\$3.95

Vol. 24, No. 3 • MARCH 2012

CONTENTS

- 7 Survey of Banks Shows a Sharp Cut in Lending in Europe
- 8 Germany's Leader Apologizes for Police Handling of Neo-Nazi Killings
- 9 Biographical Memoirs: Theodore W. Schultz
- 11 One Breath Away from Diagnosing Disease
- 12 Given Obama's Go-Ahead, Democrats Rush to Recruit "Super PAC" Donors
- 13 Brain Test Shown to Boost Memory
- 14 Europe's Failed Course
- 15 Plan Seeks to Tailor Cancer Care
- 16 How Not to Revive an Economy
- 17 Mail Box
- 18 Mortgage Relief Plan Aims at Refinancing
- 19 Storehouses for Solar Energy Can Step In When the Sun Goes Down
- 20 Promises, promises, but where will the money come from?

Publications Mail Agreement No. 41796016

The Way Greeks Live Now

By Russell Shorto, The New York Times Magazine, February 19, 2012

In a little brick-walled taverna in Athens, over a lunch of Cretan salad and stuffed grape leaves, a Greek journalist named Aris Hadjigeorgiou was holding forth one day in late November about the calamitous state of his city and country as only a veteran metropolitan reporter could. He explicated the insidious ways in which the upper echelons of Greek media were intertwined with the political structure, which prevented reporting of financial mismanagement and also clouded any hope for resolving the crisis. And he noted little things, like the leaflets on car windshields advertising moving companies: literal signs of the way the economic crisis was affecting Athens, as people angled for escape routes, either abroad or to the countryside. And how the mayor's office was at that moment considering a quaint but cockeyed approach for the season's Christmas lighting scheme: stringing lights around the city's hundreds of shuttered storefronts.

At some point, I asked Hadjigeorgiou how the crisis was affecting him personally. Life was getting difficult, he acknowledged. Then, prodded a bit more, he mentioned that he had not been paid by his newspaper, the major left-leaning daily, in four months. Nor had any of his colleagues at the paper. Yet despite the lack of paychecks, few if any employees had left the paper (which has since filed for bankruptcy), for the good reason that there was nowhere else to go.

Which pretty much sums up Greece. Everyone talks incessantly about the economy – about Merkel and Sarkozy and the EU, about the tightly knit elite that has run Greece for so long, and about their neighbors' troubles and their own – but somehow everyday life rumbles on, in a collective trance, shot through with gallows humor.

By many indicators, Greece is devolving into something unprecedented in modern Western experience. A quarter of all Greek companies have gone out of business since 2009, and half of all small businesses in the country say they are unable to meet payroll. The suicide rate increased by 40 percent in the first half of 2011. A barter economy has sprung up, as people try to work around a broken financial system. Nearly half the population under 25 is unemployed. Last September, organizers of a governmentsponsored seminar on emigrating to Australia, an event that drew 42 people a year earlier, were overwhelmed when 12,000 people signed up. Greek bankers told me that people had taken about one-third of their money out of their accounts; many, it seems, were keeping what savings they had under their beds or buried in their backyards. One banker, part of whose job these days is persuading people to keep their money in the bank, said to me, "Who would trust a Greek bank?"

The situation at the macro level is, if anything, even more transformational. The Chinese have largely taken over Piraeus, *Continued on page 2*

COMER Email Update

COMER is updating its confidential email contact list to better inform members and Economic Reform subscribers of relevant, late-breaking news and local events.

Interested parties are encouraged to send a message immediately to "COMER Email Update" cnic@on.aibn.com from their preferred email account. As ever, all preferences will be respected.



FOUNDING EDITOR John Hotson 1930–1996

PUBLISHER-EDITOR

William Krehm (comerpub@rogers.com)

INFORMATION SECRETARY Herb Wiseman (herbwise@cogeco.ca)

WEBMASTER

Tony Koch

Economic Reform (ER)

(ISSN 1187–080X) is published monthly by COMER Publications 27 Sherbourne Street North, Suite 1 Toronto, Ontario M4W 2T3 Canada Tel: 416-924-3964, Fax: 416-466-5827 Email: comerpub@rogers.com Website: www.comer.org

COMER Membership: Annual dues (includes *ER* on request plus 1 book or video of your choice): CDN\$50

Economic Reform Subscription only:

One year, 12 monthly issues, in Canada CDN\$30, Foreign CDN\$40

Send request and payment to:

COMER Publications 27 Sherbourne Street North, Suite 1 Toronto, ON M4W 2T3

ER Back Issues: CDN/US\$4, includes postage; additional copies same issue, \$2; additional issue same order, \$3. Send requests for back issues to Herb Wiseman, 69 Village Crescent, Peterborough ON K9J 0A9.

Copyright © 2012 COMER Publications All rights reserved

Permission to reproduce is granted if accompanied by: "Copyright © 2012 COMER Publications. Reproduced by permission of COMER Publications"

Postmaster, please send address corrections to: COMER Publications 27 Sherbourne Street North, Suite 1 Toronto, Ontario M4W 2T3

PRINTING AND DISTRIBUTION Watt Solutions Inc., London

Printed in Canada on recycled paper.

Greece's main port, with an eye to make it a conduit for shipping goods into Europe. Qatar is looking to invest \$5 billion in various projects in Greece, including tourism infrastructure. Other, relatively flush Europeans are trying to make "Greece the Florida of Europe," Theodore Pelagidis, a Greek economist at the University of Piraeus, told me, referring in particular to plans to turn islands into expensive retirement homes for wealthy people from other parts of the continent. Whether or not the country pays its debts, he went on, other nations and foreign companies "now understand the Greek government is powerless, so in the future they will take over viable assets and run parts of the country by themselves."

For months, Greece has sat at the epicenter of an economic crisis that is threatening the foundations of Europe and that has the potential to bring new waves of economic upset to America. The latest austerity plan meant to satisfy Greece's creditors and allow for new infusions of financial aid may have averted involuntary default - and a global economic downturn - but will nonetheless make life for ordinary Greeks even more difficult. The plan reduces the minimum wage by more than 20 percent, mandates thousands of layoffs and reduces some pensions, probably ensuring that strikes and demonstrations will continue to be a feature of the Greek landscape.

Yet spending time in Greece presents a complicated picture of what is going on. There is certainly anger and belt-tightening and dark clouds of depression. It's not uncommon to see decently dressed Greeks discreetly rummaging through garbage bins for food. A new book about how the country survived the Nazi occupation – "Starvation Recipes" – has become a surprise hit. But there are also success stories that fly fully in the face of the turmoil. Most surprising, there is a pervasive sense of relief over the crisis that is upon them, as if a long, strange dream is at last over.

My first impression of Petros Vafiadis was of a bear. He's a big, jowly man, and he sat hunkered by the grille of his living-room fireplace. People in his town in northern Greece – Giannitsa – told me that the rising price of heating oil forced residents to rely on their fireplaces, and for the first time in memory, you regularly smell wood smoke in the chilly air.

Vafiadis is 56 and has spent his life in construction. For the last 10 years, he has been a site supervisor for a company called

Archi-Tek, overseeing the building of big, mostly government-sponsored projects like schools and museums. At its height, the company had 50 people on staff and employed about 900 contract workers. Today it has two employees: engineers who are basically putting finishing touches on completed projects. All work in the Thessaly region, where the company is based, has dried up. Vafiadis was laid off in September, two years short of retirement. He took a drag on his cigarette and said, in a mud-thick smoker's voice, "There's no brightening in the future." He was referring to both the Greek situation and his own. "I think things will only get worse."

His wife, Ekaterina, set a homemade cheese-and-leek pie on the table, then took a seat. The room had peach-colored walls and a white-tiled floor; one wall was covered with religious icons; a glass swan sat like a sentinel on top of the Sony flat-screen TV. "There are families worse off than us," Ekaterina reminded her husband. "There are lots of families where nobody is working." She still had her job – as a cook at a kindergarten cafeteria - though her salary was cut from \$1,730 a month to \$1,260. The couple's income has dropped from \$43,000 a year to about half that, and it will drop another \$530 a month once Vafiadis's 12 months of unemployment benefits run out.

They have no savings, they told me, because when they bought their home in 2000, they used their life savings as a down payment. Plus they have two sons in their early 20s, both of whom they put through college. One son, Traianos, who studied electrical engineering, sat with us as we talked, and when the subject of fallback financial reserves came up, there was a sudden flurry of back-and-forth banter in Greek, tinged with tension and dark laughter. Eventually Traianos explained to me that his father's sister died some years ago and left her savings to her two nephews: Traianos and his brother. "So now our children can start giving to us, for a change," Petros Vafiadis said with a laugh. To which his son replied, with an edgy chuckle, "If things get harder, then we'll give."

The austerity measures imposed by the government as it tries to appease distant bankers and governments have caused hardships for ordinary people (to save money, residents of Giannitsa have taken to driving across the border into Bulgaria for everything from dentist visits to gas), but when I met with him some months before the February austerity agreement, Vafiadis said: "Still I think this is the only way out of the crisis. The government has to impose cuts in salaries and pensions."

Anastasia Tsangarli, a family friend who showed up to take part in our discussion, agreed that cuts were necessary, saying, "The Greek way of life is to spend and then overspend." She and her husband are also from Giannitsa but lived for a long time in Jersey City, where she worked in a factory making fake fur coats. When the factory closed, they moved back, only to find life far more difficult than it used to be. Her husband, an electrician, is out of work. She does some baby-sitting. "We are afraid of the future, so we don't spend anything without having a good reason," she said. But the couple have an escape plan. They became American citizens while living in the United States. Her husband is 60. When he is 62, they can return so he can claim Social Security benefits.

As the economy implodes, young people are leaving Giannitsa. Traianos Vafiadis, who is 24, told me that of the group of six friends he has had since childhood, he is the only one with a job, and the others have all emigrated or are looking for work abroad. I heard over and over from young Greeks that they are painfully aware of repeating the cycle that most recently occurred in the late 1940s, when a great diaspora of young Greeks left the country for work. The crucial difference is that now well-educated young people future doctors, teachers and engineers - are leaving, suggesting that what is taking place is the hollowing-out not only of an economy but also of a whole social system.

The loss of young people worsens another problem facing this country: the birthrate is among the lowest in the world - and was even before the crisis manifested itself making it unable to maintain population levels. This fact is much on the minds of ordinary Greeks. "And now it's even worse," Petros Vafiadis said. "Young couples aren't having children because of the crisis." He paused, then added, with a comic's timing, "Maybe I'll get a second wife and work on this demographic problem." His wife gave out a high-pitched cackle, then shot back: "If he's serious, someone should save the women of Greece." As the laughter died down, I asked Petros the question that seemed most pressing. What was his plan? What, given the sorry state of affairs, was he going to do?

Things went quiet. The bearish man executed an elaborate movement of his upper body that, when it was over, I decided you would have to call a shrug. It was painful to watch. Earlier, when I talked to his son alone, he summarized his father's situation: he was in his late 50s, spoke only Greek and knew only the kind of work he had done – work that won't be coming back anytime soon. The shoulder twist was the only possible answer.

"Watch it! Watch out!" Paul Evmorfidis was driving up to a toll plaza on the main road from Athens to Thebes. He slowed down as he came to the toll arm blocking the road, but he was not paying the toll and, to my alarm, was not stopping. "I'm showing you something," he said. He reached out his window, shoved the toll arm up out of the way and drove off as an alarm shrieked behind us. "This is what we do here - everybody who lives around here." As the Greek government adds new taxes and surcharges onto its citizens, they respond with protest or evasion. After the government announced that there would be an additional 2010 income tax - in effect, retaxing that year's income - people refused to pay, whereupon the government tacked a new property tax onto electricity bills, which you could elude only at the cost of having the power cut. Likewise, the toll plaza was installed to raise money. The toll was about \$3. "The problem is if you live around here, you have to go down this road maybe five times a day," Evmorfidis said. "Crazy! What kind of planning is that? So we protest."

Evmorfidis could pay the toll painlessly. He and his brother are owners of a company called Coco-Mat, which specializes in allnatural bedding and furniture ("Sleep on nature," the ads say). Coco-Mat supplies hotels around Europe with high-end mattresses, filled with layers of natural rubber, coco fiber and seaweed, and has 70 stores in 11 countries. Since last year, the company's affiliate in China has been opening shops at the rate of one per month. A Coco-Mat outlet inside the ABC Furniture building in Lower Manhattan opened in 2010, and the brothers plan to open 10 stores in the United States in the next two years. Global sales for 2011 were \$70 million, 15 percent higher than the year before. Coco-Mat stores exude an airy, casual-chic vibe that seems the diametrical opposite of "economic crisis." There is generally a kitchen area and a long sleek picnic table. If it's around lunchtime, there might be a big bowl of Greek salad on the table. Customers are offered a glass of freshly squeezed orange juice or an espresso.

Coco-Mat is a Greek company, one that

defies the crisis in the country both in its efforts (of the 30 Coco-Mat stores in Greece, five opened in the past year, in the very teeth of the crisis) and in its formula for success. If Petros Vafiadis and his family represent a common situation in Greece today - people who toiled diligently in the old system, only to find that its collapse necessitates their own - Paul Evmorfidis is atypical but also revealing of another path, one not generally taken but apparently not entirely overgrown. As we drove through a landscape of silvery-green olive trees set against gray-white hills, I wanted to know how this very successful Greek businessman thought Greece had fallen to such a state.

"This is a country with 300 days of sunshine per year," he began, proceeding into a rambling, fast-paced discourse, the central point of which was that in buying into the euro, Greece tried foolishly to mimic other countries and in so doing shifted away from its natural advantages and way of life. "Working in offices is good in countries where there is lots of rain," he said. "Greeks don't need to be in offices. Athens has doubled in size in a couple of decades - it's now half the population of the country! Two-hour traffic jams, man! After we joined the euro, the mentality totally changed. Suddenly it was like if you still live in the small village where you were born, you must be retarded. So Greeks left their islands and their villages and moved to the city, and they became maniacs. They started expecting loans and handouts."

The modern Greek mentality, according to Evmorfidis, is a hyped-up version of the debt-ridden American consumerism of recent memory. "Greek people would take out a loan to buy a luxury car so they could say, 'I have money,'" he said. "Crazy! I would run into someone I used to know, and suddenly he's talking to me about the stock exchange. I say: 'Come on, man! What do you know about the stock exchange? Let's talk about apples and olives!'"

Evmorfidis is a high-energy man (a few weeks later he and his son executed a winter crossing of the Alps on bicycles), and as the speedometer hit 90 miles an hour, my foot was involuntarily pushing the nonexistent brake on the passenger's side. "But you know what?" he added. "This crisis is exactly what we need. Merkel and Sarkozy are good for our health. I hope they don't give us a penny!"

The standard short answer to how Greece got into its financial mess is that it borrowed too much and spent unwisely. Beneath this, people like to look for a cultural root. Most popular (outside Greece) is the north-south explanation, which holds that Northern Europeans are efficient and hardworking, and Southerners, while they may have better food and better sex lives, like to relax too much to run an efficient economy. But numbers don't necessarily bear this out. Even the guy selling you souvlaki in Athens can quote statistics from the Organization for Economic Cooperation and Development showing that the average Greek worked 2,116 hours in 2008, while the average German worked 1,426 hours. Traveling around the Greek countryside provides lots of anecdotal support to the notion that people do in fact work, and work hard.

Still, there's some value in looking at geography. Greece is part of Europe - you might say the heart of Europe (the euro symbol itself was designed after the Greek letter epsilon: a nod to the classical roots of modern Europe) - but in another sense, Greece is a remnant of the Ottoman Empire, that realm famous for top-down rule, bribery and looking the other way. Everyone I talked to seemed to feel that this interconnected triad of features is indeed elemental and thus part of the reason for the crisis. People on the left and people on the right agree that its bureaucracy is a menace. Fakelaki (literally "little envelopes") are a legendary feature of society. If you're starting a business, there are lots of signatures you need, and handing over the cash-stuffed envelopes has traditionally been part of the process.

Then, too, the intense international focus on the country's problems may be obscuring the fact that since it became part of the eurozone, Greece has actually made significant steps toward integrating with Europe. Mike Evmorfidis, Paul Evmorfidis's brother and co-owner of Coco-Mat, made this point to me. "When we started 20 years ago, it took six months to get through the bureaucracy," he said. "And fakelaki were a part of that. But that has changed. Among the younger generation now, I would say that it does not exist at all, the business of the little envelopes. Young Greeks are really a part of Europe."

The Evmorfidis brothers' story gives some perspective on the changes in Greece in the past 50 years or so. They were born in a small town near Sparta. In the 1950s, their father left home as part of the migration of Greeks who went abroad seeking work. He found a job in Stuttgart, Germany, working on the American military base, and was able to visit his family only once a year. Paul, who is 53, acted as surrogate father to his younger brother. Both did well in school, and both went on to do graduate studies in a way that reflected the country's dawning awareness of its place within Europe. Paul studied business in Athens and earned a master's degree in Germany, and Mike earned a PhD in law at the Sorbonne in Paris.

Then, in 1989, while Paul was working in a jewelry shop in Plaka – Athens's tourist zone – a Dutch businessman asked if he knew of a Greek company that made mattresses. The Dutchman owned a bed shop and wanted to find a cheaper source. Paul took him to a Greek mattress company but saw at once that its quality was low. Whereupon he had an idea: do it right and ride what was then a growing wave of interest in all-natural products. The company emphasizes its use of Greek materials: wool from Thrace, cotton from Larissa, wood from Mount Athos, seaweed from Sparta.

Sparta, land of legendary warriors famed for their austerity and discipline, figures heavily in Paul Evmorfidis's thinking. When I asked if there was one element of Coco-Mat's strategy that he would like to see other Greek companies emulate, he said: "Spartan thinking, man! We've got to get lean and smart. All of these state subsidies that Greeks got, they make you fat and lazy." I tried to point out the apparent contradiction of a company that sells ultracomfy beds insisting that Spartan thinking is its underlying philosophy, but he seemed not to notice. His brother echoed him in saying that a basic part of their strategy involved a determination to avoid bank loans: "We have grown step by step. We didn't want to invest more than we had gained. Our gains were not transformed into yachts or villas but were put back into the business."

As for the future of the country, the Evmorfidis brothers profess a strange-sounding hopefulness, and their recent store openings in Greece would seem to indicate that it's not just talk. "I'm naturally optimistic," Mike said. "This is a cycle; things will come back. Plus it's smart business to expand now. There are always opportunities in crisis."

Those opportunities come at a cost to someone. Before the crisis, he said, the owner of a space in central Athens that they had their eyes on wanted \$20,000 a month in rent; when they opened a store there in December, it was for a monthly rent of \$7,000. Likewise, where Coco-Mat used to pay \$1,700 per cubic meter of Greek oak, the price has dropped to \$640. Coco-Mat's furniture has also gone down in price inside Greece, Mike said, though not by as much. He told me that last year the company's domestic sales were down 15 percent, a figure that he was quite upbeat about ("Not catastrophical!") given the overall state of the economy. And when you consider that a Coco-Mat bed costs anywhere from \$3,300 to \$16,600, the fact that Greeks are still buying them gives some corrective to the image of an entire country in a state of free fall.

Then again, you could also look at this as evidence of a lingering state of denial. Or the sales of deluxe beds could be a sign of a two-tiered society that the economist Theodore Pelagidis sees developing in his country. "You are going to see a part of the population, the middle class, comprising say 30 to 50 percent, involved in some kind of resurgence," he told me. "But another part of the population will be living on 300 or 400 euros (\$400 to \$500) a month. This part of Greek society won't be living a Western European lifestyle. It will be more like Bulgaria." Mike Evmorfidis admitted that where Coco-Mat's Greek customers used to be a cross section of the economic spectrum, now it's mostly the rich who buy his beds.

To the north of the Gulf of Corinth, Mount Helicon slopes down into a broad valley that, in classical times, was the location of a sanctuary devoted to the worship of the nine muses. I stepped out of a car into the cold wind sweeping up the valley and began hiking through an area crosshatched with vineyards. With me was a 27-year-old man named Stelios Zacharias, who talked about soil and slope and summer sun and the varietal finickiness of grapes.

When Zacharias and his brothers were children, their father, Athanasios, grew grapes here and sold the juice to neighbors, but he talked of starting a proper winery. Stelios studied business, and his older brother, Nicos, studied winemaking. Today they and their father run Muses Estate, which produced 200,000 bottles last year: merlot, cabernet sauvignon, chardonnay, as well as a Greek variety called mouhtaro.

We sampled each of these once we reached the winery, while a burning log snapped on the hearth and Ioanna Zacharias, Stelios's mother, laid out platters of food. The Zacharias family's business straddles the line between corporate-cosmopolitan and Greek-traditional. Stelios has pursued a strategy that involves combating the bad reputation of Greek wine not by producing something chic but by stressing value: the wines are soundly made and no bottle costs more than \$30 retail. The strategy is working, and with curious timing. Over the very years in which the economic crisis has arisen and engulfed the country, the little winery has taken off. The wines are distributed in four countries, including the United States, and deals are in place with eight more. Stelios Zacharias told me sales have doubled in each of the last five years – and 80 percent of sales are still within their economically crippled home country.

At the same time, the business remains steadfast to its village - the place where Stelios and his brother grew up, went to school and played soccer in the field down the street from the winery. In the fall, cousins and villagers participate in the grape harvest. A neighbor, who raises chickens, strolls across the road every couple of days with a dozen eggs, which he trades for a bottle of the house white. Stelios took me to the local olive-oil cooperative, something that many Greek villages still maintain, where his parents bring olives from their own trees. It was a simple husk of a building housing a noisy press. The processing is free; the co-op keeps 2 percent of the oil, which it sells in order to stay in business. The little gleaming green, black and brown olives filled up a large metal tray waiting to be mashed. A stout man with a vast gray mustache turned the spigot and gave me a taste of the end result.

Zacharias says the troubles have rallied like-minded Greek businesspeople. "The crisis gives us the opportunity to clean the market of everyone who was trying to make something out of nothing. Then we can focus on what works: creating a real product, using real methods."

A lot of people seem to be coming around to Zacharias's way of thinking. According to the Greek farmers' union, between 2008 and 2010 - even before the crisis reached its height - 38,000 people lost or gave up their jobs, as their dream of euro-capitalism died, and returned to the land, often to their home villages on the islands. Former accountants and Web designers are growing potatoes on Naxos, collecting resin from mastic trees on Chios and tending wheat fields on Crete. On the cloud-rimmed top of Mount Othrys, in the region of Magnesia, Ioannis Tsokaras, who a year ago quit the civil-service job in Athens from which he had endured one too many pay cuts, showed me what he is now, at 58, staking his hopes on: little yellow-green clumps of an herb called sideritis, or "mountain tea." He was intent on turning what had been a

sideline – cultivating wild herbs on land his family owned – into a living. His storage space, perched halfway down the mountain, was crammed with large, aromatic, light-asair boxes of his product, awaiting shipment to markets in Athens. "This is a real business now," he declared.

Such individual stories are signs of hope in a country that is searching for a viable future. Yet no matter how many families find their way back to the land, what ultimately happens to Greece depends more on what happens in the wider world.

One of the grandest piles of ancient stones in a country full of glorious ruins lies on the island of Crete. It is called Knossos, and it was to Greece what Greece is to Europe: the cradle of its civilization. At the core of its prehistory is the legend of King Minos, who ruled over the Greek islands. Minos maintained his hegemony over Greece by requiring that Athens, the second power in the Aegean world, send him tribute in the form of young men and women, whom Minos fed to the beast he kept in his labyrinth: the Minotaur.

Improbably enough, a Greek economist named Yanis Varoufakis has been drawing attention in many of the hot spots of global finance lately, offering the Minotaur myth as a metaphor for understanding recent macroeconomic events. As Varoufakis writes in his recent book, *The Global Minotaur*, the world in which we have been living until recently functioned thanks to the voracious consumption of a different kind of beast. After World War II, the US built up the infrastructure of its European allies as well as its former enemies, all of whom became trading partners. The US, with its

The Global Minotaur by Yanis Varoufakis

An excerpt from page 150, "America, the True Origins of the Financial Crisis and the Future of the World Economy."

Credit Default Swaps (CDS)

If Mr. Spock, of *Star Trek* fame, spotted a CDS and had to describe it to Captain Kirk, he would have said, in his usual expressionless way: "They are insurance policies, Captain, but not as we know them." CDSs pay out pre-specified amounts of money if someone else defaults. The difference between a CDS and a simple insurance policy is this: to insure your car against an accident, you must first own it. The CDS "market" allows one to buy an "insurance policy" on someone else's car, so that if, say, your neighbour has an accident, then you collect money! To put it bluntly, a CDS is no more than a bet on some nasty event taking place – mainly someone (a person, a company or a nation) defaulting on a debt. When you buy such a CDS on Jill's debt, you are, to all intents and purposes, betting that Jill will fail to pay it back; that she will default. CDSs became popular with hedge fund managers (and remain so to this day) for reasons closely linked to the trade in CDSs.

Take, for example, a trader who invests in a risky CDO. If our investor undertook (in the good old pre-2008 days) to cover \$10 million of default losses on this CDO tranche, he could have received an upfront payment of \$5 million, plus \$500,000 a year! So long as the defaults did not happen, he would make a huge bundle without investing anything! Not bad for a moment's work – until, that is, the defaults start piling up. To hedge against that eventuality, the trader would buy CDSs, which would pay him money if the mortgages in the CDOs he bought defaulted. Thus the combination of CDSs and CDOs made fortunes for traders at a time when defaults on mortgages were rare and uncorrelated. But when the defaults started happening, the issuers of CDSs were badly burnt: they had to pay impossible amounts of cash to those who had bought them. MBIA's bankruptcy was the entree. The American Insurance Group (AIG) was the main course. It was served up when Lehman Brothers failed in September 2008 – it's mountainous CDOs were mostly insured by AIG (which had issued CDSs against Lehmann's CDOs).

66 66 66

Editor: As a result, the world has become swathed and choked in other people's defaulted debt. When it becomes overdue with no prospect of ever being paid, those who laid out this perverse new economic universe, prosper mightily. The newly restructured economy is left upright on its flattened head. We couldn't recommend more highly this work of Yanis Varoufakis.

great industrial and financial might, became the world's surplus nation: its profits flowed out to its allies in the form of aid and investments. By the early 1970s, however, other countries had robust economies, and the US was a debtor nation. "At that moment, certain very bright men within the American financial hierarchy made a stunning realization," Varoufakis told me. The realization was that it didn't matter if the US was the biggest surplus or biggest debtor nation. What mattered was controlling the world's primary currency, which would allow the United States to continue to recycle the global economic surplus. The idea was not unlike the thinking behind a casino whichever gamblers are winning or losing, the house, which sets the terms and takes its cut, always wins.

So a new system came into being, in which a huge part of the world's capital flows went to service debt originating in the United States. American debt, and the need to feed it, would be the modern Minotaur. The Wall Street financial houses became the handmaidens of the Minotaur. "The massive flow of capital into Wall Street gave it the impetus for financialization," Varoufakis said, referring to the creation of derivatives and other risky financial vehicles. "And so Wall Street created a great deal of private money, with which it flooded the world and created huge bubbles, in the US housing market and elsewhere."

When that system came crashing down in 2008, Varoufakis says, "it was then only a matter of time that the euro would come into crisis." Europe's powerhouse economies – essentially, the northern countries – no longer had a place to sell their goods.

And where, in this grand picture, does Greece fit? Part of the logic of the eurozone involved the strong economies' providing loans to the weaker ones, in order to build up their infrastructure so they could then buy products from the stronger countries – a kind of replay of what the US did vis-à-vis Europe with the Marshall Plan. But while Greece took the loans, it didn't invest wisely, and its own debt kept mounting.

As the weakest link in the eurozone, Greece gives us the clearest picture of what the larger economic downturn portends. And for all the hopefulness of some of the Greeks I met in my travels, others take a dimmer view of their future. Near Thessaloniki – Greece's second-largest city – I visited a family home. Husband, wife and son were present. The woman is one of the top bankers in Greece. She spoke on condition that I not use her name or the name of her bank. When I asked for her views on the future, she said: "Last week, in the town of Larissa, I was sitting at an outdoor cafe, and a clean, well-dressed Greek man of about 60 passed by and politely asked if he could have the biscuit that came with my coffee. What you say about successful companies is good to hear. But the reality is that man who asked for my biscuit. You can't see the crisis results fully yet because people have been living off their savings. Soon the savings will end. I believe that by the end of 2012, you will see a different Greece, a different country, with real poverty."

According to Yanis Varoufakis, the future – for Greece and for much of the rest of the Western world, never mind recent upticks in the US economy – is one of even more upheaval. "The Minotaur died, and that is what held everything together," he said. "Until a new system is invented, we are in for turmoil." As anecdotal evidence of the situation in Greece, he told me that all of his top PhD students at the University of Athens were seeking jobs abroad. Then he added that he, too, would soon be leaving, possibly for a position in the United States.

Like many Greeks I talked to, Stelios Zacharias, the winemaker, insisted that as hard as it is, the crisis takes on a different character when put in local perspective. "For one thing, there isn't a housing crisis," he said. Economists echo this point: you don't see homelessness in Athens the way you do in other hard-hit cities. That is because even as they were pursuing careers in Athens as stockbrokers or investment bankers, people maintained their ties to their villages. Astoundingly, about 80 percent of Greeks own a home. It may be on family land on a distant island, but it is still a home. Zacharias, for example, lives on land that his grandfather bought decades ago with coupons from a newspaper promotion. Many of those who have lost jobs in the city therefore have rural homes to retreat to, though whether there is income once they get there is another matter.

Family and community ties are certainly helping to hold Greece together thus far. When I asked the journalist Aris Hadjigeorgiou, two months after our meeting in the taverna, if he was getting a paycheck yet, he said the newspaper had completely stopped publication. "As a journalist, I don't know if I'll make it," he said. But, he said, he was scraping by with the help of others. And he negotiated a lower rent with his landlady.

So maybe Paul Evmorfidis's argument

has some validity: Greece's traditional infrastructure may not be the ultimate answer to its problems, given the global scale of things, but it may make difficult times less painful. The destination of my car trip with Evmorfidis was Volos, a vigorous port city in Thessaly and conduit for trade with Asia, where he had been asked to speak about the crisis to a group of business leaders. After the talk, as we walked out of the building, he was in the middle of telling me that what will save Greece is its still-vibrant sense of community when we saw a middle-aged woman coming down the steps. It was late, and we hadn't eaten dinner. He asked the woman if she knew where we could get something to eat. "Come to my home, and I'll cook for you," she said. And so we did.

Our Comment

I first knew Athens some 40 years ago when it could boast a single mediocre museum, and not a decent hotel. The current Greek government is not allowed to recognize the source of its seemingly hopeless quandary: the prohibitions under the previous military dictatorship. The damage to the Acropolis by the Turks many centuries ago had still not been cleaned up. Today glamorous museums and parks are not just a monument to the glory that was Greece, but to our human inheritance from Greece - in just about every branch of human achievement that includes astronomy, where the ancient Greek scholars learned you cannot and must not simply turn around propositions - and that consider them still valid as our governments do today. Socrates had written nothing but was put to death for the questions he asked. But Plato his pupil, taught the Greeks of his day that they must not only consider various earthly factors for answers, but the changing position of the moon in our skies. For that will seriously affect what may be reversed in our reasonings and what cannot.

By depriving our modern societies of this crucial Platonic wisdom, we are crippling the very essence of the ancient Greek legacy that we stand badly in need of. For our speculative banks and our very governments are given to doing just that. The speculative banking that it allows reads our society's future in a way that treats human capital as a debt instead of society's most valuable asset.

That, means that our governments are flying blind, and have nothing that might be mistaken for accountancy.

Greece's current plight is precisely the one that afflicts our world as a whole – the

March 2012

refusal of the world's governments to treat human capital - public health, education, the multiple infrastructures that make these possible - as key social investment prepaid many times in advance. Ignoring that ever more complicated network of interdependencies on earth and the skies and replace it with the assumption that has taken over that such simple inversion of relationships is acceptable, sets up a world suited to those who have a monetary interest in burying the economic lessons of ancient Greece and hoisting high a pirate's flag. That not only perverts what ancient Greece once taught the world, but what is crucial today. Mistake human capital for a debt, as our official banking has done, and there is no way of managing our social capital. For that not only distorts our heritage from ancient Greece but leaves us helpless to manage our social capital today. It surrenders this inheritance not once, nor even twice, but endlessly to hopeless depths.

Our governments must recognize the critical importance of human capital – our basic heritage from ancient Greece – and follow the strategy of the British landed aristocracy: never sell outright their land holdings, but merely lease them out for ever climbing rentals.

We pursue the contrary course. For example, if a subway is to be built, our government would see the early suggestions of its course and stations. That would equip it perfectly to option key parcels of land at low prices, and when the course and stations are made public, lease them out to private developers, at rising rentals.

What happens to-day, is quite the opposite. Ignoring the key value of social capital, governments cannot wait to sell off their key highways and bridges for a song, or lease them out long term to foreign firms in Australia and Spain who collect and exploit such leases – international bridges to the United States and at least one key highway north of Toronto.

Summed up, this incredible incompetence of our governments to protect the interests of its citizens could be expressed so: By denying our inheritance from ancient Greece – the very notion of human capital – our governments are condemning our public sector to the role of a helpless toy of speculative banking. The plight of stricken Greece today has its exact equivalent in the surrender the financial firmament to speculative banking throughout the world. The two are but sides of the same flawed coin. *W.K.*

Survey of Banks Shows a Sharp Cut in Lending in Europe

By Jack Ewing, The New York Times, February 2, 2012

Frankfurt – Banks in the euro area cut lending sharply at the end of 2011, according to data published Wednesday, raising concern that Europe was on the verge of a credit crisis that could lead to a deeper recession than expected.

A quarterly survey of commercial banks by the European Central Bank showed a surge in the number of institutions that were becoming more restrictive about who they lent to, because the banks themselves were having trouble raising money and were under pressure from regulators to reduce risk.

The survey, which covered the last three months of 2011, provided more evidence of the harmful effect that the sovereign debt crisis was having on the banking system. It also somewhat validated the European Central Bank policy of providing big emergency loans to euro area banks in an attempt to stave off a full-blown lending drought.

"A credit crunch would tip the euro zone back into a severe recession," Marie Diron, an economist who advises the consulting firm Ernst & Young, said in a statement.

There is also evidence that the problems in Western Europe are spilling over into the developing economies of Eastern Europe.

For example, lending to Poland from outside the country fell by \$12 billion, the Bank for International Settlements in Basel, Switzerland, reported last week. The decline is surprising because Poland's economy continues to grow briskly. It suggests that hardpressed West European banks have started withholding resources from their subsidiaries in Eastern Europe.

"It is obvious that we see a deleveraging, a retrenching process unfolding," Thomas Mirow, the president of the European Bank for Reconstruction and Development, said in an interview last week. He said the figures from the Bank for International Settlements showed "this is not just perception but reality." The reconstruction bank provides credit to support the development of free markets in the former Soviet bloc.

In December, the European Central Bank radically expanded lending to euro area banks, providing 489 billion euros (\$643 billion) at 1 percent interest for three years. Previously, the central bank offered loans for no more than about a year. That infusion of cash has been credited with easing the strain of the sovereign debt crisis.

It will offer another round of three-year loans at the end of this month, a move that analysts expect to further guard against a credit crisis. Still, some warned that the situation remained perilous.

"For the sovereign crisis to truly abate, we need to see that governments are able to deliver austerity, and the economies can still grow in the face of it," Karen Ward, senior global economist at HSBC, wrote in a note to clients. It would be wrong to assume that the central bank lending was "a panacea for the euro zone sovereign crisis," she wrote.

Banks tightened their lending standards for businesses as well as for individuals, according to the central bank. Of the banks surveyed, 35 percent said they were applying stricter criteria to business loans compared with 16 percent in the previous quarter. Banks also became more reluctant to provide mortgage loans. And they said they expected credit to become more scarce in months to come.

Germany was an exception. Lending there remained steady, according to separate data published Wednesday by the Bundesbank, the German central bank.

One reason banks in the euro area are reluctant to lend is that they have their own problems raising money. About half said they were still having trouble getting access to money markets, the central bank said. Funds in the United States and elsewhere that lend large sums to banks remain wary of the health of many euro area institutions because of their holdings of European government bonds.

The data may be seen as partly confirming complaints by banks that regulator pressure is raising the risk of a credit crisis. The European Banking Authority and national regulators are leaning on banks to increase their reserves and reduce risk. One way for banks to do so is to reduce lending.

A fifth of banks surveyed said that the need to raise their capital reserves had forced them to restrict lending. But twice that many banks said the flagging euro area economy was the main reason for tighter credit standards.

Our Comment

As I have so often tried making the really important point, the financial problems of Greece today are not a matter of it having "overspent." I first visited Athens some forty years ago and found a dusty town with a single museum that reminded you of what with you might find in a smaller American town.

The current Greek government is not allowed to recognize the real source of its

seemingly hopeless situation. That is simply "verboten" by the German member of the European Union, which was put together by a rightist French government to conform to Washington's wishes.

The mess left by it's Turkish overlords on the Acropolis temple had still not been cleaned up. Today, however, Athens is a city of glamorous museums and parks. And that is not just the result of extravagant spending but a glorious monument to our common human inheritance from ancient Greece – in just about every branch of cultural achievement. That may be summed by the need for never abandoning the asking of key questions. Socrates was so engrossed in asking such questions that he had no time to write the answers. He was put to death for what was considered his atrocious, unnerving habit, but his disciples beginning with Plato carried forward his heritage. They not only emphasized that we simply must not be

Germany's Leader Apologizes for Police Handling of Neo-Nazi Killings

By Melissa Eddy, The New York Times, February 24, 2012

Berlin – Chancellor Angela Merkel apologized Thursday to the families of 10 people, mostly Turks, slain by a neo-Nazi terrorist cell in a hate-driven killing spree that for years went unsolved by Germany's usually efficient police force. She called the killings "an attack on our country."

The so-called döner murders, named after the kebab sandwich associated with Turkish immigrants, and the authorities' acknowledgment that the investigation was mishandled, have sown fears of a strengthening far-right ideology in Germany. And the bungling has created a bitter mistrust of the German government among the country's estimated 15 million immigrants and their descendants at a time when Germany is seeking to attract skilled foreign workers to fill thousands of jobs in leading industries.

"Most of you were abandoned in your time of need," Mrs. Merkel told the victims' relatives, several of whom were at a memorial in the Konzerthaus concert hall. Eleven tall white candles burned on the stage, one for each victim and another representing hope. "Some relatives were themselves for years suspected of wrongdoing," she said. "That is particularly oppressive. For this, I ask for your forgiveness."

The murders, committed from 2000 to 2007, were of eight Turkish men, one Greek and one German policewoman. The suspects evaded capture as teams of police officers across the nation pursued suspicions of foreign crime circles or family disputes, often suspecting the victims' families of complicity.

A link to two suspects, Uwe Mundlos and Uwe Böhnhardt, emerged by chance in November when the pair killed themselves after the police closed in on them after a bank robbery. Their partner, Beate Zschäpe, set fire to their apartment and turned herself in.

In the charred remains of the home, the police found the weapon – a Ceska 83 pistol – that had been used in each of the killings.

Ms. Zschäpe remains in detention. The federal prosecutor, Harald Range, is seeking to bring her to court this fall on charges of founding a neo-Nazi terrorist cell with Mr. Mundlos and Mr. Böhnhardt. Hundreds of investigators have been sifting through an estimated 5,000 pieces of evidence, some linking the three to two nail bombings in Cologne and a series of bank robberies.

The German government has offered each family compensation of at least 10,000 euros, or about \$13,000, using a fund to pay victims of neo-Nazi attacks.

Ismail Yozgat, whose son, Halit, was killed in 2006, rejected the offer, asking that the street where his son last lived be renamed in his memory and "that the murderers all be caught, that every supporter and helper be brought before a court of law."

At the memorial service, Semiya Simsek remembered her father, Enver Simsek, an ethnic Turk who was the first victim. Although born and raised in Germany, Ms. Simsek, 25, said she planned to move to Turkey in June to start a new life.

"Today I torture myself with the question 'Am I at home in Germany?" Ms. Simsek said. "How can I be sure of this when there are people who don't want me here because my parents are from another country?"

Since the link between the neo-Nazis and the killings has emerged, authorities across the country have been scrambling to examine and explain how the cell and its many ethnically driven crimes could have been overlooked for years. Crisis meetings, information clearinghouses and at least three investigation committees have been formed at the state or national level.

Ekin Deligöz, a member of Parliament for the Greens and a naturalized German, said the flurry of political activity belied an inability to address the persistent strength of the neo-Nazi groups and ideology in Germany. "By concentrating on the procedure and not the heart of the matter, this leads to a downplaying of the real issue, that the far right is as strong as it has ever been," she said.

"We still trust our German neighbors, the pharmacist on the corner or my workman, but the country – the politicians, the government – we don't trust them," she said. "There is a feeling that they speak of a nation under the rule of the law, but then throw up a wall when it is about our rights."

65 65 65

Editor: When you deny the great human heritage of Greece, you are trifling with the deep tradition that has kept humanity humane. Then you get ensnared in contradictions such as contemporary Germany that because of its privileged position assigned to it by Washington in reconstructing the world, has need of skilled immigrants, but the concept of a common human inheritance has been as alien as it is to the masters of the new European economy. It needs the foreign immigrants to fulfill the role assigned to them by Washington, but strictly on its own terms. Hence Nazi and more recent militant nationalist prejudices will prevail and militant national sallies call to mind that of the Hitlerites will surface. Greece needs the economic support of the Greek heritage which is a survival essential for the functioning world society as a whole. Nothing less will do.

content to turn around a proposition so that the question is taken for the answer, but seek out the countless other factors that must be considered not only on the earth but in the changing phases of the moon.

By depriving Greece of its precious

Platonic legacy, the political powers are pick-pocketing our modern societies of this invaluable wisdom – the very essence of what humanity learned from ancient Greece. Moreover, the damage is certainly not confined to Greece. Turning proposi-

tions around and considering the result valid is the very essence of speculative banking – gambling with the clients' interests to the point where the world is deprived of serious accounting. We are, in fact, flying blind.

W.K.

Biographical Memoirs: Theodore W. Schultz

These remarks are adapted from draft material in Dr. Clifton R. Wharton's autobiography, A Lifetime of Firsts: The Personal History of a Black Pioneer. Dr. Wharton is President Emeritus, Michigan State University; former Chancellor, State University of New York; former US Deputy Secretary of State; and former Chairman and CEO, TIAA-CREF.

Theodore W. Schultz was a mentor and inspiration to me at a critical period in my life, and I treasured his friendship ever since.

Originally a South Dakota farm boy, Schultz was raised in a strong Germanic family. He never went to high school, but despite the opposition of his family, he attended South Dakota State College, earning a bachelor's degree and a master's degree in agricultural economics, followed by a PhD from the University of Wisconsin. He was quite tall, with a very long face, large head, and wide forehead, with close-set piercing eyesall creating and intimidating appearance. Yet his wry sense of humor and innate humaneness suffused his demeanor, thereby leaving his overpowering presence. His conduct in the classroom was invariably designed to provoke and stimulate his students.

Schultz first came to national prominence due to a controversy when he was chairman of the Department of Agricultural Economics at Iowa State College (later University). A scientific study by a fellow professor had concluded that the nutritional properties of oleomargarine were no different from, and might be better than, traditional dairy-based butter. Although the study recommended oleomargarine as a way of conserving wartime resources, it provoked a firestorm of controversy within the state's dairy community. Major efforts were made to squelch the report, but Ted Schultz, citing academic freedom and the dangers of censoring research, held firm and refused. He made it very clear that the goal of research was the discovery of truth and that there was no major scientific basis for criticizing the report. Therefore, he had the report published and the dispute escalated. When the college administration proposed withdrawing the article, Schultz spoke out unsuccessfully against the action and resigned in protest. The net outcome was that in 1943 he joined the Department of Economics at the University of Chicago, becoming chairman in 1946, to serve for fifteen years.

In the late 1940s, Schultz published Agriculture in an Unstable Economy (1945), followed by The Economic Organization of Agriculture (1953), which had a major impact in agricultural economics, especially in connection with the longstanding dispute between "agricultural economics" and the "economics of agriculture." At that time, he became increasingly interested in the problems of development in the underdeveloped world, and notably in human capital. His interest in human capital eventually led to such books as The Economic Value of Education (1963) and Investment in Human Capital (1971), which were the basis for his becoming the Nobel laureate in economics in 1979.

My first contact with Professor Schultz was in the spring of 1953. At the time, I was working with a nonprofit organization created by Nelson Rockefeller to provide technical assistance in Latin America.

My five years with the program had convinced me that a PhD in economics should be my next step. James Maddox, an agricultural economist and my immediate boss, suggested several possible schools, including the University of Chicago. He also gave me a copy of the first issue of Bert Hoselitz's new journal, *Economic Development and Cultural Change*, and suggested that I read an article written by Theodore Schultz. A few days later, Maddox called me into his office, where I found a tall, imposing figure. "Cliff," he said, "meet Theodore Schultz!"

I blurted out, "Oh, I just read your article in *Economic Development and Cultural Change*." In my youthful excitement, I added, "I had a hard time understanding it." In typical fashion, Schultz replied, "There are others who feel the same way." Of course, when I learned that Schultz was about to head a Ford Foundationfinanced study of US technical assistance in Latin America, I quickly gave the article much more thorough study. I was thrilled when he offered me a position as a research assistant on the project while I worked on my doctorate.

My Chicago years with Schultz were tremendously formative and life-changing. Like all of us graduate students during those years, I worked harder than I had ever done in my life trying to meet the high standards of the Department of Economics – an awesome phalanx of demanding professors, and an equally awesome cohort of competitive fellow students. However, it was Schultz who gave me major direction and purpose in my studies.

I could reminisce about many aspects of Professor Schultz's outstanding professional contributions to advancing the economics profession. But I would prefer to reflect upon what I experienced personally as a graduate student and during four years as a research assistant on his Ford-National Planning Association project.

Whenever I am asked to describe Theodore Schultz, the word "integrity" immediately leaps to mind. The early 1950s in America were a time of intense domestic conflict and witch-hunts over allegations of Communist infiltration of the US government. The infamous Senator Joseph R. McCarthy and the House Un-American Activities Committee hearings had permeated the country like a viral infection. Security checks and loyalty oaths were widespread. The atmosphere of distrust and fear was at times palpable among those contacted by congressional staffers or the FBI.

On one unforgettable occasion, I was waiting to see Schultz when a man entered the office and insisted upon speaking to him. Schultz asked me to wait, and since he did not close the door, I heard the entire conversation. The visitor told Schultz that he was conducting a security check on one of his former students. After looking over

BookStore

Available from COMER Publications: 27 Sherbourne Street North, Suite 1 Toronto, ON M4W 2T3 comerpub@rogers.com

Price EXcludes postage and handling.

Hazel Henderson

• The United Nations: Policy and Financing Alternatives: Innovative Proposals by Visionary Leaders, Editors Harlan Cleveland, Hazel Henderson, Inge Kaul, \$10

W.F. Hixson

• It's Your Money, \$10

William Krehm

- Towards a Non-Autistic Economy – A Place at the Table for Society, \$10
- Babel's Tower: The Dynamics of Economic Breakdown, \$10
- The Bank of Canada: A Power Unto Itself, \$5
- Democracies and Tyrannies of the Caribbean, second English and third Spanish editions available, \$15
- How to Make Money in a Mismanaged Economy, \$12
- Meltdown: Money, Debt and the Wealth of Nations
 Volume 1, ER, 1988–1998, \$20
 Volume 2, ER, 1999–2001, \$20
 Volume 3, ER, 2002–2003, \$20
 Volume 4, ER, 2004–June 2005, \$20
 Volume 5, ER, July 2005–2006, \$20
- Price in a Mixed Economy Our Record of Disaster, \$15

COMBO OFFERS:

- One volume of *Meltdown* plus either *The Bank of Canada* or *It's Your Money*, \$35
- One volume of *Meltdown* plus Democracies (English or Spanish), Price in a Mixed Economy, Babel's Tower, The Bank of Canada and Towards a Non-Autistic Economy

 A Place at the Table for Society, \$90

the visitor's credentials, Schultz asked, "Do you want my opinion on his character, or professional competence as an economist, or loyalty to the United States?" The visitor said he wanted all of them.

At this point, Schultz said, "Well, I will be glad to provide this information to you on the condition that you keep notes of my comments. Next I will furnish a room and typewriter for you to prepare a written document summarizing my response which you will end with a statement to the effect that I am prepared to testify to my statements in a court of law in the presence of the individual. Then I will sign the document with you as a witness!"

The stunned visitor said he wasn't sure that he could do that. Schultz handed him a telephone and said, "Please call your superior and ask him now." The flustered visitor did, and was told something to this effect: "Oh, Professor Schultz. Skip him and go on to the next person!"

Then there was his marvelous intellectual sense of humor. During the Ford-NPA study team flight to Brazil in 1954, Schultz suddenly asked each team member to guess the current latitude and longitude location of the airplane, and then checked with the pilot. Each time he did it, most of us failed abysmally, but Schultz usually was right. On another occasion, he climbed up into the corn crib on a Brazilian farm, held an ear of corn aloft and said, "Wharton, how many rows on this ear of corn?" I guessed an odd number, producing chuckles from Schultz and the Brazilian farmer. How was I supposed to know the corn kernel rows are always even?

After all, I was a charter member of the "CBCBCRAEA" – the city-born, citybred, city-raised, agricultural economics association – those of us who were not born or reared on a farm and never studied agriculture, yet called ourselves agricultural economists.

Our visit to Brazil provided another insight into the Schultz character. Immediately after our arrival we paid a courtesy call on the new US ambassador, one of those businessmen who had caught the ear of President Eisenhower with the almost ludicrous view that much of US government could not be trusted and that US businessmen would "straighten out" the Washington mess.

The ambassador rudely challenged the purpose of our mission and its auspices. Although the State Department had officially requested his cooperation, he claimed he had never heard of the National Planning Association, and he displayed a strong antipathy to the Ford Foundation. After thoroughly briefing the ambassador on our mission, Ted asked that we be permitted meetings with his key staff. We later were shocked to discover that the ambassador, apparently having become somewhat paranoid over the depth of knowledge on Brazil of our survey team, had ordered the staff to take notes of our conversations and submit our questions to him and their proposed answers for his approval.

Ted became incensed and revealed a level of anger that I had never seen before. He immediately cabled Secretary of State Dulles to complain. He also called a former chairman of the University of Chicago board of trustees, a powerful political figure in Illinois and coincidentally a member of the National Planning Association. The reaction in Brazil was dramatic: the ambassador grudgingly removed the strictures he had imposed. While he never apologized for his actions, we know that Ted Schultz had made his point.

Lastly, Schultz, along with his wife, Ester, genuinely cared about his students and their families. The warmth of the social occasions in their home was just the right tonic for flagging spirits after a hard preliminary exam and any doubts about your future.

While much is said about Schultz's pioneering work in the area of human capital, he had another contribution besides his research and publications. His human capital impact was felt just as strongly, directly, and personally by the hundreds of students whom he taught and mentored. I used to joke that if you wanted to prepare a chronological list of Schultz's students, just read the footnotes in his books and journal articles mentioning their recent dissertations and articles. He promoted and pushed them forward, allowing us to receive greater visibility as we began our professional careers. And he continued to follow up throughout the years, sending us his latest draft or paper or article, and commenting on any of ours that we might send him, energy, and talent in each of us, and then generously and shamelessly publicizing our emergence on the scene. He believed in human capital and he created it personally throughout his life. Each of us who were fortunate enough to have been his students is living evidence of his human capital investment.

Theodore Schultz was a magnificent scholar, a superb teacher, a marvelous friend, but most of all a truly great human being. His life enriched all our lives.

One Breath Away from Diagnosing Disease

By Rick Pilger, The Globe and Mail, February 4, 2012

Breath has been described poetically as the bridge that unites your body to its thoughts. Breath can also provide a window to the body's health.

For at least as far back as the fifth century BC, when Hippocrates recognized the sweet, fruity odour signalling diabetes, the distinctive fishy reek of advanced liver disease and the urine-like smell associated with failing kidneys, physicians have used breath odour as a tool in diagnosing diseases.

In the early 1970s, Linus Pauling was able to demonstrate that exhaled breath contains more than 250 substances, including a multitude of volatile organic compounds. In the past decade or so, increased interest in these compounds as biomarkers of disease has spurred scientific interest in the early detection of disease, including cancer, through breath analysis.

Recent medical science has begun to regard cancer as fundamentally a metabolic disorder. Evidence points to impaired cellular energy metabolism being the defining characteristic of almost all cancers, regardless of whether they originate in tissue or cells, and researchers are looking to find the resulting biomarkers in breath samples.

They are searching in a variety of ways. Much of the work is being done using the traditional combination of gas chromatography and mass spectrometry, but a variety of novel technologies are being developed.

Hosam Haik, an Israeli chemical engineer, is working on a "nano-artificial nose" that uses gold nanoparticles to detect disease biomarkers. Research published in the British Journal of Cancer showed that it could detect cancer and even differentiate between the four most common forms – lung, bowel, breast and prostate cancers.

At the Cleveland Clinic in the US, a transplanted Canadian, Dr. Peter Mazzone, has demonstrated the ability to detect cancer based on the changing colours of an array of reactive chemical indicators embedded in a pigment matrix.

In Canada, Picomole Instruments Ltd. of Moncton, NB, is developing breath analysis technology based on the original design of its founder, Dr. John Cormier. Late last month, Picomole and the Atlantic Cancer Research Institute announced that they would begin clinical trials involving 90 patients to test the ability of Picomole's breath analysis technology to identify lung cancer.

Dr. Cormier, whose background is in atmospheric physics, had his interest in breath analysis piqued a decade ago by a trade magazine article about detecting disease using breath testing. Why, he wondered then, couldn't he get a breath test at his doctor's office? "I dug a little deeper," he recalls, "and found that the existing technologies for breath analysis really weren't cutting it. While they were good enough, they didn't have what it took to be translated into clinical adoption."

While a graduate student at the University of Toronto, Dr. Cormier had invented an air sampling apparatus to monitor air pollution. He became convinced that it could serve as the basis for a breath analysis device compact and simple enough to be used in a doctor's office. In 2005, that conviction prompted him to leave his job at an oil-and-gas technology company in Edmonton to form Picomole, which relocated to Moncton in 2009.

The breath analysis technology developed by Dr. Cormier's team is based on infrared spectroscopy, an analytical technique that takes advantage of the fact that molecules absorb infrared light at specific wavelengths characteristic of their structure. "Ease of use doesn't get any better than with infrared, and the sensitivity and accuracy are second to none," says Dr. Cormier. "You can have a complete turnkey system."

Picomole's technology, called LISA (laser infrared sample analysis), is capable of providing an extremely comprehensive analysis of a breath sample – "an analysis that identifies not only the compounds that make up the sample but is fully quantitative," says Dr. Cormier.

At the Cleveland Clinic, the colourchanging sensors deployed by Dr. Mazzone aren't designed to provide the same sort of comprehensive analysis. They don't identify the substances present in a sample, they simply look for characteristic fingerprints of diseases. "The sensors themselves don't tell us exactly what chemicals are leading to the differences; they simply respond to the mixture of chemicals in the breath," says Dr. Mazzone.

Dr. Mazzone has worked at the Cleveland Clinic since his graduation from the University of Western Ontario medical school. A pulmonary specialist, he was intrigued by work colleagues were doing testing for distinctive substances in the breath of patients with asthma and began investigating the possibility that lung cancer and other diseases also left their signature in the breath.

His early work was done with a colour sensor originally used to detect spoilage in the food industry. "The sensor had coloured dots, originally they were coloured dyes, that were printed on an inert cartridge. Those dyes changed colour based on the chemicals they came into contact with," says Dr. Mazzone.

In two studies using the sensors, Dr. Mazzone has had success. "In our latest study we were able to show that the response could be about 80 to 85 percent accurate in telling us whether the study subject had lung cancer or didn't," he says. He is now conducting a third study using a more advanced sensor that he hopes will improve the accuracy rates. The new sensor uses 130 coloured dots composed of pigments selected to respond to most of the substances expected to be found in exhaled breath.

Strong evidence exists of 30 or 40 major illnesses that can be detected by breath testing. Dr. Cormier says early intervention can significantly improve health-care outcomes. "There's a wealth of information that can inform decision making at an earlier stage of disease," he says. "When you intervene proactively at that stage, the outcomes are much, much better, and at much lower cost to the health-care system."

65 **6**5 **6**5

Editor: The entire process of human scientific and social development can be traced to what was learned largely from observation in the heavens. Thus Plato observed that earthly matters on earth changed drastically (observing) when the earth changed its position in relation to the moon and planets, developed the laws of mathematics and physics. Why then should we assume that we can turn around the laws of mathematics, and hence of physics, taken for granted that they will stay valid? But it is precisely what those in control of such economic matters have not forgotten but have suppressed. And in doing so, they are surrendering the very possibility of human survival on our planet. And note well, nothing resembling human kind has been found elsewhere in our solar system.

Given Obama's Go-Ahead, Democrats Rush to Recruit "Super PAC" Donors

By Nicholas Confessore, The New York Times, February 8, 2012

Leading Democrats have commenced a furious drive to galvanize and expand the network of wealthy liberal donors that has been largely dormant since 2004, hoping to recruit them to Democratic-leaning "super PACs" that President Obama now believes will be critical to winning re-election in November.

Officials at Priorities USA Action, a Democratic super PAC founded by two of Mr. Obama's former aides, scheduled a dozen meetings with potential donors in Los Angeles, New York and other cities on Tuesday, with hopes of tapping new sources of money, including among Silicon Valley executives.

In the coming weeks, the group will form a fund-raising account with two other super PACs working on behalf of Democratic House and Senate candidates, making it easier for donors to contribute broadly to independent efforts supporting the party. And they planned a fresh round of appeals to Obama supporters who have been major donors and bundlers for the president's own fund-raising efforts but who have not donated to independent expenditure groups.

The super PACs received a major boost on Monday when the Obama campaign announced that senior White House advisers and campaign staff would appear at fundraising events for Priorities USA Action, the most forceful blessing yet that Mr. Obama has bestowed on independent expenditure groups and super PACs, which he once described as a "threat to democracy."

Mr. Obama's campaign aides have also begun discussing the matter with donors in more intimate settings. In a previously scheduled meeting with about 40 top Obama donors from the New York City area on Tuesday, Jim Messina, Mr. Obama's campaign manager, said the president and his aides had decided to help Priorities after watching Restore Our Future, a super PAC backing Mitt Romney, bludgeon Mr. Romney's Republican rivals with millions of dollars in attack ads.

The meeting included prominent Democrats from Wall Street, the chief source of Mr. Romney's super PAC money: Hamilton E. James, the president of the private equity firm Blackstone Group; Marc Lasry, the hedge-fund executive; Robert Wolf, the chairman of UBS Group Americas; and Ralph Schlosstein, the president of Evercore Partners.

The leading Democratic super PACs raised just a quarter of the money in 2011 that their Republican counterparts did, sparking fears among Democrats that Mr. Obama and his party's Congressional candidates would be swamped by outside spending. Many of the largest donors so far to the Democratic super PACs are veterans of the Clinton fund-raising machine or Americans Coming Together, an independent expenditure group that raised \$200 million in a failed effort to unseat George W. Bush in 2004.

But Democratic donors and aides said on Tuesday that the campaign's announcement would help clear up any lingering confusion – especially among large donors loyal to Mr. Obama – about whether the president wanted the Democratic super PACs to succeed.

"I would expect it to be a significant boost," said Orin Kramer, one of Mr. Obama's top fund-raisers in New York, who gave \$15,000 to Priorities USA Action in October.

At least some prominent Democratic donors whose names have not yet appeared on Federal Election Commission filings for Democratic super PACs said on Tuesday that they were considering contributions.

"We are looking at all the super PACs at the moment, will surely participate, but haven't decided on the details," wrote Haim Saban, the entertainment executive and one of the party's most generous supporters, in an e-mail.

A Democrat who advises some of the party's top donors said many of them were "relieved and thrilled" that Mr. Obama had changed course.

"This is the strongest signal that the campaign has ever sent," said the person, who was granted anonymity to characterize private discussions. "With the folks who are newer to political giving, the system they grew up knowing is a candidate saying, 'No, I'm not interested in that.""

But Mr. Obama's blessing may not be enough for other major Democratic donors, particularly those who disagree with his positions on Israel, his criticism of Wall Street and private equity firms, or his administration's approach to environmental regulation. Bill Burton, one of the founders of Priorities USA Action, sounded a note of caution about the group's future fund-raising.

"This is a new kind of effort for Democrats, so the capacity for progressive donors around the country is not perfectly clear," he said. "But we're confident that we have the resources we need to be a countervailing force to the right wing."

Mr. Obama's decision also plunges his campaign and administration into uncharted legal and ethical terrain. Under the plan, White House officials will appear at events with donors – some likely to have substantial business interests before the administration – for a super PAC that is legally required to be independent of Mr. Obama's campaign. Mr. Romney appeared at an event last summer for donors to Restore Our Future, and Democratic and Republican lawmakers have appeared at events held by super PACs supporting each party's members of Congress.

Those practices reflect an evolution in campaign law since the Supreme Court's Citizens United decision in 2010. That decision paved the way for political action committees that can pool unlimited contributions from corporations, unions and wealthy individuals. But Federal Election Commission rules still prohibit candidates from soliciting donations from corporations or unions or in amounts greater than \$5,000 per election cycle.

In a conference call with reporters on Tuesday, senior officials with Mr. Obama's campaign said the president had personally authorized the decision to allow White House and campaign aides to appear at super PAC events and that federal law permitted such activity. The officials said Mr. Obama's aides would not solicit money at the events and would communicate with the super PACs only to the extent necessary to facilitate the aides' appearances and speeches, which would be political in nature.

Brett Kappel, an election lawyer, said the Federal Election Commission had effectively blessed such workarounds.

"Welcome to the brave new world of

campaign finance after Citizens United," he said.

The Obama campaign officials also said Obama aides would not appear at any events for the nonprofit groups that are affiliated with each of the Democratic super PACs. Such groups, which exist on the Republican side as well, are more restricted in what they can say about candidates but do not have to report their donors.

Some of the nonprofits have made large contributions to their sister super PACs, effectively allowing donors to give money to both groups while shielding their identity. Mr. Burton said the contributions to Priorities USA Action from its affiliated nonprofit, Priorities USA, totaling about \$215,000, went to cover joint administrative costs. While many liberals and Obama backers cheered the decision announced on Monday, Mr. Obama's shift dismayed some opponents of unlimited money in politics.

John Wonderlich, an official at the Sunlight Foundation, which promotes government transparency, suggested that the decision was why Mr. Obama had made only glancing reference to money in politics in the State of the Union speech last month.

In a blog post, Mr. Wonderlich wrote: "Now we know why disclosure and reform were absent – they've been jettisoned, relegated to an awkward reassuring line in the announcement that the biggest checks are now welcome, despite the president's persistent warnings throughout 2010 that we should make no mistake in remembering how unlimited, often secret donations affect public service."

as as as

Editor: All this should remind us of the decisions of the late Douglas North and other great American reformers, that you cannot change the basic nature of a society, without replacing the group in ultimate charge. I wrote to President Obama well before his election citing only established American authorities like Douglas North. I hardly expected a reply but I had hoped that he might consult the authorities that I mentioned.

Today President Obama is completely dependent on advisors of the old regime.

Brain Test Shown to Boost Memory

By Shirley S. Wang, The Wall Street Journal, February 9, 2012

An electrical brain-stimulation technique used to treat Parkinson's disease and chronic pain appears to enhance human memory as well, according to a tiny but intriguing new study that bolsters hope for one day developing a non-drug treatment for memory problems, including ailments like Alzheimer's disease.

The new study, published in the New England Journal of Medicine, focused on seven patients with severe epilepsy whose memory abilities ranged from normal to severely impaired. They had electrodes implanted through a hole in the skull in order to detect the source of their seizures. This gave researchers the chance to send an undetected burst of current to different brain regions, known as deep-brain stimulation, and observe changes in memory.

The participants completed a task where they pretended to be taxi drivers who needed to drop off passengers at stores on different blocks. Researchers stimulated the brains of participants when they were learning the location of half the stores but not the others. Participants were tested for how well they remembered the location of the stores.

All patients, regardless of how good their memory was, saw improvement in their memory after stimulation in a particular brain region known as the entorhinal area. Stimulating areas just millimeters away showed no benefit.

The entorhinal cortex is an area of the brain that is one of the first to be damaged

by Alzheimer's. Fibers from that region transmit the sensory information to the hippocampus, a brain region critical to learning and memory. The thinking is that the stimulation enhanced learning or the encoding of memories, perhaps by resetting the electric rhythm of brain cells within the hippocampus, according to Itzhak Fried, a study author and professor of neurosurgery at the University of California, Los Angeles, and Tel Aviv University in Israel.

The work is preliminary, and extensive follow-up is needed. But, "the hope would be that this type of approach – deep-brain stimulation – can be used to help people with memory problems," Dr. Fried said.

For the field of Alzheimer's research, the finding "breaks new ground," said Stephen Salloway, an Alzheimer's researcher and professor of neurology at Brown University who wasn't involved in the current study. "It doesn't provide a definitive answer; it opens new doors to exploratory treatments for Alzheimer's," he said.

The majority of treatments in development to treat Alzheimer's and related dementias are drugs that target the protein amyloid, which clumps to form plaques in the brain and is thought to contribute to the disease.

Questions remain about using deepbrain stimulation to treat dementia, including whether it would work for Alzheimer's patients and at what stage of decline, whether it is safe and how long the effect will last, said Dr. Salloway. The Food and Drug Administration has approved deep-brain stimulation to treat Parkinson's and a movement disorder known as dystonia, and it is used to treat chronic pain and severe depression.

The next step is to figure out if stimulation also can help when recalling old memories, because that function can also be impaired with dementia, according to Nanthia Suthana, the first author on the study and a UCLA postdoctoral researcher.

Unlike stimulation for treatment of Parkinson's or other issues, in which the brain is stimulated continuously or repeatedly with an implanted pacemaker-like device, memory in the latest study was improved by a single burst of current when administered in the right location as memories were being formed, according to Dr. Fried.

Recent animal studies have shown that stimulating the entorhinal cortex improved the growth of brain cells in adult mice and appeared to enhance memory for locations and spatial knowledge.

In humans, evidence has been limited. A 2010 study of six Alzheimer's patients who received continuous brain stimulation to a different part of the brain over a 12-month period suggested possible improvements in memory. And in some previous studies where the hippocampus was stimulated, memory was actually disrupted.

The notion that deep-brain stimulation may have benefits for memory was prompted in part by serendipity. In a 2008 case report, a man who was receiving experimental brain stimulation for obesity also showed improvement in his memory, which prompted excitement and calls for future research.

Our Comment

Brain researchers chanced by the purest accident upon possible relationships between one proven effect of exploration within certain parts of the brain and others - for example, their utter surprise when in exploratory experiments to track down the causes of excess weight, and chancing upon unexpected effects on human memory. So we would be breaking the root scientific principle of the never-slackening mobility of scientific curiosity. From this great principle to conduct its researches effectively, it must not free society from ever-critical scrutiny. Were scientists to ignore this, especially if its connection with the intended goal of our investigation, were most seemingly unrelated to our intended researches. Should our scientists deliberately exclude what had been learned even though it had once been recognized? Such suppression has slammed the door not only on the possibility of relearning what had been recognized on the basis of their postwar experiences. That this excluded from their faulty forecast on how long it would be before the Japanese and the Germans could recover from their WWII defeats heightens rather than decreases its strategic importance.

One of the researchers, Theodore Schultz, some 15 years later, declared that he and his colleagues had come up with the wrong answer since they had ignored the traits of the human brain once recognized, and then deliberately suppressed. For there had been a time when American academics had learned from their own mistakes. Rather than analyzing any unexpected conduct of official society under novel circumstances, they had pretended that the opportunist suppression of the unique circumstances were better ignored as an error from which there was nothing to be learned.

Surely there could have been no more unforeseen circumstances than when our governments chose to consider human capital, fully prepaid and long recognized as the most rewarding investment a government could make, as debt. For what could be more stressful than to consider the "most rewarding investment a government can make," as something owed rather than owned. Only a single letter "n" distinguish the two words, but the worlds they evoke could not be less compatible. For clearly that leaves our governments out in the cold with nothing that could be mistaken for accountancy. There is a bucket of enlightening conclusions to be drawn from noting how it fails to profit from such zany circumstances.

WK

Europe's Failed Course

Editorial, The New York Times, February 18, 2012

Struggling euro-zone economies like Greece, Portugal, Spain and Italy cannot cut their way back to growth. Demanding rigid austerity from them as the price of European support has lengthened and deepened their recessions. It has made their debts harder, not easier, to pay off.

This is not an issue of philosophical debate. The numbers are in.

As *The Times's* Landon Thomas Jr. reported this week, Portugal has met every demand from the European Union and the International Monetary Fund. It has cut wages and pensions, slashed public spending and raised taxes. Those steps have deepened its recession, making it even less able to repay its debts. When it received a bailout last May, Portugal's ratio of debt to gross domestic product was 107 percent. By next year, it is expected to rise to 118 percent. That ratio will continue to rise so long as the economy shrinks. That is, indeed, the very definition of a vicious circle.

Meanwhile, shrinking demand and fears of a contagious collapse keep pushing more European countries toward the danger zone of unsustainable debt.

Why are Europe's leaders so determined to deny reality? Chancellor Angela Merkel of Germany and President Nicolas Sarkozy of France, in particular, seem unable to admit that they got this wrong. They are still captivated by the illogical but seductive notion that every country can emulate Germany's export-driven model without the decades of public investment and artificially low exchange rates that are crucial to Germany's success.

Mrs. Merkel also seems determined to pander to the prejudices of German voters who believe that suffering is the only way to purge Greece and other southern European countries of their profligate ways.

There's no question that Greece has behaved inexcusably, spending more than it could afford, failing to collect taxes from some of its richest citizens and fudging its books. And while we sympathize with Greek protests against excessive austerity, we have no patience with politicians who continue to drag their feet over pro-growth reforms and privatizations. But the cure is neither collective punishment nor induced recession. Europe must be willing to help Greece grow out of its problems – on the condition that Greek politicians finally commit themselves to market reforms.

Under strong pressure from international investors, euro-zone leaders have recently adjusted some of their policies. Europe's central bank has injected much needed liquidity into the Continent's banking system. Plans are finally under way to add money to a chronically underfinanced European Union bailout fund. But until they abandon the mistaken belief that austerity is the way to debt relief, even those steps won't be enough.

With Greece rapidly approaching the day (probably next month) when it can no longer pay government salaries and foreign creditors, Europe still has not released needed bailout money. It is not clear whether Mrs. Merkel and Mr. Sarkozy and others are playing chicken with Athens or think they could withstand Greece defaulting and leaving the euro zone. The risks are enormous.

At a minimum, a Greek default would send damaging aftershocks rippling through government finances and banks across Europe. The ideal and the practice of a united Europe would suffer a major blow. Those are high prices for all of Europe to pay for clinging to a failed idea.

Our Comment

What is holding up a very obvious solution is the resistance of the speculative banking community to authorizing the solution: the recognition that Greece has not simply "overspent" its enormous unrecognized human capital down the ages. This recognition by Greece's alleged "lenders" would bring into the spotlight the fact that our Western governments have done likewise, but on a vaster, more destructive scale. In the good year 1970, Revue Économique, the leading French publication handling economic theory, published a French translation of a 41-page article of mine that I had worked on for over a decade. In it I had concluded that the price level may not only go up because of a shortage of market demand over supply, but because of the growing amount of the national product that never gets marketed, but is obtained directly by the government from its suppliers. This had been most favourably reviewed by the publication on economic theory of Cambridge University. The reviewer was particularly

14 | Economic Reform

impressed by the term of "social lien" that I used to designate the investments the government makes directly from the supplier. I was immediately invited by some 7 or 8 university faculties throughout, the world including notably those of Finland, and Japan, to come and explain my idea. Not the least of these was the University of Waterloo in Canada where John Hotson, reading a review of my essay in a Canadian newspaper, immediately contacted me. He brought me to Waterloo and COMER was born.

Within a month or two, we had brought over from France, François Perroux, the leader of the kindred French organization who addressed the student body in French,

that I translated. Waterloo University, indeed, became COMER's home territory until the challenge was reversed and the "social lien" came to be seen as the menace to speculative banking, rather than the original vice versa. That became evident a couple of years later when Cambridge University held another conference, but this time, though our argument was put on the preliminary display before the conference, we were not chosen to present our case, but assigned with British politeness - to a session of the University of London - on the Cambridge campus! Clearly it was no longer dared hold the position that it had received enthusiastically only a couple of years earlier. It was

the year, too, that John Hotson was given early retirement, with a parting payment "too good to turn down," but that broke his heart. Within months he was dead.

And during a second Cambridge University conference the table where I sat, was graced with the same lady with whom I exchanged not a single word, but who carefully noted who came to speak with me.

You could not escape the impression that what was now considered the most crucial danger was not the "social lien," but its damaging effect on speculative banking as such. Everything has, as it were, turned upside down on ever flatter heads.

W.K.

Plan Seeks to Tailor Cancer Care

By Theresa Boyle, Toronto Star, February 3, 2012

Since every patient's cancer is different, a Toronto-based research institute is leading an international effort to provide specific, targeted treatment in cancer care.

In a paper to be published Friday in the journal *Cell*, scientists from the Ontario Institute for Cancer Research and Princess Margaret Hospital are announcing the development of a research blueprint that, in the next decade, could guide doctors in the hunt for hundreds of genetic mutations in all cancers.

The clinical trial, involving a dozen cancer research networks around the world, is expected to contribute a huge amount of genetic mutation data from thousands of patients. Currently, only a handful of cancers – including breast, melanoma, colon and leukemia – are routinely tested for only one or two genetic mutations each. About 10 targeted drug therapies are used to treat such cancers.

Dr. Tom Hudson, president of the Ontario Institute for Cancer Research, said DNA testing for a multitude of mutations could very possibly be standard practice on all cancerous tumours in a decade.

That would enable physicians to provide earlier and more accurate diagnoses, he said. And treatment could then be tailored to individual patients with fewer side effects.

"As the cost of genome sequencing decreases, we are presented with the reality that soon genome analysis will be no more or less expensive than most diagnostic tests in use today," Hudson said.

"This presents a huge opportunity to im-

prove diagnosis for patients and ultimately improve patient outcomes. But in order to implement these tools, we must first understand their impact in a clinical setting."

Cancer was once considered a single disease affecting many different parts of the body. Now researchers know that every patient's cancer is different and requires specific treatment. New technologies are required to diagnose and treat different cancers.

The new research effort will be based on sequencing currently underway by the International Cancer Genome Consortium, a collaborative effort co-founded by Hudson and headquartered in the MaRS building at College Street. The consortium has a goal of sequencing 25,000 tumours from 50 different cancer types.

Hudson said the consortium's large and growing database of mutations has revealed that many can be seen in different types of cancer. For example, the BRAF mutation is found in 42 percent of melanomas, which are responsive to BRAF-inhibitor drugs. But DNA sequencing has shown that BRAF mutations are also present in up to 10 percent in eight other cancers, including lung, prostate, breast, colon, pancreas and ovarian.

This suggests that cancer diagnosis should involve an in-depth analysis of a tumour's mutation for many different types of cancer, regardless of where the tumour originated, Hudson said.

Cancer patients involved in the clinical trials will have their tumours analyzed for numerous mutations. For example, patients with prostate cancer will have tumours analyzed for the BRAF mutation more commonly seen in melanomas. If the mutation is found, the patient will then be treated with BRAF-inhibitor drugs normally used in melanoma patients.

It is expected to take five to 10 years to complete the clinical trial and develop the blueprint.

Hudson said genome sequencing is becoming more affordable. He worked on the human Genome Project, a \$1 billion effort to sequence the three billion DNA letters in the human genome. It took 10 years and was completed about a decade ago.

Now the Ontario Institute for Cancer Research can sequence a genome for less than \$10,000 in a week. An international competition is underway to figure out how to do it for only \$1,000.

65 **6**5 **6**5

Editor: What is striking is the world of difference between the natural science community's handling of problems and the crooked wiles of our governments' economic authorities. Governments throughout the world engage in every possible, unconscionable escapade to avoid facing the once-recognized fact that investment in human capital and are the most productive investments that they were once recognized to be. Today they are being treated as mere expenses to be avoided like the plague. Change investment in education and all other human capital, with the officially tonsured consciences of governments, funerals are judged better investments than schools, hospitals, libraries and gymnasiums. Only atomic weaponry is exempted from this anti-humane code. Social suicide becomes the supreme investment of our gamboling banks.

How Not to Revive an Economy

By Michael Grabell, The New York Times, February 11, 2012

The polarized rhetoric of the 2012 election cycle presents voters with a false choice of whether the government can create jobs or should just get out of the way. The real debate should be about which policies work and which don't.

I spent three years reporting on the \$840 billion stimulus plan that the Obama administration pushed through Congress in 2009. My conclusion: government can create jobs – it just doesn't often do it well.

The stimulus – a historic package of tax cuts, safety-net spending, infrastructure projects and green-energy investments – certainly did a lot of good. As the economists Alan S. Blinder and Mark Zandi have noted, it's one of the key reasons the unemployment rate isn't in double digits now.

But the stimulus ultimately failed to bring about a strong, sustainable recovery. Money was spread far and wide rather than dedicated to programs with the most bang for the buck. "Shovel-ready" projects, those that would put people to work right away, took too long to break ground. Investments in worthwhile long-term projects, on the other hand, were often rushed to meet arbitrary deadlines, and the resulting shoddy outcomes tarnished the projects' image.

After trumpeting shovel-ready projects as the bedrock of his stimulus plan, President Obama admitted famously that "there's no such thing." But there were, and are, shovel-ready projects. The administration just needed to find them. Case in point: the nuclear cleanup at the Savannah River Site in Aiken, SC, which received \$1.6 billion in stimulus money. As soon as the money arrived in the summer of 2009, the retired cold war nuclear plant hired thousands of workers to decommission reactors, install pumps in the liquid waste tanks and ship barrels of solid waste to a salt formation in the Chihuahuan Desert. Workers from out of town filled up nearly all of the area's apartments, hotels and restaurants. The county's unemployment dropped to 8.5 percent from 10.2 percent in a matter of months.

Why did it work? Because the government could immediately send billions of dollars to contractors who were already in place for a project that had well-established plans. The problem with most of the projects was that the Obama administration and Congress had defined "shovel ready" too broadly. The original plan called for putting "shovels in the ground" within 90 days. But when the rules were written, states ended up with 120 days to have their road projects "approved." It often took six more months to a year before most of the projects were under construction.

Weatherization, for example, was billed as the low-hanging fruit of the clean-energy movement. But states are still sitting on roughly a billion dollars in unused grant money because of a tortured bureaucracy, in which the federal government paid the states, which paid local nonprofits, which then hired the contractors.

Neither states nor nonprofit groups were prepared to handle 20 to 30 times more money than usual. And federal officials brought ready projects to a standstill in the first year by applying new rules regarding prevailing wages.

As a result, the stimulus didn't provide enough oomph in the first year to overcome the effects of the European debt crisis and rising gas prices in 2010.

The stimulus effort should have contained more programs like Cash for Clunkers, which pulled car sales forward, emptied dealership lots and prompted auto plants to bring back thousands of employees.

"We're trying to figure out, 'Man, how did that thing just blow up the way it did?"" President Obama later said. "Essentially, all the auto companies did the marketing. They did the advertising in a way the government just can't do it and, frankly, even if we did it, people wouldn't listen."

The stimulus also could have been more powerful if the administration had pursued a temporary jobs program similar to the Works Progress Administration, which directly employed eight million people during the Depression.

As it was, states could create temporary jobs programs through a \$5 billion emergency welfare fund. Not enough states took advantage of it, but those that did saw real results. Fresno County, Calif., where unemployment was 18 percent, found jobs for 2,000 people who were out of work or underemployed.

It also helps to avoid losing jobs in the first place. The promise of \$50 billion

in state fiscal relief prompted school districts to forgo layoffs. By early 2010, the stimulus money had saved the equivalent of nearly 300,000 full-time teachers and support staff.

Even \$50 billion, though, wasn't enough to plug the budget gaps. The administration should have shifted more money there, and it could have tried to prime a similar effort in the private sector.

Germany's "work-sharing" program – in which companies reduce hours rather than lay people off, with the government providing partial unemployment benefits to make up for lost wages – has helped keep its unemployment rate below 8 percent since 2008. It also will let companies ramp up quickly when the economy recovers.

No matter who wins in November, the appetite for a big fiscal stimulus package won't be there. So what can be done about the 5.5 million Americans who've been unemployed for six months or more – a group that includes older workers whom Rutgers labor experts have called "the involuntarily retired"?

A temporary jobs program similar to the one tried in the stimulus, but aimed at the long-term unemployed, could help these people get the skills they need to return to work.

Shovel-ready isn't as important as it was in early 2009 because we're not scrambling to stanch economic bleeding. But the lingering malaise gives us an opportunity to make smart decisions about our infrastructure.

The American Society of Civil Engineers has given the nation's infrastructure an overall grade of D. Fixing deficient bridges, tunnels, dams and sewage-treatment plants, not to mention expanding high-speed Internet and modernizing the electricity grid, should be clear priorities.

Typically, the government spreads money like peanut butter, so that no one can do anything significant and every program is starved.

Separate agencies oversee highways, aviation, transit and railroads. The 2009 stimulus introduced a better model: a competitive, \$1.5 billion grant program for transportation, called Tiger, that forced local leaders to think regionally about strategies that combined multiple modes of transportation. The money untangled freight rail lines in Chicago, financed streetcars in Dallas and rapid buses in the Washington area, and helped Philadelphia build a 128mile network of bike and walking trails. It should be a model for future transportation grant programs.

Investments in solar and wind energy, electric cars and high-speed rail make sense, but to have an impact there must be certainty around them. The fluctuations in

Mail Box

February 16, 2012 Hi, Bill:

The recent issue (Winter 2012) of *American Scholar* included an article by Richard Striner titled, "How to Pay for What We Need." The article can be found on the web at http://theamericanscholar.org/how-to-pay-for-what-we-need.

I wrote the following response and have received word from *American Scholar* that they plan to publish these remarks in their next issue.

All the best,

Wavell Cowan

"I must confess to being pleasantly surprised (actually astonished) that *American Scholar* would publish Richard Striner's 'How to Pay for What We Need' (Winter 2012). No 'respectable' journal has published such economic heresy in recent times, in spite of its obvious intellectual merits. As implied by Striner, this has been a taboo topic for any serious economic discussion since the 1930s.

"It is no surprise, however, that the author is not an economist. That profession, with tragic consequences, is so mired in left- or right-wing ideological certitudes that it is incapable of applying anything remotely resembling scientific objectivity to its studies. For anyone interested in just how wildly outdated is the macro-economic model currently taught by main stream economists and fundamental to the actions of the Federal Reserve, I'd suggest consulting the writings of William Krehm and William Hixson, the latter referenced by Striner. An entry point for so doing is www.comer.org."

February 17, 2012

Dear William Krehm:

I wanted to congratulate you for the lawsuit you have filed to try and force the Bank of Canada and the politicians to do the job for which the bank was intended and create interest- and debt-free money for Canadians to use.

A friend and I attended one of your meeting some time ago and had the impression that COMER bore no relevance to what is going on in the present world other than as a forum for people to air their viewpoints and vent their frustrations. Apparently, we were wrong. You, at your advanced age, are an inspiration to those of us much younger (and, I say that as an almost-62-year-old) and I can imagine that if there is one thing you wish to do before you pass on to a better world, it would be to see your life's work crowned by success in this endeavour. There are many of us who understand the enormity of the problem and who are with you every step of the way.

Incidentally, I don't know if anyone has informed you that your lawsuit is mentioned (in Part 7, towards the end) in this amazing series of articles by David Wilcock on his website, www.divinescosmos.com. The title of the series is called "The Trillion Dollar Lawsuit that Could End Financial Tyranny" and, if you haven't already seen it, it makes for fascinating reading – especially for those of us who have been of the much-maligned "species" known as "conspiracy theorists" because it more or less validates everything that many of us have suspected for a very long time.

Anyway, once again, my admiration and congratulations for what you have done. I will follow the suit with avid interest.

Best wishes,

Victoria Malcolm Story

America's energy policy, the absence of a trust fund for high-speed rail as there is for highways and aviation, and the clear lack of a plan to tackle the deficit hinder the recovery instead of helping it.

In short, there are areas where the government should get out of the way, by clearing bureaucratic hurdles. But it's equally important for politics to get out of the way of smart government policies that can help the private sector create jobs.

Our Comment

The trouble here is that we have allowed ourselves to be deprived of the lessons of our history, dearly bought over the sacrifices of countless generations. The essence of those suppressed lessons, is that history comes not as in a common school, but as a result of class warfare and the economic class ending in political power wipes out all official memory of the regimes overthrown. In the French Revolution the newcomers actually chopped off their heads to make sure that they stayed powerless. We are not advocating that. But the key lesson is that the defeated class must stay powerless. To pretend otherwise is to be deprived of the lessons that history should have taught us, i.e., that the seemingly defeated classes can return to power, and from that strategic position are sabotaging the social revolution that was to have taken place. For one of the key lessons of history is that governments come to power not to serve "society" or humanity as such, but very well-defined classes. That basic lesson, has been lost in the hands of those who were allowed to recoup control of the state apparatus. Hence the very basic lesson of the history of at least the last two and a half centuries has been erased from official memory. Were it not so, high heads of long wiped-out regimes would not again be directing the current official show.

Two years after rapturous applause my work on the "social lien" had won at Cambridge University, I returned there to find that though my "social lien" had been explained as should have been in the initial exhibitions the discussion of the subject had been shifted to a separate conference for nonapproved ideas politely organized with the best Anglo politeness by London University in another part of the Cambridge campus! And the vanishing availability of university teaching positions emphasized the knuckles that lay behind the significant shift.

Thereby, notice had been served that the government was not there for any lesser purpose than to serve the speculative banking system, though in the most courteous British manner.

Having said this, reducing the matter, as does *The New York Times* article of to whether "governments can produce jobs and then get out the way" has trashed in advance the whole background history about governments flat-footedly serving a particular social class. Such historical details are anything but alien to this debate but, significantly, allotted neither heed nor sitting room for the discussion. That means trashing centuries of crucial history, that various governments have different loyalties and even beliefs of what government is about, why revolutions are fought, lost or won. To reduce these to a simple matter of government's ability to have "shovel-ready projects" ready is really presuming a drastic revision of history.

W.K.

Mortgage Relief Plan Aims at Refinancing

By Shaila Dewan, The New York Times, February 2, 2012

President Obama, in announcing new mortgage relief on Wednesday, acknowledged that previous efforts to help homeowners had fallen short of expectations. And he tried to explain how his new effort, much of which would require Congressional approval, would fare significantly better.

In making his case, Mr. Obama framed the changes as a round of improvements that would build on previous efforts to make it easier to refinance mortgages.

"I am sending Congress a plan that will give every responsible homeowner in America a chance to save about \$3,000 a year on their mortgage by refinancing at historically low rates," he told an audience in Falls Church, VA. "No more red tape. No more runaround from the banks."

In recent months, his administration has scrambled to make a breakthrough on the mortgage front, given limited cooperation from Congress and the Federal Housing Finance Agency.

The president's latest proposal was aimed at two groups of eligible homeowners: about 11 million whose loans are backed by Fannie Mae and Freddie Mac, and about 3.5 million whose loans are privately held. Those estimates include only homeowners who are current on their loan payments, have a credit score above 580 and are paying interest rates high enough to make refinancing attractive.

For those with privately held loans, the president will ask Congress to allow the Federal Housing Administration to refinance their mortgages in a program to be financed by a fee to large banks based on their size and the riskiness of their portfolios. The estimated cost of the program would be \$5 billion to \$10 billion, depending on the number of participants. Only houses whose values fall within FHA guidelines, from about \$270,000 to \$730,000 depending on location, would qualify.

The FHA would use the bank fee to insure itself against the credit risk of taking on the new mortgages, a White House official said.

Another part of the proposal is aimed at

Fannie Mae and Freddie Mac, which eased some restrictions on refinancing last fall, but not as much as the White House wanted. The Federal Reserve has called some of Fannie's and Freddie's barriers to refinancing, like risk-based fees for mortgages whose risk the companies have already shouldered, unjustifiable.

Mr. Obama's proposal is intended to force the mortgage giants to inject more competition into the refinancing market, eliminate appraisal fees and extend to everyone refinancing rules that had been made to help those who owed more than their homes were worth.

More than 10 million homeowners owe more money on their homes than they are worth, and home prices have continued to fall. The result is a drag on household wealth and consumer spending, with many families stuck in homes they are unable to sell but cannot afford to keep.

Some proponents of refinancing hailed the plan as a step in the right direction, though there were concerns about its chances of passing Congress. In a research note, Morgan Stanley called the plan's chances of passage "improbable," but applauded aspects that did not require Congressional approval, such as reduced red tape in existing government refinancing programs.

Mass refinancing, long a goal of the administration, would essentially be an economic stimulus plan because it would lower homeowners' monthly payments, giving them more cash to spend. The president's plan includes incentives for homeowners who choose to apply the savings toward paying down their principal, helping them to rebuild some of the home equity that was wiped out in the financial crisis.

Proponents of mass refinancing have said that Fannie Mae and Freddie Mac can allow homeowners who owe more than their homes are worth to refinance without taking on more risk because the loans are already guaranteed. But media reports disclosed this week that Freddie Mac also had \$5 billion invested in a type of security whose returns hinge on keeping interest rates high – in effect, the company bet against homeowners' ability to refinance at the same time that it was increasing restrictions on refinancing.

Jay Carney, the chief White House spokesman, said Monday that the Treasury Department was "looking into" the report. But on Tuesday a spokesman for the department said that Treasury did not have oversight authority over Fannie and Freddie. In a statement, the Federal Housing Finance Agency on Monday said it was examining the investments and that Freddie Mac was no longer entering into new transactions of that type.

The FHFA's inspector general is also looking into issues related to the transactions as part of a larger evaluation of the administration's oversight of Fannie's and Freddie's investments, a spokeswoman for the inspector general said. But she said evaluations were distinct from investigations, which are conducted in the case of potential criminal or civil violations.

On Wednesday, the FHFA announced that it would begin the pilot phase of a program to sell pools of foreclosed properties to investors, in hopes of increasing the number of rental units available, and reducing the stream of foreclosures weighing down home prices.

45 45 45

Editor: The current experience confirms the long buried recognition of what has onceagain become crucial in such matters as is who is left in power of the bamboozled post. Certainly not some blind-folded goddess of justice. That is why, immediately upon President Obama appearing in seeming control of the US political scene, we wrote him, citing only crucial US authorities on the point that it is not the abstract sense of justice that will prove decisive in such matters, but who is left to keep score. As expected I received no reply and the decisive score-keeping for the nation's sense of social justice, was left with an alumnus of US's traditional speculative banks. And with such score-keepers that is why what was to safeguard social justice, has become little more than officially authorized shambles. You simply cannot entrust the sheep for safe-keeping to the butchers and expect them to thrive.

Storehouses for Solar Energy Can Step In When the Sun Goes Down

By Matthew L. Wald, The New York Times, January 3, 2012

If solar energy is eventually going to matter – that is, generate a significant portion of the nation's electricity – the industry must overcome a major stumbling block, experts say: finding a way to store it for use when the sun isn't shining.

That challenge seems to be creating an opening for a different form of power, solar thermal, which makes electricity by using the sun's heat to boil water. The water can be used to heat salt that stores the energy until later, when the sun dips and households power up their appliances and airconditioning at peak demand hours in the summer.

Two California companies are planning to deploy the storage technology: Solar-Reserve, which is building a plant in the Nevada desert scheduled to start up next year, and BrightSource, which plans three plants in California that would begin operating in 2016 and 2017. Together, the four projects will be capable of powering tens of thousand of households throughout a summer evening.

Whether the technology will be widely adopted remains to be seen, but companies like Google, Chevron and Good Energies are investing in it, and the utilities NV Energy and Southern California Edison have signed long-term contracts to buy power from these radically different new power plants.

One crucial role of the plants will be complementing solar panels, which produce electricity directly from sunlight. When the panels ramp down at dusk or on cloudy days, the plants will crank up, drawing on the stored thermal energy.

That job will become more important if photovoltaic panels, which have plunged in price lately, become even cheaper and sprout on millions of rooftops. As the grid starts depending more heavily on solar panels or wind turbines, it will need other energy sources that can step in quickly to balance the system – preferably ones classified as renewable.

Most utilities are trying to generate as many kilowatt-hours of renewable energy as they can to meet stiffer state requirements on incorporating more alternative energy, said Kevin B. Smith, the chief executive of SolarReserve.

"As we move forward, we'll get more and more traction with the fact we can provide more capacity," Mr. Smith said, referring to his company's storage technology.

The Energy Department seems to agree: in September it gave SolarReserve a \$737 million loan guarantee for its project in Nevada. The plant will generate 110 megawatts at peak and store enough heat to run for eight to 10 hours when the sun is not shining.

Public Attitude Sours

The public's view on loan guarantees for solar projects has soured somewhat since the bankruptcy of Solyndra, a California company that received a \$535 million loan guarantee to build a factory to make solar panels – only to see the market for the modules crash.

But the outlook has always been clearer for companies that make electricity, which, unlike solar modules, is generally presold by contract.

Technical details of the SolarReserve and BrightSource plants vary slightly, but both will use thousands of computer-operated poster-size mirrors aiming sunlight at a tower that absorbs it as heat.

SolarReserve absorbs the heat in molten salt, which can be used immediately to boil water, generating steam that turns a conventional turbine and generator. Hot salt can also be used to retain the heat for many hours for later use. BrightSource heats water that can be used immediately as steam or to heat salt for storage.

The plants rely on salt because it can store far more heat than water can. But once molten, it must be kept that way or it will freeze to a solid in part of the plant where it will be difficult to melt again. "You've made a commitment to those salt molecules," said John Woolard, the chief executive of BrightSource.

The technology is not complicated, but the economics are.

The simplest, least expensive path for solar thermal is to turn the heat into electricity immediately. But the companies are a bit like the farmer who harvests the grain and stores it in a silo rather than shipping it straight to market on the expectation that prices will be higher later. They are betting that in revenue terms, the hour at which the energy is delivered will be more important than the amount generated.

The notion is that widespread adoption of solar panels – whether on rooftops or in giant arrays in the desert – will change the hours at which prices are highest.

Today, electricity prices usually peak in the late afternoon and evening on hot summer days. "Photovoltaic panels will do a pretty good job of chopping that peak" in the late afternoon, said Paul Denholm, a solar specialist at the National Renewable Energy Laboratory in Golden, Colo.

In other words, the new price peak will be pushed to later in the day, to just before and after sunset, when solar photovoltaic production is small or nonexistent, he and other experts say.

Mr. Woolard said the chief goal of the new plants would be to produce electricity when the utilities need it most. "We're optimizing around what is important for different times for the utilities," he said.

His company's contract with Southern California Edison still requires approval by California regulators.

Adding storage capacity helps keep the air-conditioners humming when solar panels are not producing, but there are other financial benefits.

The equipment that makes electricity from steam is the most expensive part of a solar thermal system, but if it is connected to storage technology, it can run almost twice as many hours as a plant without storage. That means the unit cost of electricity drops.

Another has to do with the arcane economics of electricity. A utility must assure a supply of electricity in two forms: energy and capacity. The difference has never meant much to most consumers, who directly pay only for energy, as measured in kilowatt-hours.

But capacity, the dependable ability to produce power, is becoming more important as renewable energy forms a larger and larger part of the grid.

Wind and sun provide a lot of energy but not much capacity. Today, backup capacity for wind and solar power comes in the form of expensive gas-fired generators, which sit idle most of the year but operate when the wind stops blowing or the sun stops shining.

Storage could cut costs by 4 cents a kilowatt-hour, Mr. Denholm calculates -a considerable benefit for a commodity that retails for an average of 11 cents. A big part of the savings is not having to build the gas-fired generators for backup.

For competitive reasons, neither Bright-Source nor SolarReserve would discuss capital costs. But Mr. Smith of SolarReserve said that the storage technology amounted to less than 5 percent of capital costs. For Bright-Source, Southern California Edison was willing to pay extra for a plant that could deliver when the sun was not shining.

The success of any given project may depend on the particular details, but other experts agree that a market is opening for plants with storage capacity. A study completed in July by Navigant Consulting, Sandia National Laboratories and Pacific Northwest Laboratory on the potential effects of adding large amounts of photovoltaic energy to NV Energy's portfolio found that to integrate the new power sources, the utility would need more standby generation.

NV Energy would also need generation whose output could be adjusted over very short intervals to compensate for variability in solar photovoltaic production, the report suggested. The solar thermal storage system is designed to meet exactly those needs.

65 65 65

Editor: There is in these reasonings on the importance of storage technology a crucial lesson that must be transferred to human affairs. They can run almost twice as many hours as a plant without such storage facilities.

These have to do with grasping the crucial enhanced importance of priming, safeguarding the heightened value to society of human potential both before and after it has attained its full potential as a producer. That means that the adequate preparation of our children from birth through nursery, school and university age, and beyond their productive prime years, their period of retirement must be seen not as a negative expense, but as a crucial social investment.

Only then will the unused potential of human capital come into its full timely potential.

Promises, promises, but where will the money come from?

A cynical person might suspect that the billions of dollars for services and tax cuts promised by our politicians during this election campaign will not be forthcoming. After the election the party in power might simply ignore their promises or suddenly "discover" some unforeseen event which "prevents" them from keeping their promise – not their fault, of course.

The main reason given for not keeping a promise is that there is not enough money, but if not, where did it go? During the great depression we had the same problem; money was very scarce. To overcome this problem, Prime Minister Mackenzie King knew that it would be necessary for the government to take control over the issue of currency and credit. This was accomplished in 1938 when King nationalized the Bank of Canada, and control of the issue of currency and credit was assumed by the Government of Canada. The government borrowed from the Bank for WWII and the post war development, thereby helping "to avert the depression that had been widely expected" after the war. Instead of a depression, the Bank's monetary policy "ushered in the most vibrant period in Canadian economic history" lasting until the early 1970s. Great social programs like Medicare and pensions were started, and money was available for housing, education and infrastructure.

However, step by step, banking regula-

tions were removed after 1950 (not just in Canada, but throughout the western world) and the government once again parted "with control of its currency and credit."

From 1975 on, the government's longterm debt was borrowed almost entirely from the private sector. When interest rates went sky high in 1981, so did Canada's debt. From confederation to 1974, our federal net debt amounted to \$18 billion, and that included the debt of two world wars. By 1997 the federal net debt had climbed to a peak of \$588 billion, an increase of over 3,000% in 23 years.

Net debt for the provinces and municipalities amounted to more than \$400 billion, for a total public net debt of over \$900 billion. Interest at one point amounted to \$77 billion a year. It is now down to about \$65 billion a year (which is 650 times bigger than the \$100 million sponsorship scandal that everyone is bothered about, and it goes on year after year after year). Ninety-three percent of the debt came from compounding interest – not from government program spending.

Resources for programs and transfer payments to provinces have been diverted to the debt and to the interest on the debt. There is not enough money for health, education, municipal infrastructure, the environment or anything else.

To get out of the financial hole we are in and have the resources for the things we need, we must once again take back control of our currency and credit. To do this, the government needs to return to using the Bank of Canada for its long-term debt. Some say this would cause inflation, but this did not happen during the 30 years (1940 to 1970) when the government used the Bank of Canada in this way.

Question for the candidates – Will you support using the Bank of Canada to carry some of the government's long-term debt and will you lobby your own caucus to do the same?

> Richard Priestman, COMER, Kingston Chapter