Strange New World

“I pass with relief from the tossing sea of Cause and Theory to the firm ground of Result and Fact.”

– Winston Churchill (The Story of the Malakand Field Force, 1898 – near the Swat Valley, Pakistan)

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Strange New World

• The Uncertain Outlook
• History
• Demographics
• The New Middle Class
• Resources
• Valuation
• Risk
• Behavior
One of my friends is very pessimistic. I do not agree with him, but his forecast cannot be dismissed.
The world is divided between rich and poor. The World Bank sets this dividing line at approximately $10,000 GDP per capita. On the chart, the rich world is shown in dark green.
Our firm invests in “frontier” markets, which we define as those countries with stock markets that are not included in the MSCI All Country World Index or the MSCI Emerging Markets Index.
World population is shown dramatically by the chart from the website “WorldMapper.org”
And this chart shows how bloated the developed world is in terms of power production. Note how shrunken Africa is.
The breakdown of population shows two thirds of the world’s population in emerging countries and another 20% in frontier countries. Yet their combined share of the world GDP and stock market capitalization is only 30%. We recommend that investors place at least 30% of their equity investments in emerging and frontier markets.
The International Monetary Fund forecasts of real growth forecast that the developed world will grow at roughly 2-3% while the developing economies will grow at 6% or more.
And the fiscal balance and debt position of the developing world are much stronger than those of the developed world, following the Global Financial Crisis of the past several years.
Countries that have high debt and negative fiscal balance will find it difficult to avoid further increases in debt.
The Bank for International Settlements has produced frightening projections of debt burdens, not just for the Southern European countries that are in crisis today, but also for the major industrialized nations. Japan’s debt is projected to exceed 400% of GDP in 2040, while for the United States, the figure could exceed 300%.
Strange New World

Usually, only 3 ways out

1. A higher growth rate of GDP
2. A lower interest rate on the public debt
3. A bailout, meaning either a current transfer payment or a capital transfer from abroad
4. Fiscal pain, meaning an increase in taxes and/or a cut in public spending
5. Increased recourse to seigniorage (revenues from monetary issuance) by the central bank
6. Default, including every form of non-compliance with the original terms of the debt contract, including repudiation, standstill, moratorium, restructuring, rescheduling of interest or principal repayment etc.

Note: Term structure of debt shorter than post WWII. Bonds held by Foreigners & Bond Vigilantes, not Govt, local or Passive Investors (local in Japan & Italy)

Source: Buiter (2010)

Countries in debt trouble are not likely to find easy solutions. They may print money or default. However, with alert bond investors around the world, the interest rate cost of debt is likely to rise. Some countries, such as Japan, may have an advantage because most government bonds are held locally.
Turning from the uncertain outlook to the next section of our talk, we review recent history. A ten year comparison of investment results shows that emerging and frontier stock markets have done’t well.
Most people have negative views of the poor world, based on images like this of a mine in Borneo.
Or this sad picture of children in Katmandu, picking through garbage while competing with monkeys.
Poor World?

Or this image of gross pollution that evokes our thoughts of China’s industrial regions. Surprisingly, however, this picture was not taken in China… It was taken of the Cuyahoga River in Cleveland, Ohio, in 1971. The river even caught fire three times! Today, that river has been cleaned up – and in the coming years, we believe the emerging countries will clean up too.
We have already seen convergence of GDP per capita.
But by 2002, you could buy almost anything at GUM's.
History

Dubai 1991

Dubai 2005
And in China, Nanjing Road has been transformed to a shopper's paradise
Demographics is an important factor, as populations in the developing world are aging rapidly, leading to a burden of retired workers on pensions. Meanwhile, the emerging countries (in blue) and the frontier countries (in red) have very young populations.
The population of India will exceed that of China in 2030, due to China’s “one child per family” policy. And the population of Africa will exceed that of both China and India. Meanwhile in Eastern Europe, populations are actually shrinking.
We compare China with India by five year age bands with females on the left and males on the right. Today, China has many more workers in the “sweet spot” of population age: between 25 years old and 55 years old.
In 2050, however, India will have more productive workers than China.
Japan’s demographics become increasingly challenging.
The United States will be ok.
Nigeria is challenged today, but gets a “demographic dividend” in the coming years.
Russia’s demographics look worse in 2050
We now consider the powerful influence of the rising middle class in emerging and frontier countries. China has over 120 million households with incomes between $2000 and $7500, compared to only 15 million in India. India has wasted the minds of its women, with only 45% of women being literate, compared with 87% in China. And infant mortality (up to age 5) in India is 6.5% compared to 3% in China (sadly, in Nigeria, it is 19.5%)
China motivates its workers with stern human resources policies, as shown in this sign at a Chinese factory.
The consulting firm, McKinsey, projects 250 million middle class households in China by 2025. This is a significant potential customer base for companies around the world.
$2,000 to $12,000 is the sweet spot for consumption
(Penetration of durable goods relative to annual income)

$2,000 = 15,000 RMB
$12,000 = 90,000 RMB

And these customers will want many things, such as microwave ovens, DVD players and automobiles.
Auto sales in China today are following the same growth trend as they did in the United States 100 years ago.
This will place huge demands on world resources, and many frontier countries will benefit because they are rich in raw materials.
### Raw Minerals & Energy

#### ....The Frontier is Rich

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**Proven reserves:**

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**Source:** British Petroleum, 2009

Furthermore, increased exploration in developing countries will produce further new discoveries, as has happened with oil of the coast of Ghana in 2007.
Rising wages in China have now made it attractive to shift manufacturing to less developed countries, such as Vietnam.
Dhaka in Bangladesh and Colombo in Sri Lanka also offer low labor costs.
No Sub-prime Problems in Emerging/Frontier

We believe that financial services have huge potential in developing countries, since they have hardly even begun to make mortgage loans, let alone sub-prime loans.
Banking penetration in the poorer countries is extremely low. In Ivory Coast only 7% of people use the banks.
As banking penetrating increases, the first thing to grow is deposits. Banks pay low rates on deposits and make only a few, high margin loans. As a result, we find that ‘net interest margins’ in frontier country banks are often 5-10%, compared with 1.5% or less in developed countries.
Emerging countries have many talents people, such as this student in the MBA program at Strathmore University in Nairobi, Kenya
Entrepreneurship is high in frontier countries, as exhibited by this photograph. A man with a cell phone climbed trees until he found one with good reception. Then he built a tree house and rents his phone to customers, who climb up and make their calls.
Here is a “phone girl” in Malawi, who sells scratch cards for 50 kwacha (USD $0.35) to make 1 minute calls on her battery powered phone.
Here is a worker at Dangote Sugar Refinery in Lagos, Nigeria.
<table>
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<th>Stock Opportunities</th>
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<th>Yield</th>
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<td>15.3%</td>
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<td>Finance</td>
<td>3.0x</td>
<td>20%</td>
<td>10.0%</td>
<td>20%</td>
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<tr>
<td>Cement</td>
<td>5.1x</td>
<td>16%</td>
<td>3.8%</td>
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<tr>
<td>Petroleum Dist</td>
<td>3.2x</td>
<td>41%</td>
<td>9.2%</td>
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<tr>
<td>Shoe Manufacture</td>
<td>10.3x</td>
<td>53%</td>
<td>6.8%</td>
<td>25%</td>
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<td>Pharmaceutical</td>
<td>3.9x</td>
<td>25%</td>
<td>0%</td>
<td>20%</td>
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There are many inexpensive stocks in frontier countries.
Bata Shoe, Bangladesh

- Founded 1894 in Czechoslovakia by Bata siblings
- Survived nationalization during Communism
- Operations in Bangladesh since 1962
- World’s largest shoe manufacturer in over 50 countries
- 2009e: PE 10.3x, ROE 53%, Yield 6.7%, Earn. Growth 25%
- Auditor KPMG

Bata Shoe is a global company that has a locally listed subsidiary in Bangladesh. There is huge opportunity as only half of the 150 million people in the country wear shoes!
Another company we like is Swissport Tanzania, which is a subsidiary of the global parent, Swissport, in Switzerland. We call this a “sidercar” because as investors, we benefit from the global parent that is “driving the motorcycle”.

Swissport, Tanzania

• China–Tanzania Relationship
• Sidercar Investment
• 2009e: PE 5.2x, ROE 53%, Yield 15.3%, Earn. Growth 15%
• Auditor PWC
BRD Groupe Societe Generale, Romania

- Leader in underpenetrated market: loans/GDP 40%
- Prudent banking during boom
- Profitability and market share gains
- 2009e: PE 10.3x, ROE 18%, Yield 2.4%, Earn. growth 20%
- Auditor: Ernst and Young

Another sidecar is the subsidiary of Societe Generale that is locally listed in Romania.
From the world market high in mid-2007, emerging and frontier markets have done well.
Among frontier markets, the weakest have been in Eastern Europe where the economies were closely tied to the misfortunes of Europe.
Valuations: Frontier & Emerging Markets are Attractive

US 15.4x, EAFE 16.4x, Emerging 14.6x, Frontier ex-GCC 11.9x

Valuations are attractive on the Price to Earnings ratio.
Valuations: Frontier & Emerging Markets are Attractive

Valuations are attractive on the Price to Book Value ratio.
Valuations are attractive on Return on Equity
Most people believe that risks are high in the poor world because of the constant barrage of stories and images in the media that are focused on trouble spots.
In fact, however, since Cold War ended there has been a substantial fall in the number of conflicts.

Took Western Europe over 1000 years to achieve permanent inter-country peace. The developing world may learn quicker.
More Peacekeepers and Tribunals

The end of the Cold War led to a steep increase in UN peacekeeping operations. Peace operations now play a critical role in rebuilding war-shattered societies and in preventing peace agreements from breaking down.

The ending of the Cold War was associated with an increase in national and international prosecutions of perpetrators of grave human rights abuses.

There are more UN peacekeeping operations and more international tribunals.
Behavioral finance says that investing is like a beauty contest.

Behavioral Finance

The Beauty Contest

• “Professional investment may be likened to those newspaper competitions in which the competitors have to pick out the six prettiest faces from a hundred photographs,
• the prize being awarded to the competitor whose choice most nearly corresponds to the average preferences of the competitors as a whole;
– The General Theory – John Maynard Keynes, 1936
• … so that each competitor has to pick, not the faces which he himself finds prettiest, but those which he thinks likeliest to catch the fancy of the other competitors, all of whom are looking at the problem from the same point of view.

• It is not a case of choosing those which, to the best of one’s judgment, are really the prettiest, nor even those which average opinion genuinely thinks the prettiest. We have reached the third degree where we devote our intelligences to anticipating what average opinion expects average opinion to be.”

John Maynard Keynes said that we must judge the future preference of the crowd.
Behavioral Finance - The Beauty Contest

- CALPERS Seven Factors:
  - Country: Political Stability, Transparency, Labor Practices

- Scores (1=Lowest, 3=Highest)…. Acceptable Overall = 2.00+
  - Brazil: 232-1213 = 2.04 (acceptable)
  - Argentina: 123-2122 = 1.88 (unacceptable)

- Poland 3, Korea 2.8, Chile 2.7, Mexico 2.4
  - Russia 1.6, Indonesia 1.6, Venezuela 1.6, Thailand 1.9

A problem is that we are drawn to choose the most “beautiful” investments at the moment, just like the California Public Employees Retirement System did when it ranked countries on seven factors. The pension plan excluded low ranking countries from its investment portfolio.
CALPERS Ranks were Counter-productive…. Suitability and Opportunity are INVERSLY related.

In practice, CalPERS lost several hundred basis points per year in its emerging market portfolio because it had excluded precisely those countries that could show the greatest improvements and deliver the highest returns as well.
When we think of risk, it is good to use an objective measure, such as the rankings of Economic Freedom, from The Heritage Foundation. As shown Bangladesh ranks higher than China and Russia. Cote d’Ivoire (Ivory Coast) ranks higher than India. And Nigeria ranks higher than all of the “BRICs” (Brazil, Russia, India and China).
## Heritage Foundation – Economic Freedom Rank

### BUSINESS FREEDOM
- Starting a business—procedures (number), time (days), cost (% of income per capita), minimum capital (% of income per capita)
- Obtaining a license—procedures (number), time (days), cost (% of income per capita)
- Closing a business—time (years), cost (% of estate), recovery rate (cents on the dollar)

### TRADE FREEDOM
- The trade-weighted average tariff rate
- Non-tariff barriers: quantity restrictions, price restrictions, regulatory restrictions, investment restrictions, customs restrictions, and direct government intervention

### FISCAL FREEDOM
- The top tax rate on individual income and on corporate income
- Total tax revenue as a percentage of GDP

### GOVERNMENT SIZE
- Government spending % of GDP

### MONETARY FREEDOM
- The weighted average inflation rate for the most recent three years
- Price controls

### INVESTMENT FREEDOM
- Restrictions in sectors related to national security or real estate
- Expropriation risk
- Access to foreign exchange
- Restrictions on transfers or capital transactions

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The Heritage Foundation ranks of Economic Freedom are very complete.
Heritage Foundation – Economic Freedom Rank

FINANCIAL FREEDOM
• Central Bank Independence
• Freedom of credit allocation
• Contract enforcement
• Presence of private financial institutions
• Foreign financial institutions not restricted

PROPERTY RIGHTS
• Private property guaranteed by the government
• There is no corruption or expropriation
• The court system enforces contracts efficiently and quickly.
• The justice system punishes those who unlawfully confiscate private property

CORRUPTION
• Transparency International’s Corruption Perceptions Index (CPI)

LABOR FREEDOM
• Ratio of minimum wage to the average value added per worker
• Hindrance to hiring additional workers
• Rigidity of hours
• Difficulty of firing redundant employees
• Legally mandated notice period
Our retail investors are just trying to follow the others, keen to know what the so called ‘gamblers’ are going to buy:

- “I heard this share’s price will jump, because some gambler is going to buy it”

In our market, we have some stocks like Apex foods, Apex tannery, Apex footwear, Apex Spinning, Apex weaving etc. These companies are doing different kinds of business. Some are involved in textiles, some in foods and some in footwear.

- If there is a good news for say… Apex footwear- that is involved in footwear business, all companies that name begin with Apex will start rising.

They are acting as a group even though the business is different and the owners are different for some companies.

Another aspect of behavior is the inefficient behavior of local investors in many less developed markets. This provides an opportunity for CFAs.
Behavioral Finance - Local Behavior in Bangladesh

- We have different multinational companies that are involved in different business that are totally different from other multinational’s business.
  - For example, Bata is multinational company involved in footwear business where British American Tobacco involved in tobacco business that has no relation with Bata.
- When the multinationals start rising, **all multinationals start rising together**
- Investors have a general preference of **stock dividend** over cash dividend. They always like to have stock dividend. If a cash dividend paying company declares stock dividend, the price will immediately start jumping.
- Low Price/Share or Price/Par Value
Paul Bond is a lawyer at the Brown & Long law firm. One day while standing outside his office at Brown & Long he overheard John Grand, another lawyer at the firm, talking with an associate about his work on a proposed purchase of the Pillow company by the Down company for $120 per share. Paul Bond had no role in the work on the proposed purchase of Pillow and Brown & Long represented only Down, not Pillow.

Paul Bond bought 1,000 shares of Pillow for $70 per share.

Please rate Paul’s behavior as:
Completely Fair, Acceptable, Unfair, or Very Unfair.

Trust is an important aspect of behavioral finance that varies around the world. Consider the temptation to invest on the basis of the information in this slide.
Behavioral Finance - Trust

<table>
<thead>
<tr>
<th>Country</th>
<th>Percentage Who Rated Bond’s Behavior Completely Fair or Acceptable</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>Turkey</td>
<td>56%</td>
<td>1</td>
</tr>
<tr>
<td>India</td>
<td>49</td>
<td>2</td>
</tr>
<tr>
<td>Italy</td>
<td>43</td>
<td>3</td>
</tr>
<tr>
<td>Tunisia</td>
<td>41</td>
<td>4</td>
</tr>
<tr>
<td>Australia</td>
<td>16</td>
<td>5</td>
</tr>
<tr>
<td>Israel</td>
<td>16</td>
<td>6</td>
</tr>
<tr>
<td>Netherlands</td>
<td>5</td>
<td>7</td>
</tr>
<tr>
<td>United States</td>
<td>5</td>
<td>8</td>
</tr>
</tbody>
</table>

Source: Meir Statman, Countries and Culture in Behavioral Finance, CFAPubs.org, Sept 2008

In Turkey, India and Italy more than 40% of investors believe that it is acceptable to trade on “insider” information.
Trust is related to income... and cultural history.
• **Education** –
  Increases the quality of formal institutions that enforce contracts,
  Decreases income inequality, and
  Directly raises trust by raising incomes
• **Press freedoms and civil liberties** increase the quality of civil institutions and thereby trust
• **Telephones and roads** directly raise trust by increasing social ties between interacting parties
• **Income transfers** reduce inequality and thereby raise trust.

Studies indicate that increased development increases trust.
Ecological measures pollution in the physical environment of exchange. It is dominated by measures of “xenoestrogens” or synthetic estrogen mimics (such as the pesticide DDT), and is strongly negatively related to trust.

Phyto is an index of phytoestrogen consumption. Phytoestrogens are plant-based estrogens found in soybeans, legumes, wine, tea, and many other foods, and we find they are strongly positively related to trust.

Controlling pollution also increases trust.
Another aspect of behavioral finance is risk aversion. Consider the willingness of people to do a simple coin toss where you stand to lose $100 or win some other amount. How large a winning is needed for you to accept the gamble?
Investors' Risk - Loss Aversion & Utility Function

- Coin toss: lose $100…. Win ??
- Paul Samuelson’s wager:
  – Coin toss: win $200, lose $100
  – Colleague’s response: “no” for one toss, “yes” for 100 x
- Loss Aversion Factor ~ 2.5x
- 1 toss Utility = 50%*1*200 + 50%*2.5*(-100) = -25
- 2 toss Utility =
  25%*win both+50%*split+25%*lose both =
  .25*400 + .5*100 + .25*2.5*(-200) = +25

This risk seeking and risk avoiding behavior leads to the concept of the utility function, a curve which converts financial payoffs into emotional payoffs. Professor Paul Samuelson once offered a colleague a wager on a coin toss: heads win $200, tails lose $100. The colleague’s response was “no” for one toss, but “yes” for a hundred tosses. This is completely logical if we construct a utility function where losses could for 2.5 times as much as gains. In this case, the formula for a wager on one toss is as follows:

1 toss Utility = 50%*1*200 + 50%*2.5*(-100) = -25

On the other hand, the formula for two tosses results in positive utility:

25%*win both+50%*split+25%*lose both =
  .25*400 + .5*100 + .25*2.5*(-200) = +25
A study by Meir Statman found that people in the rich countries are driven to seek safety, while those in poorer countries are “risk-takers”. This may lead to more entrepreneurship and higher growth.
A study of global attitudes by the Pew Foundation found that money does buy happiness (at least as measured by satisfaction with your life on a scale of one to ten).
However, the relationship of optimism to income is reversed.
And the question was asked: “Will your children be better off than you?” In Japan 90% said no. In the U.S. 69% said no. The optimists are in the poor world.
So we end our talk with some of the images that make us believe that people in the poor parts of the world will do well in the years to come.
Optimism: Determination
Optimism: Determination
Here is an image from Beirut, where I went jogging in the early morning and found this graffiti that expressed hope for the world.