The Stumbling Dragon: Or, Why China's Economy is Causing me to lose Sleep at Night

Daniel Garst, Ph.D., formerly Senior Research Fellow Center for China & Globalization (CCG) & widely Published Author/Analyst

No longer a question of if, but when real big trouble will overtake China's economy; indeed, there's now a blackout on negative reporting on the economy in the Chinese media.

Today's ppt will:

- Explain why China's older growth drivers, trade and, more recently investment, face major headwinds;
- Outline the main short-term systemic risk confronting China, soaring debt levels;
- Review the options (all of which are unpleasant) for addressing the looming debt crisis;
- Look beyond the debt crisis and briefly note the other major headwinds confronting China and its economy;
- In doing this, will note the misguided priorities of the country's current leadership.

China's days of being the "world's workshop" & export platform for low-cost, labor-intensive manufactured goods are over

Why do I say this? First, understand what enabled China to assume this role:

- "Demographic dividend" (accounts for 15-20% of earlier Chinese economic growth);
- Massive shift of labor from countryside to cities—300-400 million people migrated internally starting in the 1990s;
- That shift supplied factories with a seemingly bottomless pool of cheap labor;
- Cities like Dongguan in Guangdong Province emerged overnight as major manufacturing centers;
- These trends, not currency manipulation, were key to China's export success.

These drivers are disappearing.

Consider internal migration: After growth rate slowing for many years, rate of internal migration is now contracting, down by 5.68 million people in 2015.

More ominously, China faces looming labor shortages:

- Working age population has declined every year beginning in 2012;
- The future is bleak—two data points: 1995, 25.3 million children enrolled in elementary school, 2008 figure was 16.7 million; next decade number of Chinese aged 20-29 will fall by 25%, from 200 to 150 million, number aged 20-24 will fall from 125 to 68 million.

China’s days of being the “world’s workshop” & export platform for low-cost, labor intensive manufactured goods are over

What do these population trends mean? General sense, China has, or is about to, hit the “Lewis Turning Point.”

More immediately and specifically, two things are happening:

- Worker shortages lead to soaring wages, they’ve been rising at a double-digit clip;
- Skyrocketing labor unrest, number of strikes has been doubling every year in China.

China’s days of being the “world’s workshop” & export platform for low-cost, labor intensive manufactured goods are over

Chinese wages now high compared to other “emerging economies:”

- In 2000, China’s wages were 30% of Mexico’s, now they’re 50% higher;
- 168% higher than Vietnam;
- 5x higher than Cambodia.
- Worse, labor productivity has stagnated since early 2000’s, Chinese labor 1/12 as productive as U.S. labor, 1/11 of Japan, also less productive than in India, Thailand, and Morocco.
- If you were a Chinese or foreign manufacturer, where would you be locating factories? (you’d be surprised about where Chinese shoe manufacturers are setting up shop!); ah, the “Giant Sucking Sound!”

Added to this the Yuan has appreciated significantly, from over 7 to the $, to 6.5 to the $.

Not surprisingly, trade is becoming a less important driver of China’s economy:

- From 2000-2007, China’s current account surplus reached 10% of GDP, reflected big trade surpluses;
- Since 2008 global crisis, that external surplus has fallen to 2-3% of the GDP;
- That’s 2013-2014 data, recent figures even worse—exports were down by 2.9% in 2015, fell by over 10% in January & February of 2016; imports down even more, reflecting weak domestic demand & slowing economic growth.

Post 2008 Turn to Investment led growth

Worth noting here a Chinese peculiarity

- Share of consumption in GDP has been low for all "emerging economies," like South Korea, but it's been really low in China;
- During export boom, under 40% (figure for U.S. & other advanced economies is over 70%);
- In effect, exports substituted for domestic demand.

Leads to the following Q, "What's made up for the decline in exports, or external demand, just noted?

- Not consumption, that's only risen slightly, share of GDP is still around 40%;
- Slack taken up almost entirely by investment, rose to 50% of the GDP.

Stems from the Chinese response to the 2008-9 global crisis:

- 4 trillion RMB ($580-660 billion) stimulus package, emphasizing fixed capital investment, especially infrastructure;
- Turning on the credit spigot, stimulus fueled the creation of 14 trillion RMB worth of credit.

Post 2008 Turn to Investment led growth

China was right to stimulate, plus not all of the money was wasted—Beijing subway expansion is a case in point (see the top left photo).

But much of it was squandered, especially on local government pet projects, two examples:

- Luliang (Shaanxi) tries to reinvent itself as a "liquor/Baijiu heritage" city (top right photo).
- Tianjin seeks to emulate Shanghai's success with Pudong by mimicking Manhattan (including Rockefeller Square) (bottom left photo).

Also on the national level, the HSR boondoggle (doubling of the Railroad Ministry's debt), other picture.

Not a sustainable growth trajectory:

- After falling sharply in 2008, economy resumed double-digit growth in 2009-2010; but has been in single digits and falling ever since, now under 7%, back to 2008 crisis levels.
- This investment-led shot in the arm is by nature temporary, not long-term, how many airports can you build?
- Can be seen in China with the Return on Invested Capital (ROIC), falls from 20% prior to 2008 to 15% in just a few years after the 2008-9, now is certainly lower.

Consequences of turn to investment-led growth: Huge surplus capacity

Housing:

- As of February 2016, country's property inventory up by 15.7% from previous year to 729 million square meters, analysts feel will take at least 8 years to fill up this capacity.
- I suspect much of it will never to filled, as the property glut is concentrated in lower tier cities & people aren't going to be moving to them. Consider Yinchuan in the Ningxia Autonomous, in 2014 had a population of 1.9 million, large numbers are state employees, have housing supplied to them, 1.2 million units up for sale that year! I saw the same thing in Panjin.
- Glut reflects misguided Chinese Government efforts to direct urbanization, rather than let it proceed organically, be driven by markets.

Industrial Sectors:

- Steel, 2012 national demand was 320 million tons vs. 470 million tons of productive capacity; currently excess capacity in the industry is greater the entire steel production of the U.S., Japan, and Germany combined!
- Cement, tied to housing boom, from 2011-2013, China used 4 gigatons of cement, more than the U.S. used in the entire 20th Century! So massive overcapacity now exists in that industry.
- Electrolytic aluminum: demand is 7.2 million tons vs. existing capacity of 11.2 million tons (2014 figures); bears noting that industry debt is 1 trillion RMB, while profits were 20 billion RMB.
- Petro-chemicals, capacity utilization stands at 65%; construction equipment, 50% (2014-2015 figures).
- Problem is widespread, in 2007 "output gap" was zero, by 2015, 13%, especially bad in State-owned heavy industries (According to Oxford Economics data).
- Will take years to wind down, according to the latest CKGSB quarterly survey of China's economy, very little progress has been made; indeed, Chinese aluminum smelting capacity is set rise by 10% this year!

Consequences of turn to investment-led growth: Soaring debt levels

As noted earlier, China really opened up the credit sluices after 2008-2009:

- Since 2008-2009, credit amounting to 35% of GDP has been issued annually;
- This party shows no signs of abating, credit growth rose at a 13% annual clip in last quarter of 2015 and first quarter of 2016, 2x rate of economic growth;
- Debt (public and private) in relation to GDP, was 140% before 2008, now at 250-280% (some estimates even higher);
- Worth noting that during this period, no other country in the world matched China's credit growth, for example much faster than in Japan in run-up to its crisis; indeed, hard to find other credit booms of this magnitude historically!

Why does this matter?

- 40%, perhaps more, of new loans go to service interest on existing loans, leaves less credit for new lending on fresh business ventures;
- Credit expansion is hitting diminishing returns—pre-2008, 1 yuan of lending generated 1 yuan of GDP growth, now 4 yuan needed for 1 yuan of GDP growth, same thing is happening with the Incremental Return on Capital (IROC), this has been sinking like a rock;
- China will not be able to grow it's way out of this problem: assuming interest rates of 6-7%, with a debt to GDP ratio of 250-280%, China would have to grow at annual rate of well over 10% to service interest on the debt & that won't happen;
- History isn't on China's side, at least that's what economic research suggests:

  Rogoff and Reinhardt's magisterial study, THIS TIME IS DIFFERENT. Common thread running through all financial crises is high levels of overall indebtedness (again, this referring to both public and private sector debt).

  Recent Alan Taylor and Moritz Schularick NBER paper strongly suggests that credit booms are a very good predictor of financial crises.

More detail on the debt problem: Corporate, non-financial debt

General Snapshot:

- 2014, 16% of the 1,000 biggest Chinese firms owed more interest on debt than they earned before tax;
- IMF estimates that 15% of Chinese loans in non-financial corporations are "at risk;" non-financial corporate debt is 150% of GDP, so book value of bad loans could equal ¼ of national income;
- In May, Chinese Government estimated that troubled lending jumped from 4.2 to 4.6 trillion RMB (latter figure is $706 billion) from December 2015 to March 2016, share of "non-performing" loans of total bank lending rose from 1.67 to 1.75%, now amounts to 1.4 trillion RMB, an 11 year high (from the China Banking Regulatory Commission website).

Where is the debt concentrated?

- Two sectors: Real estate and heavy industry—recall an earlier slide (state-owned enterprises [SOEs]);
- Not so bad in private firms, especially small-medium enterprises (SMEs) in light manufacturing and services.

Now what about that SOE debt?

- Healthy leverage ratio, which typically involves comparing it to equity or assets, is no higher than 60%;
- Many SOEs, have much higher ratios: for China Railroad Group, the figure was 84.8%, head of firm, Bai Zhongren, committed suicide (he's not alone), the average figure for SOEs is around 70%;
- While SOE revenues have been rising, profits--I use this word guardedly—haven't kept pace with growth in leverage;
- The other major sector with these problems is real estate, ratio of debt to assets is over 60%.

This is why Chinese leverage ratios are much higher than in Germany, U.S., even Japan; indeed, head of the PBoC, Zhou Xiaochuan, warned at the 2014 Bo'an forum that Chinese leverage of Chinese firms is "alarmingly high."

Why the SOE debt problem matters & a bit of Government Debt

Throwing good money after bad: SOEs and the "crowding out" capital for other firms

- Return on assets in SOEs is 1/3 that of private Chinese firms (1/2 of those in foreign invested firms) & the gap has been widening in recent years;
- However, SOEs have first dibs in bank credit (all major banks are state-owned), banks know that state stands behind SOEs, operate under a "soft budget constraint," i.e. can't fail, private SMEs are "crowded out;"
- Equity markets? 1) Still not well developed in China; 2) Many firms barred, notably high tech ones like Alibaba can't get listed, China Securities Regulatory Commission (CSRC) rules.

Government and the debt puzzle—largely local problem. Why? Understand the relationship between Beijing and provinces and local government entities:

- Most government functions, especially in social welfare, read pensions and health insurance, and locally administered;
- Despite these responsibilities, localities have limited fiscal resources: for example, no property tax, rely heavily on land sales (soft real estate market is killing lower tier cities);
- Beijing also constrains localities from borrowing: until recently, no municipal bonds (more on this shortly), also face strict limits on direct borrowing from banks and debt.

Post-2009 Local Government debt explosion:

- Get around borrowing limits by using Local Government Finance Vehicles (LGFVs), these are construction and investment companies used to carry borrowing for government infrastructure projects, also get loans from local SOEs;
- Poorly supervised, carry out unsanctioned projects, expose local governments to risk, plus lines are blurred;
- Local Government debt levels: 11 trillion RMB in 2010, 18 trillion in 2013, now 24 trillion, about 40% of GDP.

Emerging Municipal Bond Market, dodgy bank behavior

Beijing's response to local government debt explosion, establish in 2014-2015 a municipal bond market:
- LGVFs have been banned;
- Debt swap for local governments, they swap higher interest bank loans for lower interest bonds, latter bought by the same banks, but can then be posted as collateral with PBoC, last element of the scheme is what got them on board;
- Doesn't lower debt, but reduces cost of financing it, crucial for local governments with falling revenues;
- Also better for future borrowing for infrastructure, as they mature later than bank loans (infrastructure projects take a long time to finish and pay off).

Before you get carried away …
- As of late last 2015, only the 6 least leveraged provinces in China had refinanced their debt in this scheme;
- Program is only open to provinces and richest Chinese cities, but poor, lower tier municipalities need help the most;
- Limited transparency, don't know which LGFVs are being prioritized and why, more "nei mu" business!

How important is Chinese government leverage in its looming debt crisis, especially in comparative perspective?

Banks behaving badly:
- Risky loans categorized as investments to dodge scrutiny & lessen capital requirements—activity occurs in "shadow" banking system, shadow loans worth 16% of standard bank loans in 2015 vs. 4% in 2012.
- Blurring between regular banks & shadow banking system, especially true with "wealth management products" (WMPs) offering high returns, as Zhu Ning argues, people snap up risky investments believing in implicit guarantees, bank backing.
- Banks more reliant on such products, pay high rates for what are short-term deposits & put them into longer-term assets.
- Liquidity issues: Banks' lending now approaching 100% of deposits (previously 75%), raises risk of sudden funding shortages.

Resolving the debt crisis: Three terrible options (from Barry Eichengreen)

Authorities issue bonds to raise funds needed to recapitalize the banks:
- Transforms the corporate debt problem into a public debt problem;
- Imposes potentially large financial burden on future taxpayers, dampen consumer spending & confidence;
- Undermine public finances—look at Ireland in after the 2008-2009 crisis.

PBoC (People's Bank of China, aka Chinese "Fed") could provide credit (done in the 1999 bad loan problem):
- Cranking up the printing presses conflicts with government goal of maintaining a stable exchange rate;
- As August 2015 fall in RMB shows, sudden and rapid fall of currency will quickly panic investors;
- Big threat is capital flight, that will threaten banks, as money leaving China must first be withdrawn;
- Plus Chinese economy & China is more globalized—Chinese overseas direct investment (ODI) rising rapidly, many Chinese attend foreign schools.

"Evergreening" loans, or roll them over when repayment is due:
- Already happening to some extent, again 40% of bank lending is to service interest on existing debts—"extend & pretend;"
- Borrowers kept alive on drip-feed of bank finance;
- Sound familiar? Yes, Japan did that, resulting in "zombie" banks and companies.

What option will China pick?
- First is least terrible, but my guess is they'll pick the third;
- Why? Government is loathe to cut cheap credit to SOEs because: 1) fear of unemployment (not biggest reason); 2) SOEs key source of control over the economy; 3) source of patronage; 4) also an "ideological state apparatus."
- Also 2021 target of doubling per capita incomes, depends on continued 6-7% growth, which has become dependent keeping the punch bowl out.

Other underlying economic headwinds facing China

"Shockingly" poor relative endowment of educated human capital:

- For many years, the Ministry of Education has exaggerated educational through-puts—more "Voodoo" data from Chinese Government;
- Study based on 2010 Census data by Rozelle [et al] shows that China ranks low not just to developed countries, but other emerging economies in upper-secondary & post-secondary through-put rates, bottom of the BRICS group;
- Will be a big constraint on upgrading of the economy and avoiding the "middle-income trap."

Above problem is related or lead into another big headwind, the "hukou" system:

- What is the hukou, or urban/rural residence permit system? Rural hukou holders moving to cities have problems getting urban hukous, w/o urban hukous they have limited access to welfare benefits and, key, free education.
- Only 20% of migrant workers take their children with them to large cities;
- Hence, the problem of "left-behind" children: 61-70 million, or 20% of all Chinese children 17 or younger (equals total number of kids in U.S.);
- These kids are at risk, psychologically, abuse, but above all for education;
- Things for rural migrant children in cities isn't much better.

Inadequate Hukou reform:

- 2014 hukou reform: rural people can easily get urban hukous only in very low tier cities, gets much harder in upper tier cities;
- But rural people will continue to migrant to upper tier cities, due to greater job opportunities;
- Hence, response among rural residents to new reform has been less than overwhelming—Sichuan survey.

Other underlying economic headwinds facing China

The mega-bad mega-cities urbanization blueprint, I; mistaken assumptions:

- China's urbanization target—60% of the population living in cities by 2020 (may happen sooner);
- But the government wants to direct this process vs. letting it occur organically by market forces;
- Believes largest cities are too large, hence will create 5 mega-cities in which population and functions of the biggest cities are shared with surrounding cities (anchored around Beijing, Shanghai, Guangzhou/Shenzhen; Chongqing, & Chengdu);
- But big Chinese aren't that densely populated—I know, this will raise eyebrows, but it's true!

The mega-bad mega-cities urbanization blueprint, II; direct costs:

- Shifting facilities, administrative, health, and educational to outlying areas;
- Transportation infrastructure (could forego that by concentrating people).

The mega-bad mega-cities urbanization blueprint, III; opportunity costs, or foregoing "agglomeration economics:"

- Benefits of density for firms: 1) can specialize, provide more unique offerings, 2) share input suppliers, 3) closer access to wide variety of products and services, 4) better labor market match with employment needs, & 5) share information and learn from each other.
- Really crucial for high-tech & IT services, China wants to develop this (these activities require little space, also labor-intensive, non-polluting).
- Overall economic payoff—more productive cities, this translates into a badly needed new growth engine, Andy Xie, former chief economist of Morgan Stanley estimates that China could add roughly the GDP of India to its economy over the next decade with denser cities.

Now what was it that Molly Ivins said about doing something to your John Thomas?

Other underlying economic headwinds facing China & misguided regime priorities

Bad safety net (or not a place to grow old or get sick in):

- Creaky urban pension system whose funding mechanism depends on a high ratio of workers to retirees—unfunded liabilities $2.5 trillion in 2010, could be $10 trillion by 2033.
- Health care, broader insurance coverage than before, but high out-of-pocket expenditures, plus wide regional variations & limited provision for seniors.

Soaring socio-economic inequality: top 1% own 33% of wealth, lowest 25% have 1% wealth, GINI index figures.

Fixing these problems, well upgrading education, fully "urbanizing" rural migrants, & fixing the safety will require money; Beijing has the resources, but has other priorities:

That's the Liaoning: Chinese Military spending rising at a double-digit clip; Mr. Xi is forgetting Deng's sage foreign policy wisdom.

Lanzhou new urban zone: Construction connected to Mr. Xi's pet 1Belt1Road Central Asian investment & development initiative; many unused industrial parks

More misguided regime priorities

Yes, soccer—Mr. Xi is mad about the sport, has launched a huge Initiative to make China a global soccer powerhouse.

Lost in Space: China wants to build a space station by 2022, perhaps Mr. Xi will be the first world leader to enter outer space!

Last minor matter: Internal Security, older estimate is that China spends $100 billion annually on that, several times more than the budget for government health insurance (from an NYT article years back); becoming a brake on economic development, especially internet firewall & its impact on open-knowledge networks

In closing, I want to make one thing clear, China’s economy is not doomed to failure

Au contraire, China has enormous potential, In particular its people are extremely resourceful and hard-working (out of necessity) & they deserve so much better in the way of governance!

With the right policies, the country can get out of this bind and enjoy sustainable growth—alas, with the current regime, there’s a way but not a will

Ok, if you want to contact me for this ppt and my writing, email writer@danielgarst.com.