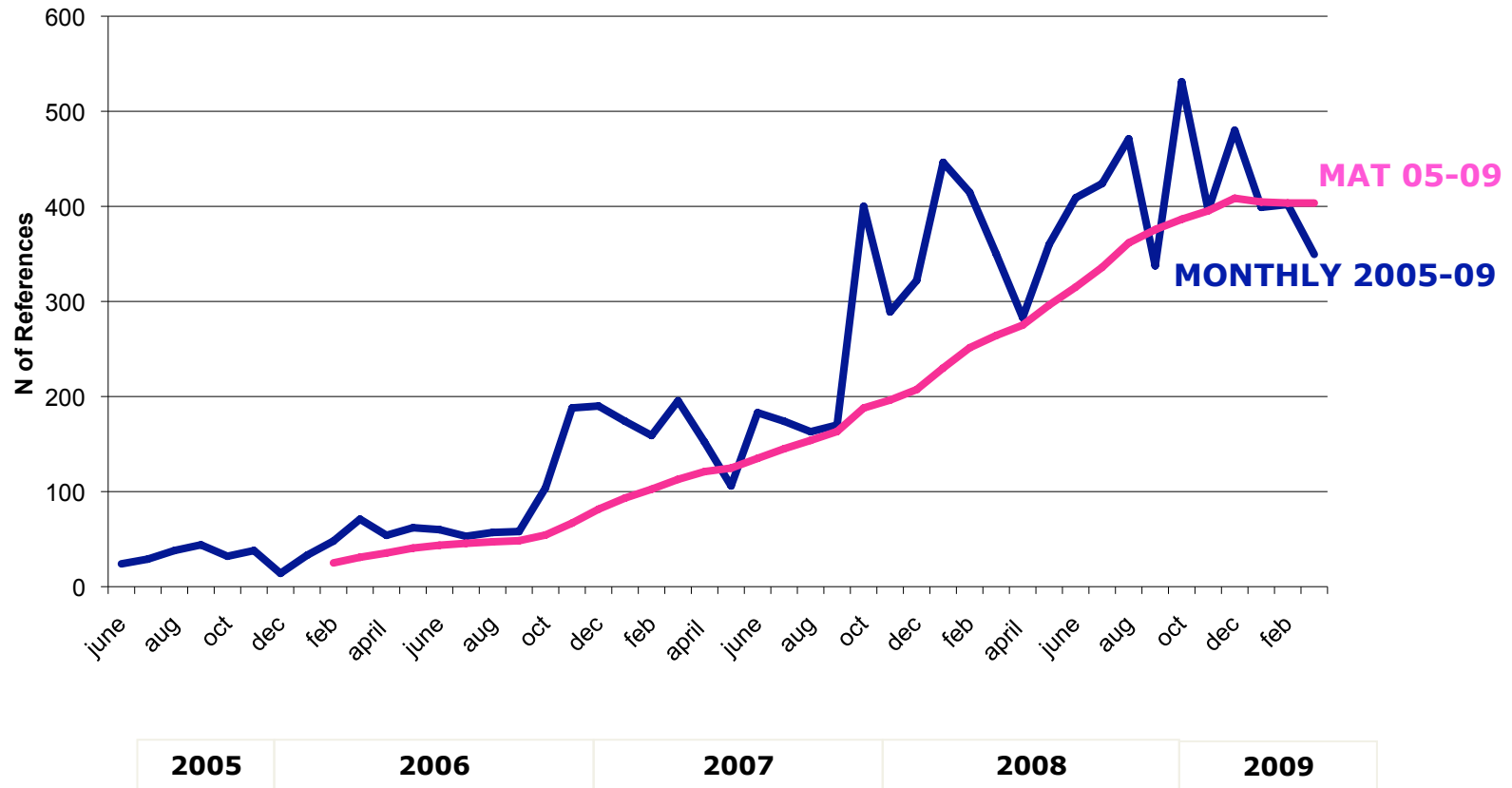
With Personalized Medicine still at an embryonic stage and analysts forecasting 'the death of this and the birth of that' it is sometimes hard to see where the debate is going amidst all the noise. Much as The Economist publishes its yearly "Big Mac Index" to give a populist barometer of currency movement, Diaceutics has similarly decided to apply this simple buzz approach to the noise of Personalized Medicine.

To create our index, we maintain a daily database of the number of times the phrase "Personalized Medicine" is picked up by Google, eliminate any repetition and analyze the content quarterly based on a number of factors to identify patterns and see what catches our eye.

**Peter Keeling and the Diaceutics Team**

# DGi: Buzz Volume (since PM time began . . .)

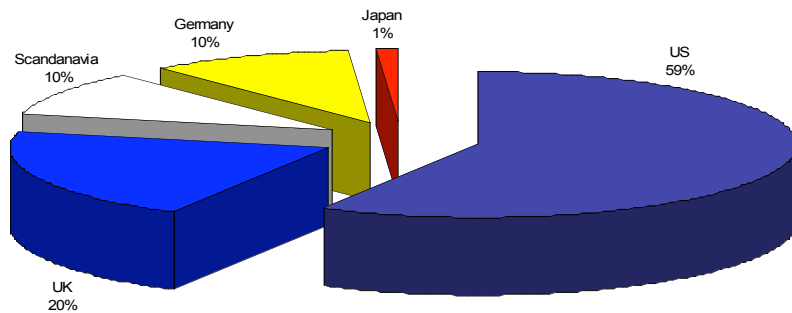
DGi "personalized medicine" references  
2005-2009



PM activity sensitive to recession!

## DGi: Country Mix, Then and Now

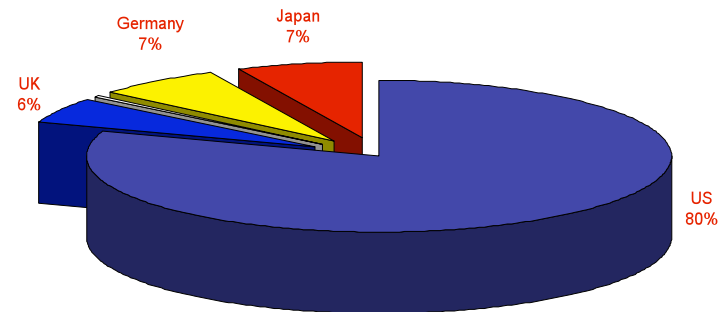
DGi "personalized medicine" references - 2006



*US is dominant,  
with a definite UK  
presence, and  
Japan barely  
appears on the  
scene . . .*

**A lot has happened since 2006....**

DGi "personalized medicine" references - 2009



Japan significantly increased it's presence since 2006, while the UK and Scandinavia have nearly disappeared from the PM map. The 2009 picture is likely more reflective of the true PM news flow. US dominates the scene.

Dgi "personalized medicine"  
Lexicon

Term most utilized alongside  
*Personalized Medicine* in the  
same news release based on  
2000-2009 News Archives

The use of some terms have  
multiplied in past 6 months!

<b>Terminology</b>	<b># Citations</b>
<i>Patient</i>	6770
<i>Genetic</i>	5190
<i>Diagnostic</i>	4510
<i>Risk</i>	4270
<i>Cost</i>	4130
<i>Pharmaceutical</i>	3540
<i>Laboratory</i>	3370
<i>Targeted</i>	3310
<i>Marketing</i>	2470
<i>Molecular Diagnostic</i>	2190
<i>Acquires</i>	1750
<i>Cost Effective</i>	1740
<i>Regulatory</i>	1730
<i>Proprietary</i>	1600
<i>Outcomes</i>	1470
<i>Imaging</i>	1330
<i>Biomarker</i>	1300
<i>Doctor</i>	1290
<i>Patents</i>	1280
<i>PET</i>	392
<i>Convergence</i>	269
<i>Disruptive</i>	160
<i>theranostic</i>	118
<i>Biobank</i>	88
<i>Taxonomy</i>	28



## *catching headlines\**

### **Clinical Validation Study for Oncotype**

Genomic Health, Jan 12, 2009: Genomic Health announced commencement of independent QUASAR clinical validation study for its Oncotype DX colon cancer assay to predict likelihood of recurrence for stage II colon cancer.

<http://www.genomichealth.com/OncotypeDX/Index.aspx?SID=33>

### **Abraxis Spins Off PM Company**

FierceBiotech Jan 20, 2009: Abraxis BioScience is spinning off Abraxis Health, creating a standalone company operating in the PM arena.

[http://www.fiercebiotech.com/press-releases/abraxiss-bioscience-announces-plan-create-abraxiss-health-new-enterprise-focused-biomar?utm\\_medium=nl&utm\\_source=internal&utm\\_id=EMC-NL-FB&dest=FB](http://www.fiercebiotech.com/press-releases/abraxiss-bioscience-announces-plan-create-abraxiss-health-new-enterprise-focused-biomar?utm_medium=nl&utm_source=internal&utm_id=EMC-NL-FB&dest=FB)

### **Decode Genetics in a "tough spot"**

BIO-IT World, April 1, 2009: Despite some signs of improved financial performance for 2008, Decode Genetics "is in a tough spot", admitted founder and CEO Karl Stefansson today. Decode has lead the world in the development and implementation of methods in personalized medicine.

<http://www.bio-itworld.com/news/04/01/01/decode-in-tough-spot-Stefansson.html>

### **Risky Business? BMS Inks PGx Deal with XDx**

Reuters, Jan. 9, 2009: Only a few months after XDx cancelled its initial IPO it has signed a collaborative deal with BMS focused on identifying biomarkers in lupus for development of clinical diagnostics associated with the clinical development of BMS's drug Orencia.®

<http://www.reuters.com/article/pressRelease/idUS115222+09-Jan-2009+BW20090109>  
<http://www.genomeweb.com/node/910044?emc=el&m=292642&l=2&v=a3b88413d8>

### **New Admin; New Run at Healthcare**

AP, Feb 25, 2009: President Barack Obama's first budget will seek \$634 billion over 10 years as a down payment on health care reform. Obama's proposal is meant to start a dialogue with Congress over how to provide coverage for an estimated 48 million uninsured while also slowing health care costs, which amount to \$2.4 trillion a year and keep rising even as the economy is shrinking.

[http://news.yahoo.com/s/ap/20090225/ap\\_on\\_go\\_pr\\_wh/obama\\_budget](http://news.yahoo.com/s/ap/20090225/ap_on_go_pr_wh/obama_budget)

### **Pharmacogenetic-Based Prescribing Slow to Take Hold**

Genomeweb, Feb 16, 2009: Despite mounting evidence that genetics can affect the way some individuals process drugs, identifying genetic variants associated with drug response is just the first step in a long road to implementing the information in the clinic.

<http://www.genomeweb.com/print/911913?page=show>

### **FDA Creates Senior Genomics Advisor to Oversee Genetic Tests**

FDAViewpoint, Feb 2, 2009: The FDA has created a new position, in the Office of FDA's Chief Scientist.

<http://www.fda.gov/oc/viewpoint/>

### **Offensive Run: Will Use of PGx Data Against Competitor Lead to Insights?**

WSJ, Feb 4, 2009: The FDA has approved Lilly's Prasugrel, an anticlotting drug, which will compete against BMS's blockbuster Plavix.

[http://www.fiercebiotech.com/story/prasugrel-vote-will-signal-fdas-risk-benefit-stance/2009-02-02?utm\\_medium=rss&utm\\_source=rss&utm\\_id=OTC-RSS-FB0](http://www.fiercebiotech.com/story/prasugrel-vote-will-signal-fdas-risk-benefit-stance/2009-02-02?utm_medium=rss&utm_source=rss&utm_id=OTC-RSS-FB0)

### **Roche Agrees to Buy Genentech for \$46.8B**

Fox Business, March 12, 2009: After months of pursuit, Swiss drugmaker Roche reached agreement with US-based Genentech to acquire all outstanding shares of the biotech firm.

<http://www.foxbusiness.com/story/markets/economy/roche-agrees-buy-genentech-b/>

### **KS Gov to Head HHS**

AP, Mar 1, 2009: Governor Kathleen Sebelius, the current governor of KS and the state's former insurance commissioner, was chosen by President Obama to be the head of the Department of Health and Human Services after Se.

[http://news.yahoo.com/s/ap/20090301/ap\\_on\\_go\\_ca\\_st\\_pe/sebelius\\_hhs](http://news.yahoo.com/s/ap/20090301/ap_on_go_ca_st_pe/sebelius_hhs)

\* Headlines by Diaceutics



## *speaking frankly*

President Obama has lost no time in making the overhaul of the health care industry a cornerstone of his administration's economic recovery plan, including significant sums in the stimulus package for a variety of health care related activities. These funds are intended to cover a wide variety of issues from healthcare information technology initiatives to reductions in COBRA coverage for laid off workers and creation of a Federal Coordinating Council to look at the use of comparative effectiveness research in the drug approval process.

While these changes represent a positive step in the right direction for the countries ailing health care system, many of these initiatives are likely to result in increased costs to the pharmaceutical and diagnostic stakeholders, apart and aside from current investments in personalized medicine. In the waning days of 2008, we saw an increasing proportion of the pharmaceutical industry raising their flags for control of the personalized medicine space and taking baby steps towards aligning their key therapies with diagnostic platforms. Of greater note, and perhaps somewhat overdue, we are seeing an increasing interest from the diagnostic industry towards personalized medicine. Coupled with Obama's support for PM in general, perhaps this will be the start of a new era for PM?

A key component still missing from the discussion, however, are the "how" and "where" of how to deploy resources to their greatest effect in the targeted therapy arena and how exactly those resources are to be recouped. While the US has consistently made the most "noise" about PM, we actually see an accelerated rollout of such therapies to key European markets, as a partial result of the myriad regulatory bodies applying a more rigorous risk/reward consideration in the approval and pricing process. One cannot help wondering if some of the key learnings from the EU could be utilized to accelerate the adoption of PM in the US among payers, regulatory authorities, physicians, patients and even within the industry itself.

The need for transparency over the financial metrics in PM is now paramount, both for the sake of the teams actively engaged in developing these products as well as for the management and C-level financial executives who need robust metrics to explain and justify the shift in resources deployed.

### **And our own events at Diaceutics.....**

Diaceutics has spoken at and will be speaking at a number of conferences on the need for financial transparency around the financial metrics driving Personalized Medicine, including:

- Bio Europe, Milan, 16-17th March. Roundtable: How Will Personalized Medicine Change the Economics of Healthcare? Read more on [http://www.ebdgroup.com/bes/ws\\_panels.htm#economics](http://www.ebdgroup.com/bes/ws_panels.htm#economics)

- Brighttalk Webcast, 19th March. Webcast on "Designing Return on Investment into Personalized Medicine". See webcast on [www.diaceutics.com](http://www.diaceutics.com)

- NextLevel Pharma, Brussels, 22nd April. Economics and Risks of Personalized Medicine. See

- Arrowhead PM Conference, Baltimore, MD, April 24th. The Need for Financial Transparency in Driving Forward PM. See

**Announcing Convergence Summit II:** Following on the success of our first Convergence Summit, held in Washington, DC in April 2008, Diaceutics is in the process of organizing its next Convergence Summit, anticipated in early 2010.

As always, we seek to explore core enabling topics in a shared forum regarding critical commercial drivers which are "in the room" but opaque. Targeting the need for a greater understanding of and transparency over the investment metrics around PM, Diaceutics Convergence Summit II will address the following question: Does PM Generate Better or Worse Net Present Value ("NPV") and Return on Investment ("ROI") for the Primary Stakeholder Behind its Implementation, the Pharmaceutical Industry, and How Does this Translate to Increased ROI for the Diagnostics Industry?

In the meantime, we hope that you will use the opportunities listed above, at which Diaceutics will be speaking, to follow the evolving debate on this topic and to provide your voice to help us, once again, shape the content of Diaceutics Convergence Summit II.