



## Wikinomics: New Ways of Collaborating for Export Competitiveness

Today, Web-enabled teams numbering in the thousands or even millions are creating encyclopedias, jetliners, computer operating systems, and numerous other items that used to be developed inside conventional firms.

Mass collaboration on the Internet is revolutionizing the corporation, the economy, and virtually every aspect of global trade. Building on the concepts established in *Wikinomics: How Mass Collaboration Changes Everything* (Portfolio 2007), by Don Tapscott and Anthony D. Williams, we explain how exporters from developing countries, government decision-makers, and other key stakeholders, can harness mass collaboration as a force for national export development and competitiveness in the global economy.

**Anthony D. Williams,  
Walter D. Staples and Dan Herman**  
**November 2007**

©2007 New Paradigm Learning Corporation



# TABLE OF CONTENTS

## **1** Introduction

## **2** What Is Wikinomics?

- 3** Mass collaboration revolutionizes one of the world's oldest industries
- 3** Harnessing wikinomics around the world

## **4** Wikinomics for Export-Led Development

- 4** Harnessing collective wisdom to overcome cross-sectoral obstacles to export development
- 6** Building world-class capabilities through 'win-win' partnerships
- 7** Exploiting the supply side of new innovation markets
- 8** Using collaborative training to build trade and export capacity

## **8** Winning on a Global Playing Field

## **10** Endnotes

## INTRODUCTION

Today, thanks largely to the Internet, the kind of creativity and innovation that used to take place primarily within the confines of corporate walls now occurs across large, loosely connected networks of peer firms and individual entrepreneurs. Already, millions of people have joined forces in self-organized collaborations that have produced dynamic innovations in goods and services rivalling those of the world's largest and best-financed enterprises. If masses of ordinary people can peer-produce an operating system (Linux), an encyclopedia (Wikipedia), the media (YouTube/Current TV), a mutual fund, and even a physical thing such as a motorcycle, one should carefully consider what might come next. Arguably, this vast global network of specialized producers who swap and exchange services for entertainment, sustenance, and learning is becoming an economy unto itself.

The lesson for business leaders is clear: the traditional, monolithic multinational confining value creation within its closed, hierarchical organization is dead. Today's winning companies compete by reaching outside their walls to harness knowledge, resources, and capabilities. These firms set a context for innovation and then invite customers, partners, and other interested third parties to co-create products and services *along with them*.

Some critics look at successful open source projects, such as Linux and Wikipedia, and assume that they are an attack on traditional companies' legitimate right—and need—to make a profit. But smart firms are proving otherwise. IBM decided to support, rather than fight, Linux. Today, its Linux-related services and hardware represent billions of dollars in revenue and the company estimates it saves nearly a billion dollars per year over what it would have cost to develop a Linux-like operating system of its own.

As Don Tapscott and Anthony D. Williams pointed out in *Wikinomics: How Mass Collaboration Changes Everything* (Portfolio, January 2007) a new breed of 21st-century enterprise is emerging—one that opens its doors to the world; co-innovates with everyone, especially customers; shares resources that were previously closely guarded; harnesses the power of mass collaboration; and

“We not only need to listen to traders, investors and entrepreneurs, but bring them into the conversation—and at the most senior level... Private sector advice can only strengthen trade policy because its exporters who know their markets, who can identify their priorities, and who pay the price for delays, bottlenecks and red tape.”

—Pascal Lamy, WTO Director General

---

“Once people worked out that by leveraging the talent and experience of their colleagues, they could make more money, the resistance to the idea of collaboration quickly disappeared.”

—J.P. Rangaswami, Former CIO, Dresdner Kleinwort Wasserstein

behaves not as a multinational but as something new: a truly global firm.

Although mass collaboration has enabled corporate leaders in developed economies to capture new efficiencies, markets, and higher profits, the impact of these trends in developing countries has been largely unexplored. This paper seeks to shed light on the applicability of wikinomics to developing countries, with specific reference to the use of mass collaboration to promote export development and competitiveness. In particular, we outline how wikinomics can help public and private sector organizations overcome significant barriers to trade and export development.

Our research provides a four-part framework that can help exporters in developing countries and their respective government leaders to:

- harness collective wisdom to overcome cross-sectoral obstacles to export development
- exploit new opportunities in the global knowledge marketplace
- build world-class capabilities through win-win partnerships
- build trade and export capacity through collaborative training.

**Figure 1: Per Capita GDP Growth by Region and Economic Grouping, 1981-2007 (Per cent)**

	Average Annual Growth			Overall Growth
	1981-1989	1990-2002	2003-2007	1981-2007
World	1.4	1.2	2.3	41.4
Developed Economies	2.5	1.8	2.0	67.5
Economies in Transition	1.9	-4.0	7.3	-25.8
Developing Economies	1.7	3.0	5.0	112.5
of which:				
Africa	-0.5	0.3	3.0	16.4
America	-0.3	1.1	3.5	22.7
West Asia	-1.7	1.1	4.1	16.0
East and South Asia	5.1	5.3	6.3	317.5

Source: UNCTAD secretariat calculations, based on UNCTAD Handbook of Statistics

These recommendations build on a widely accepted premise that export growth lies at the heart of socio-economic development. Although export-led development strategies have catapulted China, India and the Republic of Korea, among others, into focal positions in the global economy, the share of trade held by the least developed countries (LDCs) in the South—particularly those in sub-Saharan Africa—has continued to decline. Aid for Trade and other infrastructural support initiatives play a central role in integrating these countries into the global economy. Nevertheless, as the human toll of endemic poverty rises, nothing less than wholesale collaboration among the trade community's stakeholders is needed to put those living on less than one dollar a day—more than one billion people—on the path to sustainable development.

## WHAT IS WIKINOMICS?

Since 2004, New Paradigm, a Toronto-based think tank, has been researching the determinants of competitive advantage in a global economy. One finding stands out from all the rest: that the resources, capabilities, and knowledge required to innovate and create value are more widely distributed across the world economy than at any previous time in history. Even large global firms can no longer dominate their field or dictate the pace of development in their industries. Nor can they hope to control an end-to-end production process or seek to retain the most talented people inside their boundaries.

Staying globally competitive means monitoring business developments internationally and tapping a much larger global talent pool. Global alliances, human capital marketplaces, and new models of inter-enterprise collaboration will provide access to new markets, ideas, and technologies. People and intellectual assets will need to be managed across cultures, disciplines, and organizational boundaries. Winning companies will need to know the world—including its markets, technologies, and people. Firms that do not will find themselves handicapped, unable to compete in a global business environment that is unrecognizable by today's standards.

Through wikinomics, we counsel firms, they can reach outside their boundaries to harness this latent power. Companies that succeed will harness external

knowledge, talent, and resources far beyond that which they could ever marshal internally. Although the strategy, culture, and technology required to achieve wikinomics may have been pioneered by nimble greenfield technology start-ups, we are convinced that these innovative approaches can be applied equally well to firms in virtually all industries.

### Mass collaboration revolutionizes one of the world's oldest industries

Perhaps the best and most peculiar example of wikinomics comes from a close friend of New Paradigm, Goldcorp CEO Rob McEwen. A few years back, the Toronto-based gold mining company was in trouble. Besieged by strikes, lingering debts, and an exceedingly high cost of production, the company had ceased mining operations at its 50-year-old mine in Red Lake, Ontario.

The company needed a miracle. Frustrated that his internal geologists could not reliably estimate the value and location of the gold on his property, McEwen did something unheard of in his industry: he published his geological data on the Web (400 megabytes of information) and challenged the world to show the company what to do next. The “Goldcorp Challenge” made a total of \$575,000 in prize money available to participants who submitted the best methods and estimates.

More than 1,000 virtual prospectors from 50 countries signed up: graduate students, management consultants, mathematicians, military officers, and a virtual army of geologists.

Sharing the firm’s proprietary data—unheard-of in the gold mining industry—paid off handsomely. The contestants identified 110 targets on the Red Lake property, more than 80 percent of which yielded substantial quantities of gold. In fact, since the challenge was initiated an astounding eight million ounces of gold have been found—worth well over \$3 billion. Not a bad return on a half-million dollar investment.

It also introduced Goldcorp to state-of-the-art technologies and exploration methodologies. This catapulted the under-performing US \$100 million company into a US \$9 billion juggernaut, and

transformed a backward mining site in northern Ontario into one of the most innovative and profitable properties in the industry.

### Harnessing wikinomics around the world

For resource exporters in the South, often highly dependent today on foreign multinationals for technical expertise, such a strategy offers an opportunity to tap a much greater share of the world’s expertise, all at the click of a mouse. More importantly, empowering Southern trade partners with knowledge offers a unique means to level the global playing field.

With the technology readily available and the cost efficiencies increasingly obvious, a growing number of companies and organizations around the world are collaborating to design, develop, market, and distribute competitive products and services globally.

For example, in under ten years ICICI Bank, based in Mumbai, has become India’s second largest retail bank. The bank leads in every retail product market that it targets. Now ICICI is knocking on the doors of global banks’ home markets, with brand-new subsidiaries in Canada and the UK, each growing by over US \$1 million in assets every day. ICICI’s success is due partly to the self-service proposition (customers perform their own transactions in self-serve e-lobbies), and partly to low Indian labor costs. But ICICI’s costs are also low because its innovative technology systems—generally servers running open source software—cost less than one-tenth of the business infrastructure employed by the average Western financial services company.

In China, “innovation cities” are emerging across the country where thousands of intermingling companies leverage technology, low-cost structures, and physical proximity to challenge their worldwide competition. These amorphous business webs target industries from motorcycles to mobile phones with a deft ability to infuse their own innovations into knockoffs of Western products. Not only do they produce them at a fraction of the cost, they often do so without a recognizable company appearing on the radar screen of established competitors.

So while major multinationals such as Procter & Gamble, Boeing, and IBM are blazing the path with

new collaborative business models, there is also a strong case for developing country exporters to follow the lead of Indian and Chinese businesses by harnessing collaboration and new technologies to leapfrog competitors. Wikinomics offers Southern exporters an unparalleled opportunity to capture knowledge, techniques, new partners, and new market opportunities from around the world. Although it is true that the ability to compete globally is constrained by infrastructural and capacity-based deficiencies, we believe that Southern exporters and their partners in government and international organizations can harness new models of collaboration to overcome structural weakness and put in place the requisite political, technical, and financial resources to ease their integration into the global economy. The following sections outline techniques for achieving these goals.

## WIKINOMICS FOR EXPORT-LED DEVELOPMENT

Across the South, despite endemic poverty and underdevelopment, the potential for growth and trade is increasingly giving countries a place on world markets. As ICICI is capturing market share in Canada and the United Kingdom, developed country software outsourcers are increasingly looking to eastern Europe and Russia; BMW and General Motors are turning to South Africa for auto parts; and Gap and Wal-Mart are making deals in Lesotho and Swaziland for apparel supplies. The challenge is to broaden the gains from trade and export to a much greater proportion of the developing world. Organizations governing the global trade environment, such as the World Trade Organization (WTO) have a significant role to play in levelling the playing field, while regional trade agreements allow exporters to experiment “in their own backyard” while giving them the opportunity to “network” through partnerships, alliances, cooperatives and joint ventures, and improve on their knowledge and expertise by participating in trade associations, export seminars and international trade conferences.

It is fair to say, however, that international, regional, and bilateral trade agreements have yet to fulfil their promise of increasing the competitiveness of exporters in the world’s poorest countries—despite the presence of

clauses that grant preferential tariff treatment to developing countries. While several countries (notably China, India, Singapore, South Korea, Thailand and Vietnam) have secured a larger share of global trade, many LDCs have seen their proportion decline precipitously.

Despite such countries’ rich natural resources, manpower, ingenuity, and ethnic and cultural diversity, they can develop into central players in industrial development, eco-tourism, scientific research and global commerce only if they are offered the necessary export development assistance. This, in turn, means redefining how private sector companies operate, and how governments and other key stakeholders support and engage in the export development process.

We have identified several domains in which greater collaboration among stakeholders in the trade and export development community could improve export success in the South.<sup>1</sup> In the remainder of the paper we focus on four priorities:

- The need for open forums where all stakeholders can share knowledge and easily collaborate on export strategies and initiatives
- The role of industry collaboration in enabling exporters to acquire world-class capabilities and efficiencies
- The growing opportunity for knowledge exporters to access global knowledge and product supply chains
- The importance of building local and national export capacity by training a cadre of competent export marketing/trade specialists to work in both the private and public sectors.

### Harnessing collective wisdom to overcome cross-sectoral obstacles to export development

Over the past decade, national and international development organizations have discovered that progress often depends on the ability to achieve broad consensus on the development agenda by engaging citizens and civil society in discussions about the issues that contribute to underdevelopment or maldevelopment.

Similarly, future export growth stands to benefit from an engaged and participatory debate between private sector members and their respective government leaders. Today, cutting-edge online collaborative technologies offer a new and incomparable means of organizing these discussions and collect the valuable knowledge available from these sources.

The process, as we think it should be applied, begins with the *wiki*.<sup>2</sup> Wiki software has increasingly been adopted by corporations attempting to capture the diverse knowledge held by their employees—knowledge that often goes well beyond what might be expected given employees’ strictly defined duties. Frankfurt-based Dresdner Kleinwort Wasserstein (DrKW) has been a leader in this regard. Former CIO J.P. Rangaswami identified his challenge as follows: “Our problem was to find the cleverest way of meeting growing customer demands, a way that satisfies their risk needs, security needs, and regulatory needs.” The solution has, in part, relied on the introduction of wikis and blogs into the workplace as a means of allowing employees—regardless of their position in the Dresdner Kleinwort hierarchy—to provide their input and ideas into the challenges the business is facing. While sharing and openness were far from innate to the organization, Rangaswami notes, “once people worked out that by leveraging the talent and experience of their colleagues, they could make more money, the resistance to the idea of collaboration quickly disappeared.”

We think it is time to apply this concept to the challenges faced by exporters and government decision-makers; time for what we call Tradepedia: a trade focused version of Wikipedia, the world’s largest, peer-produced, online encyclopedia. Like Dresdner Kleinwort’s efforts to capture employee ideas and knowledge, Tradepedia would act as a regional, national, or even international warehouse of trade-related knowledge, including the formal and informal rules and regulations that accompany global trade.

As a starting point, Tradepedia could enable all stakeholders in the export development community to quickly identify cross-sectoral impediments to export development. For a private sector exporter, the barriers to global markets may seem obvious: lack of infrastructure; absence of credit facilities; no insurance schemes for exporters; customs irregularities, etc. For government trade ministers, the barriers may include



**TRADEPEDIA**

insufficient influence at the trade negotiations in Geneva, irregular contact with private sector advisory groups, and an inability to challenge global trade frameworks. Uniting these stakeholders in a shared forum would enable everyone to better appreciate each other’s challenges and more importantly, Tradepedia could become a platform for discussing solutions and quickly mobilizing collective resources and action plans. Moreover, innovations and lessons learned could be easily shared across countries and regions for the benefit of the whole community.

---

“Our problem was to find the cleverest way of meeting growing customer demands, a way that satisfies their risk needs, security needs, and regulatory needs.”

---

Crucial to its realization is the establishment of an open community where knowledge is accepted, vetted, and recorded, whether sponsored by an international organization such as the United Nations Conference on Trade and Development (UNCTAD), the United Nations Industrial Development Organization (UNIDO), the World Trade Organization (WTO), or a host government or group of exporters within a specified region. Access to this resource should remain as open and democratic as possible—restricting it to government ministers would miss the point. The best way in which to construct a comprehensive knowledge base is to involve a diverse set of private sector employees and managers, academics, and government officials from within the targeted region and beyond.



## Exploiting the supply side of new innovation markets

Conventional wisdom says that a firm should find the people with the right combination of expertise and experience to solve its problems, hire them, and retain them by way of money or perks.

But today a growing marketplace for ideas, innovations, and uniquely qualified minds is changing the long-standing rules of innovation and talent management. Companies seeking solutions to seemingly insoluble problems can use the Internet to tap the insights of hundreds of thousands of enterprising scientists without having to employ everyone full-time. This shift is rippling through corporate America, inspired by the example of InnoCentive and changing the way companies invent and develop products and services, including something as mundane as toothpaste.

Colgate-Palmolive was recently seeking a more efficient method for getting its toothpaste into the tube—a seemingly straightforward problem. When its internal army of research and development (R&D) professionals found no answer, the company posted the specifications on InnoCentive—one of many new marketplaces that link problems with problem solvers. A Canadian engineer, Ed Melcarek, proposed putting a positive charge on the fluoride powder, then grounding the tube.

It was an effective application of elementary physics but not one that Colgate-Palmolive's chemists had ever contemplated. Melcarek was paid US \$25,000 for a few hours work.

As of now, some 120,000 scientists from 175 countries have registered with InnoCentive and hundreds of companies pay annual fees of roughly US \$80,000 to tap the talents of a global, scientific community. It is an example of what we call an “ideagora.” Launched as an e-business venture by US pharmaceutical giant Eli Lilly in 2001, InnoCentive now provides on-demand solutions to innovation-hungry titans such as Boeing, Dow, DuPont, P&G, and Novartis.

**Figure 3: Summary of Ideagoras—Sources for New Ideas and Providers of Knowledge-Based Opportunities**

Ideagora Type	Focus	Applicability	Type of Problem	Notable Examples
Innovation Intermediaries	Facilitates external innovation	R&D	Articulated innovation issues	InnoCentive, YourEncore, NineSigma
Freelance Networks	Provides on-demand access to professionals	Marketing, finance, legal, business, IT, development, R&D	Project-based need for professional services	E lance, Guru, Portfolios, TopCoder
Q&A Forums	Manages professional or general advice	IT, legal, other	One-off questions	Free Advice, Experts Exchange, Yahoo! Answers, About.com, AllExperts
Industry Expert Networks	Provides on-demand access to industry experts	Finance, business development, marketing, sales, R&D, strategy	Need for in-depth industry insights	GLG, Vista Research, Primary Insight, Coleman Research
IP Markets	Buying and selling of patents and other IP	R&D, product development, legal	Need for particular patent or technology	Yet2.com, Pharamlicensing, New Idea Trade
Inventor Networks	Management of innovation process	R&D, product development	Need for new products	Market Launderers, Big Idea Group, Patentdata

Innovation marketplaces such as InnoCentive provide an exciting new avenue for export development—namely the supply of scientific, technical, and business know-how. The key for developing countries is to export their information and expertise in a way that encourages knowledge workers to stay at home, thereby avoiding the debilitating effects of ‘brain drain.’ InnoCentive may provide a partial answer. Indeed, one can envision opportunities for individuals and organizations to build viable contract research businesses that use networks such as InnoCentive as a funnel for business development. The return on investment (ROI) includes increased foreign exchange earnings, better linkages with corporate networks and retained intellectual capacity.

### Using collaborative training to build trade and export capacity

As noted earlier, developing countries have acute needs for capacity-building to support trade and export development. Whether it is training related to trade regulations, quality standards such as an ISO norm, sanitary and phytosanitary (SPS) regulations, or rules pertaining to the WTO dispute resolution procedures, the effort must be made to increase the capacity of domestic trade officials and their associated trade support networks to ensure that developing countries can adequately and efficiently exploit the opportunities and preferences made available to them.

Herein is a significant area of application for the wikinomics principles of openness and collaboration. Traditional training sources, such as the WTO and the World Bank Institute (WBI), do offer tailored programmes for trade officials and government ministries. But increasingly, academic and non-academic organizations are offering their training and education modules without charge. For example, the Canadian government funds a comprehensive college level training programme, Forum for International Trade Training (FITT) for new exporters. Available in both English and French, completion of the eight-module programme entitles graduates to a diploma as a Certified International Trade Professional (CITP). Similarly, the Massachusetts Institute of Technology (MIT) OpenCourseWare Program offers 1,800 courses in several languages, online and free of charge. To date, the least developed countries have been the slowest to

respond to these opportunities, principally because the resources and support systems required for access simply don’t exist locally. Only one per cent of MIT OpenCourseWare users are from sub-Saharan Africa, and only five per cent are based in Latin America.

The challenge is to build and deliver the technology infrastructure and training programmes that will enable exporters in developing countries to take advantage of world-class centres of knowledge and expertise. While global technology initiatives such as the US \$100 laptop may help bring skills and access to future generations, Aid for Trade funding and public-private partnerships could help support the large-scale investments in infrastructure—including power supply and broadband Internet access—that are required to broaden access to the benefits of digital technologies. Aid for Trade funding could also be utilized to establish training and development centres that leverage leading edge academic curricula to address trade and export issues.

Figure 4: A Screenshot from MIT OpenCourseWare’s Web Site



Source: [ocw.mit.edu/OcwWeb/web/home/home.index.htm](http://ocw.mit.edu/OcwWeb/web/home/home.index.htm)

## WINNING ON A GLOBAL PLAYING FIELD

During the past 20 years of globalization, we have seen Chinese and Indian economic liberalization, the collapse of the Soviet Union, and the first stage of a worldwide information technology revolution. Properly managed, the next 20 years of globalization will help sustain world economic growth, raise world living

standards, and substantially strengthen global interdependence. At the same time, it will profoundly alter the status quo virtually everywhere—generating enormous economic, cultural, and political upheaval. Individuals and small companies anywhere in the world can now challenge the multinationals, thus reversing the power structure that has dominated international trade for many years. The key to success in a turbulent environment is collaboration across borders, cultures, companies, and disciplines. Countries that focus narrowly on “national goals” or turn inward will fail in the new era. Likewise, firms that fail to diversify their activities geographically and develop robust global innovation webs will find themselves unable to compete in the global economy.

Small and medium-sized exporters, in particular, are beginning to see the upside of a more open global economy. Unlike larger firms, they are not excessively encumbered by large workforces, substantial investments in physical plants or organizational rigidity. Now, with a truly global business infrastructure at hand, they can practically buy “off the shelf” any function they need to run a company. Everything from market research and back office support to contract manufacturing is close to hand, if not close in distance. Most, if not all of it, can be managed on the Web. Suddenly, small business entrepreneurs can exploit world-class capabilities and powerhouse business models that will make them genuine contenders on the global stage.

Evidently, exporters seeking to apply these strategies will need to overcome various financial and infrastructural constraints. For example, there is growing recognition within the export development community that fast, reliable Internet access is a prerequisite for any exporter seeking to compete in the global economy. Unfortunately for many countries, reliable phone service, let alone Internet access, is still a luxury. While the requisite communications infrastructure will not arrive overnight, Aid for Trade initiatives could provide the impetus, and funding, needed to address large-scale infrastructural financing needs. At the same time, governments and international organizations should pool their resources with global technology leaders to forge public-private partnerships focused on developing technologies that can lower the cost of providing Internet access in developing countries.

Insufficient access to finance and credit also figure prominently in the long list of obstacles that developing country exporters face. Recent innovations in micro-finance, however, may offer a partial solution. At the firm level, for example, the Grameen Bank model of micro-finance has been extended to online lending networks such as Kiva.org and globalgiving.org, both of which link developing country entrepreneurs with sources of funding. In some cases, access to external expertise may be “paid for” with equity and other in-kind benefits. So while Goldcorp offered over \$500,000 in prize money to its network of virtual prospectors, companies without cash on hand could offer potential collaborators a percentage share of future profits as an incentive.

Finally, there is a need to educate exporters about the benefits of fostering industry-wide collaborations. Using the Chinese motorcycle industry as a template, export development champions should encourage local exporters to work collectively on ways to drive economic efficiencies, innovation and export growth. Working through industry associations is one option. But the most powerful way to increase export competitiveness is to achieve the scale economies required to compete for market share in affluent countries. This, in turn, means making collaboration on product development, manufacturing, marketing and distribution a routine part of the way that developing country exporters do business.

Despite the massive challenges, there is considerable cause for optimism. The brainpower behind the next generation of products and services will be more numerous, diverse, and distributed than at any time in history. Tomorrow’s global marketplace will provide an abundance of opportunity and a plethora of choice and variety. The greatest growth engines of the 21st century will be business webs that fuse the resources and competencies of the developed and developing worlds into unbeatable combinations. As it turns out, in the global economy, no individual—and certainly no company or nation—is an island. Moreover, today’s business rule for competitiveness—collaborate or perish—is a *global* one.

## ENDNOTES

---

<sup>1</sup> A comprehensive export strategy also includes the need to attract large foreign buyers and foreign direct investment, build trade-related physical infrastructure, and develop effective trade support institutions (including export financing institutions, industry associations, professional trade associations, and national standards associations).

<sup>2</sup> Hawaiian for “quick,” *wiki* is applied to many forms of collaborative software used on the Internet and intranets where users can contribute texts for Web pages and often edit each other’s contributions.

## ABOUT THE AUTHORS



**ANTHONY D. WILLIAMS**

Anthony D. Williams is the coauthor with Don Tapscott of *Wikinomics: How Mass Collaboration Changes Everything* (Portfolio 2007) and is vice president, Government 2.0 at New Paradigm. He holds a master's degree in research and political science from the London School of Economics and is a doctoral candidate in the Department of Government.



**WALTER D. STAPLES**

Walter D. Staples is a professor of international business in Canada. Before teaching, Walter was a career diplomat in Canada's foreign service specializing in economic and industrial development through trade, tourism, technology transfer, and direct investment. He holds a master's in business administration and a doctorate in behavioural psychology.



**DAN HERMAN**

Dan Herman is a senior analyst at New Paradigm where he has authored a wide range of white papers and case studies on corporate strategy, innovation, and collaboration. Dan holds a degree in business administration from Wilfrid Laurier University and a master's degree in development studies in trade and development from the London School of Economics.



WHITE PAPER

This report is an analysis of a Big Idea, presented as part of New Paradigm's Government 2.0: Wikinomics, Government and Democracy Program. The program, sponsored by leading government agencies such as yours, identifies and analyzes emerging opportunities to harness new models of collaboration to transform the public sector.

Don Tapscott: Chief Executive

Joan Bigham: Executive Vice President, Strategy and Business Development

Anthony Williams: Vice President, Government 2.0

Brian Gillooly: Vice President, Member Services

© 2007 New Paradigm Learning Corporation. Reproduction by any means or disclosure to parties who are not employees of Government 2.0 member organizations or wholly-owned subsidiaries is prohibited.

The Government 2.0 research program membership includes unlimited free access to a secure web site where the research team project plans and research publications are posted for member review and feedback. Please visit [www.newparadigm.com](http://www.newparadigm.com) for information or contact Joan Bigham at [jrbigham@newparadigm.com](mailto:jrbigham@newparadigm.com) or at (860) 536-6693.



[www.newparadigm.com](http://www.newparadigm.com)