

THE STATE OF THE GLOBAL ECONOMY: AN AGENDA FOR JOB CREATION

Joseph E. Stiglitz

World Bank

September 26, 2011

I. Diagnosis

- Before the crisis the US (and to a large extent the global) economy was “sick,” supported by a real estate bubble, that led to a consumption bubble
 - Bottom 80% of Americans were consuming roughly 110% of their income
 - Not sustainable

Financial and Real Crisis

- While bubble “hid” underlying problems, it left in its aftermath additional problems
 - Excess capacity in real estate
 - Excess leverage
- Major mistake of Administration was to think that fixing the banking system would “suffice”
 - But they didn’t succeed in restoring lending
- But even deleveraging won’t suffice to restore economy
 - Won’t (and shouldn’t) return to world with consumption 110% of income

Underlying Problems

1. Structural transformation
2. Inequality
3. High oil prices
4. Globalization
5. Build up of global reserves

1. STRUCTURAL TRANSFORMATION

- Great depression was structural transformation from agricultural to manufacturing—this is a **structural transformation from manufacturing to services**
 - Productivity growth well in excess of *global* growth in demand
 - Implying decrease in demand for labor in manufacturing *globally*
 - If labor gets “trapped” in declining sector, then income will decline

- Technical change can always induce large distributive consequences
 - Standard models ignore these
 - With perfect markets, winners can compensate losers — but they seldom do
 - With free mobility all workers can be better off
 - With imperfect markets, those in rural sector worse off
 - decrease in welfare of those in “trapped sector” has spillover effects on others
 - And especially if there are efficiency wage effects, there can be adverse macroeconomic consequences

Basic Model

- Two sectors (industry, agriculture)

$$(1) \beta\alpha = \beta D^{AA}(p, p\alpha) + E D^{MA}(p, w^*)$$

$$(2) H(E) = \beta D^{AM}(p, p\alpha) + E D^{MM}(p, w^*) + I$$

β is the labor force in agriculture, $(1 - \beta)$ is the labor force in industry,

α is productivity in agriculture,

D^{ij} is demand from those in sector i for goods from sector j

w^* is the (fixed) efficiency wage in the urban sector,

I is the level of investment (assumed to be industrial goods),

p is the price of agricultural goods in terms of manufactured goods, which is chosen as the numeraire, and

E is the level of employment ($E \leq 1 - \beta$);

and where we have normalized the labor force at unity.

Results

Normally (under stability condition, other plausible conditions) with immobile labor
an increase in agricultural productivity unambiguously yields a reduction in the relative price of agriculture and in employment in manufacturing.

The result of mobility-constrained agricultural sector productivity growth is an extended economy-wide slump

Great Depression

- From 1929 to 1932, US agriculture income fell more than 50%
- While there had been considerable mobility out of agriculture in the 1920s (from 30% to 25% of population), in the 1930s almost no outmigration
 - Labor was trapped
 - Could not afford to move
 - High unemployment meant returns to moving low

Financial and Real Causes of Downturn

- Banking crisis was a result of the economic downturn, not a cause
- But financial crisis can help perpetuate downturn

Government Expenditures

- Under the stability condition, an increase in government expenditure increases urban employment and raises agricultural prices and incomes

Even though problem is structural, Keynesian policies work

Even more effective if spending is directed at underlying structural problem

Emerging from the Great Depression

- New Deal was not big enough to offset negative effects of declining farm income
- And much of Federal spending offset by cutbacks at state and local level
- Analogous to current situation, where government employment is now lower by 700,00 than it was before crisis
 - Local government alone has lost 550,000 since the peak of employment in September 2008

War

- WWII was a massive Keynesian stimulus
- Moved people from rural to urban sector
- Provided them with training
- Especially in conjunction with GI bill
- *It was thus an “industrial policy” as well as a Keynesian policy*
- Forced savings during War provided stimulus to buy goods after War
 - In contrast to the legacy of debt now

Wages

In model, under normal condition, lowering urban wages lowers agricultural prices and urban employment

- *High (rigid) wages are not the problem*
- *Lowering wages would lower aggregate demand—worsen the problem*
- *In this crisis, the US—country with most flexible labor market—has had poor job performance, worse than many others*

An Aside on Irrelevance of Standard Macro-models

- Since such structural transformations occur very seldom, rational expectation models are not of much help
- Since the central issue is structural, aggregate model with single sector not of much help
- Since among major effects are those arising from redistribution, a representative agent model is not of much help
- Since central issue entails frictions in mobility, assuming perfect markets is not of much help
- Problems exacerbated by efficiency wage effects

Reference

Domenico Delli Gatti; Mauro Gallegati; Bruce C. Greenwald; Alberto Russo; Joseph E. Stiglitz, “Sectoral Imbalances and Long Run Crises,” presented to IEA meeting, Beijing, July, 2011.

2. INEQUALITY

- Redistribution from those who would spend all of their income to those that don't lowers aggregate demand
- Large increases in inequality in most countries of the world
- America said "spend as if your income was going up," that is—borrow
- Problem exacerbated—downturn leading to lower wages and incomes

3. RISING OIL PRICES

- Meant US consumers were spending more of their income abroad
- In effect, a redistribution from oil consuming countries to oil rich countries

4. GLOBALIZATION

- Global competition for limited number of manufacturing jobs
- Shifting comparative advantage compounded problems for US
- One of factors contributing to growing inequality

5. GLOBAL RESERVES

- Build up of reserves weakened global aggregate demand
- Some of it based on precautionary savings—response to crisis exacerbating this problem too (countries with large reserves did better)
- Some of reflecting high oil prices
- Some of it part of export-led growth—most successful growth strategy

References

- UN Commission
- J. E. Stiglitz, *Freefall*

II. Remedies

Increase aggregate demand

Addressing underlying issues

- Facilitate the structural transformation
 - Adapting to changing comparative advantage
 - Helping economy move into services
- Reduce inequality
- Reduce dependence on oil
- Reduce need for global reserves
- Finish the task of fixing the financial system and underlying real estate problem

Finishing the Task of Fixing the Financial System

- Redirecting financial system to its core mission—lending (carrots and sticks)
 - Restricting speculative activities, proprietary trading (“ringfencing”)
- Helping community and regional banks
 - TARP was directed at helping the big banks
- Reregulating the banks
 - Restricting excess leverage (Basel III doesn’t go far enough, failed to understand insights of Modigliani and Miller)
 - Doing something about the too-big-to-fail financial institutions
 - Transparency (e.g. OTC derivatives)
 - Prohibiting predatory lending
 - Stopping anti-competitive practices

Mortgages

- Real estate markets continues to fall
- Foreclosures continue apace
 - Administration efforts inadequate
 - More than 20% of mortgages underwater
- What is needed: Homeowners' Chapter 11
- Alternatively: carrots and sticks to get banks to restructure
 - Changing in accounting rules
 - Tax incentives

Increasing Aggregate Demand

- Government spending in a world with fiscal deficits
 - High return investments lower debt/GDP in medium term
 - Well designed tax and expenditure programs can yield balanced budget multiplier of 2-3.
 - Shifting composition of taxes and expenditures can increase GDP
- Cutbacks in spending can impede transition
 - Especially since two of critical services (education and health) are typically government financed

Design of Stimulus

- High multipliers
- High job multipliers
- Sensitive to sectoral/skill mix of unemployed
- Money gets quickly into system
 - Assistance to states and localities, which otherwise would have to fire teachers
- Addressing long term problems
 - Facilitating restructuring
 - Reducing inequality
 - Investments (infrastructure, technology, education)
 - Protecting the environment
- Sensitive to long term nature of problem
 - Short term palliatives won't work
 - Scope for longer term investment strategy

Objections

- With interest rate fixed at low levels, deficits won't crowd out private investment
- Public investment *crowds in* private investment
- Ricardian equivalence doesn't hold
- Well-designed investments improve future fiscal position, should lead to more consumption today
- Savings today translates into spending tomorrow; if future periods demand constrained, increases income in future; expectation of that leads to more consumption today:
with rational expectations, multipliers are larger

Promoting Investment

- In US biggest needs are in **public sector**
- What is holding back investment?
 - Excess capacity in many sectors
 - Lower interest rates and supply side policies won't help
 - Macro-uncertainty
 - Government could **issue “macro-Arrow-Debreu” securities**
 - Speeches about confidence, green shoots, won't work
 - In long run, counterproductive
 - NOT too high taxes
 - Lowering corporate tax rate will have no significant effect, except on cash constrained firms
 - To extent that investment is debt financed, cost of capital will increase

A Green Growth Strategy

- Raising carbon prices will induce significant amounts of new investment
- Uncertainty about carbon price may be impeding investment
 - Government could provide **carbon price guarantees**, paying off if carbon price is lower than critical level in future years
- Reducing dependence on oil will also have benefits for global aggregate demand
- A New Innovation model—focusing on saving the environment, rather than saving labor
 - Especially important in a world with high unemployment

Global Strategy

- In world of globalization, what matters is global aggregate demand
- **Reform of global reserve system key**
- **Improving recycling of savings from reserve countries to where investment is badly needed**
 - Bernanke was wrong—the problem was not a savings glut
 - G-20 strategy of encouraging consumption is misguided
 - Planet will not survive if everyone aspires to US patterns of consumption
 - Enormous needs for investments in developing countries and to retrofit global economy for global warming
 - Mistake was that financial markets didn't allocate capital well
 - Part of the problem is that there needs to be better risk mitigation facilities

Limited Scope for Monetary Policy

- Short-term interest rates can't get any lower
- QE III effect on LT interest rates limited
- Hard to show any quantitatively significant effect of change in interest rates on investment or consumption,
 - especially in periods of excess capacity, excess leverage
 - Especially when “credit channel” is blocked, because of failure to fix banks
 - QE I and II didn't work—why expect QE III to do so?

- Temporary measures likely to limit asset price effects, and even smaller consumption effects
- In a globalized capital market, money flows to where return is highest
 - In emerging markets, where it's not needed
 - Not in US, where it's needed
- Most effective channel may be through competitive devaluation
 - But that only works if others don't respond
 - They are responding, with exchange rate interventions, capital controls, etc
 - Leading to fragmentation of global capital market

- Low interest rates may even be ensuring that we have a jobless recovery
 - Evidence that this (and other recent recessions) are different
 - In vintage capital model (putty-clay), low long term interest rates induce firms to use capital intensive technology—making labor redundant

Concluding Remarks

- Current downturn likely to be long
 - And if something isn't done soon about jobs situation, hysteresis effects will set in, making return to full employment all the more difficult
- Slump is more than a financial crisis
 - Though the financial crisis will make the return to full employment all the more difficult
- We have to look at the underlying *real* problems and address them
 - Unless we do so, we won't succeed in recovering
 - And what we do may even be counterproductive