Census State and Local Pension Data in the Flow of Funds Accounts

Paul Smith

Chief, Flow of Funds

Federal Reserve Board of Governors

We rely on 3 Census government products

- Annual Survey of State and Local Government Finances

- Annual Survey of State and Local Public Employee Retirement Systems

- Quarterly Survey of Finances of Selected State and Local Government Employee Retirement Systems

- I'll focus on the annual and quarterly pension surveys

Flow of Funds Accounts (FFA) of the U.S.

- Quarterly balance sheets for various sectors of the economy, including:
  - Households
  - Non-financial companies
  - Government sectors
  - Depository institutions
  - Other financial institutions
    - GSEs, insurance companies, pension funds

- FFAs also track flow of assets and liabilities across sectors

- Helpful for monitoring and understanding systemic risks

L.119 State and Local Government Employee Retirement Funds

Billions of dollars; amounts outstanding end of period, not seasonally adjusted

		2006	2007	2008	2009	2010	2011 Q1	2011 Q2	2011 Q3	
1	Total financial assets	3089.8	3198.8	2324.5	2673.7	2931.5	3034.2	3013.2	2664.1	1
2	Checkable deposits and currency	13.1	17.9	17.8	17.7	17.3	18.1	17.9	18.9	2
3	Time and savings deposits	0.8	0.7	0.7	0.7	0.7	0.7	0.7	0.8	3
4	Money market fund shares	13.8	12.4	14.3	14.3	13.9	14.7	14.5	15.2	4
5	Security RPs	24.1	21.7	23.5	23.5	22.8	24.0	23.7	25.0	5
6	Credit market instruments	808.0	820.3	833.5	824.7	816.5	825.0	820.5	834.9	6
7	Open market paper	42.8	38.4	25.9	24.0	22.4	23.5	23.2	24.4	7
8	Treasury securities	156.2	141.6	146.4	174.5	185.6	187.9	186.9	188.7	8
9	Agency- and GSE-backed securities	307.8	331.1	337.5	306.9	285.2	288.7	287.2	290.0	9
10	Municipal securities	3.3	2.4	1.4	1.5	1.6	1.6	1.6	1.5	10
11	Corporate and foreign bonds	283.4	297.0	312.9	308.6	312.4	314.1	312.4	320.9	11
12	Mortgages	14.4	9.7	9.4	9.3	9.4	9.2	9.2	9.3	12
13	Corporate equities	1926.1	2013.7	1237.9	1549.8	1782.5	1861.9	1848.2	1527.8	13
14	Mutual fund shares	287.5	296.4	181.1	226.7	260.8	272.4	270.4	223.5	14
15	Miscellaneous assets	16.3	15.7	15.7	16.2	17.0	17.3	17.3	18.0	15
16	Pension fund reserves (liabilities) (1)	3156.6	3297.9	2414.7	2759.8	3024.0	3131.3	3116.3	2774.4	16

(1) Equal to the value of nonfinancial and financial assets. These liabilities are assets of the household sector.

Policy issues this helps inform

- Retirement savings
  - Relative sizes of various retirement sectors in the FFA
    - State and local government employee pensions ($2.7T)
    - Private defined benefit plans ($2.1T)
    - Private defined contribution plans ($3.6T)
    - Federal government employee pensions ($1.4T)
    - Individual Retirement Accounts ($4.9T)

- Impact of financial crisis/recession
  - Current state and local pension assets down 17% from 2007
    - $3.2T in 2007→ $2.7T in 2011q3; decline from stocks and mutual funds

- Public pension investment policy
  - Costs/benefits of heavy exposure to risky assets

Future Improvements

- Actuarial liabilities
  - Currently we do not report actuarial liabilities
  - Our "liabilities" are just set equal to financial plus real assets
  - This is b/c we have not had aggregate data on actuarial liabilities
  - New Census estimates will allow us to add liabilities
  - Very helpful for tracking funded status; also consistent with international standards for national accounting
  - Policy debate over appropriate methodology/discount rate

- Separate estimates for state and local DC plans and health plans

F.119 State and Local Government Employee Retirement Funds

Billions of dollars; quarterly figures are seasonally adjusted annual rates

		2006	2007	2008	2009	2010	2011 Q1	2011 Q2	2011 Q3	
1	Gross saving	0.4	0.6	0.7	0.8	0.8	0.8	0.8	0.8	1
2	Fixed nonresidential investment	1.0	2.1	1.4	0.9	0.7	0.8	0.8	0.8	2
3	Net acquisition of financial assets	45.5	0.8	17.0	-28.2	-38.5	-48.1	-42.5	-63.9	3
4	Checkable deposits and currency	-2.7	4.8	-0.2	-0.0	-0.5	3.5	-0.9	3.9	4
5	Time and savings deposits	-0.5	-0.1	-0.0	-0.0	-0.0	0.1	-0.0	0.2	5
6	Money market fund shares	2.1	-1.4	1.9	-0.0	-0.4	2.9	-0.8	3.1	6
7	Security RPs	4.5	-2.5	1.8	-0.0	-0.6	4.7	-1.2	5.1	7
8	Credit market instruments	114.6	12.3	13.3	-8.8	-8.2	34.2	-18.1	57.5	8
9	Open market paper	7.6	-4.4	-12.5	-2.0	-1.6	4.6	-1.2	5.0	9
10	Treasury securities	2.4	-14.6	4.8	28.1	11.1	9.2	-4.0	7.3	10
11	Agency- and GSE-backed securities	49.4	23.3	6.3	-30.5	-21.7	14.1	-6.1	11.3	11
12	Municipal securities	1.6	-0.8	-1.0	0.0	0.1	0.2	-0.1	-0.3	12
13	Corporate and foreign bonds	55.5	13.6	15.9	-4.3	3.8	7.0	-6.8	33.8	13
14	Mortgages	-2.0	-4.7	-0.3	-0.1	0.1	-0.8	0.0	0.4	14
15	Corporate equities	-70.0	-6.4	1.2	-17.3	-25.8	-82.8	-18.6	-119.1	15
16	Mutual fund shares	-3.4	-5.2	-1.1	-2.5	-3.8	-12.1	-2.7	-17.4	16
17	Miscellaneous assets	1.0	-0.6	-0.0	0.5	0.7	1.4	-0.1	2.8	17
18	Pension fund reserves (liabilities) (1)	46.1	2.3	17.7	-28.0	-38.5	-48.1	-42.5	-63.9	18

(1) Equal to the net acquisition of nonfinancial and financial assets less gross saving (line 2 + line 3 - line 1). These liabilities are assets of the household sector.

How we use the Census data in the FFA

- We use the annual survey to benchmark our levels, making some adjustments:
  - Subtract real property
  - Adjust bonds to book value (to be consistent with rest of FFA)
  - Estimate more detailed asset breakdowns using public pension Consolidated Annual Financial Reports (CAFRs):

    - Split "short term investments" into commercial paper, repurchase agreements, and money market mutual funds

    - Split "international securities" into stocks and bonds, combine with domestic

    - Combine stocks, trust investments, other securities, and other investments, and then split the total across corporate equity, mutual funds, and miscellaneous assets

- We also use the annual survey to benchmark flows, using contributions, interest and dividends, payouts, and expenses

How we use the Census data in the FFA

- We use the quarterly survey to derive quarterly FFA estimates between annual benchmarks:
  - We calculate growth rates from quarterly survey, apply to FFA
  - Because the quarterly survey has less asset detail, we make additional adjustments using the CAFRs:

    - Split "cash and short term investments" into checkable deposits, time and saving deposits, commercial paper, repurchase agreements, and money market mutual funds

    - Split "Treasury and Agency securities" into Treasuries and Agencies

    - Split "corporate bonds" into agency-back securities vs. other bonds

    - Split "total other investments" into real property vs. other investments

  - For our purposes, we'd love to see more asset detail, larger sample sizes, shorter time lags, and DB vs. DC split. And liabilities!

Concluding Thoughts

- We rely heavily (almost exclusively) on Census surveys for our state and local government sectors

- The Census pension surveys are extremely useful for us and our users, and will be even more so with the addition of the liability data

- We would love to see more asset detail, shorter time lags, and separate estimates for state and local DC plans and health plans